Virtual DCM Recorder

Cloud DVR & Time-Shift TV for Content and Service Providers

Never Miss an Important Moment

Synamedia's vDCM Recorder is a scalable, software-based product that manages media content recording and streaming across the widest range of OTT use cases and market regulations. It serves all applications from VOD to time-shift TV (TSTV) and cloud DVR (cDVR), and opens the door to monetization opportunities by enabling you to offer value-added services, including server-side ad insertion (SSAI).

Part of the overall adaptive bitrate (ABR) ecosystem, vDCM Recorder works with Synamedia's Fluid EDGE CDN and third-party CDNs worldwide. Given its ease of configuration and high availability, vDCM Recorder enables swift deployment and peace of mind for your mission-critical operations.

Key Functionalities

End-to-end solution

- Includes optional Synamedia vDCM ABR transcoding (H.264 or HEVC)
- Features linear packaging/segmentation, origin server, video recorders, just-in-time (JIT) packaging, DRM interface, and northbound API-to-customer control plane
- Includes optional Synamedia Fluid Edge CDN
- Includes enterprise-grade object storage software (COS) to unify VOD, TSTV and cDVR recordings for on-premise deployments
- Unifies live, VOD, TSTV and cDVR workflows across a common set of packagers

Optimized for on-premises and the cloud

- Supports cloud deployments in AWS and GCP for VOD, TSTV and cDVR, including disaster recovery
- Supports on-premise deployments across a wide range of servers, and fully integrates with HPE, Cisco and Dell
- Supports IPv4 and IPv6 networks, and offers HDD, SSD and NVMe storage options for either on-premises COS storage or S3 cloud storage

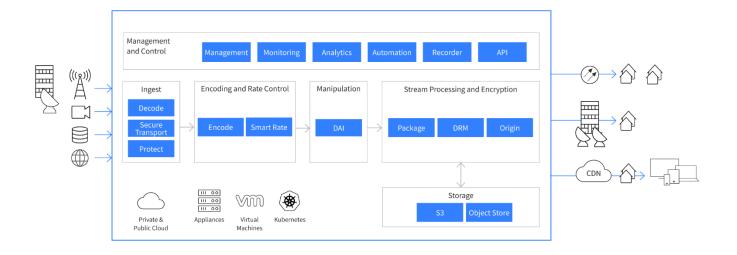
Global market coverage

- Deploys in a unique/private copy regulatory environment on-premises in the US
- Deploys in an international common/shared copy regulatory environment either on-premises, in the cloud, or in a hybrid setup
- Supports both regulatory types in the same ecosystem7, channel by channel

Technical Advantages

- Wide range of supported ABR protocols
- In-memory and SSD-based pause live TV support
- Easy output stream configuration
- Rich set of resiliency mechanisms
- Single- and multi-node deployment
- Origin and shield capability, storage and cache redirect
- Optimized low latency with chunked transfer encoding
- Integration with Synamedia Edge Fluid CDN and major CDNs
- High origin throughput up to 42 Gbps depending on hardware performance





Product Specifications

Processing		
Input Formats	 Adaptive transport stream with encoder boundary points (CableLabs-compliant) Adaptive transport stream with encoder boundary points (CableLabs-compliant) without audio EBP IDR-based 	
Output formats	 MPEG-DASH Apple HTTP Live Streaming (TS and fMP4) Microsoft HTTP Smooth Streaming Shared CMAF 	
Deployment	 Containerized application Native cloud- and Kubernetes-based On-premises, cloud and managed services deployment with Quortex Play Max 	
Video	H.264H.265	
Audio	 AAC-LC HE-AAC v1/v2 Dolby Digital/Dolby Digital+ Multiple audio streams per output support 	
Subtitling Input Formats	CEA-608/708DVB-TXTDVB-SUB	
Subtitling Output Formats	WebVTTTTMLEBU-TT-DSMPTE-TT	
External Storage	 HDD (hard disk drives) SSD (solid state drives) NVMe drives On-premise object storage (Synamedia COS) COS hardware integrated with Cisco M5 (HDD), Dell R750/R760 (NVMe), HPE Apollo 4200 (HDD), HPE Alletra 4120 (HDD), HPE Alletra 4120 (SSD) AWS S3 GCP (similar to S3) 	
Integrated DRMs and Key Management System	 Apple Fairplay Microsoft PlayReady Google Widevine Synamedia VideoGuard Synamedia Key Schedule and Management 	

	 Nagra/Contego Axinom Pikselguard EZ-DRM Verimatrix Yotta Labs BuyDRM (OVH) Irdeto Castlabs
Other	 Synamedia clean-up agent capability saving storage costs Integrated with vDCM Encoder Integrated with vDCM Packager Integrated with vDCM Media Scalable Origin Integrated with vDCM JIT Packager Integrated with Fluid EDGE CDN
Recording Regulations & Functionality	 US market – unique/private copy (per subscriber recording request of each event) International markets – common/shared copy (per event per channel) Channels defined as either unique or common copy US market – time-shift buffer – live pause functionality for IP device support International markets – full time-shift TV (catch-up/restart), system-level recordings per event, and personal recordings per event

Publication	
Mode	• Pull mode
CDNs	 Integration with CDNs worldwide, including Synamedia Edge, Akamai (MSL 4.0 certified), Fastly, and other 3rd-party CDNs

Monitoring and Management		
Configuration GUI/REST API	 Easy output configuration due to protocol-dedicated streaming creation wizard Automation through REST API Integrated into Synamedia Video Service Management (VSM) 	
Redundancy	Configuration of all system subcomponent synchronization for high availability	
Monitoring	 Integrated Grafana dashboards Wide range of available metrics Elasticsearch, Logstash and Kibana (ELK) stack support Synamedia VSM (control & monitoring) Fully documented open API allowing integration with third-party components 	

Ordering Information

For ordering information, please contact your sales representative.

Services & Support

Synamedia provides a broad portfolio of services and support to increase your network's business value and return on investment. We take a customer-centric approach, aligning our level of support to your technological requirements and network complexity. That way, you can successfully operate our products and solutions to ensure that you achieve optimal performance throughout your network's life cycle.

Warranty & Contact Information

Read our detailed warranty information.

About Synamedia Video Network Solutions

Synamedia is a leading global provider of video distribution, streaming, processing, and network delivery solutions for content owners and service providers. Our comprehensive, cloud-based SaaS and managed service solutions and software products enable customers to manage OTT media streaming and broadcast workflows, secure video content and services, and deliver premium user experiences across all screens. Leveraging expert know-how and 30-plus years of experience for over 1,000 customers worldwide, Synamedia helps video businesses launch, monetize and scale services across all devices to capture a greater share of the consumer video wallet.

Next Steps

Learn more about **Synamedia Video Network solutions**.

For more information, contact us.