

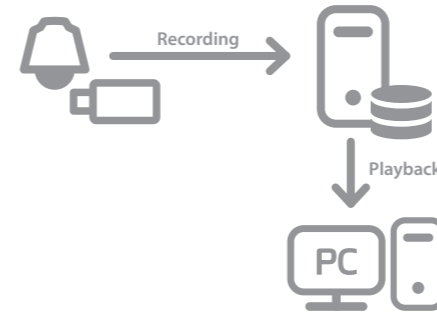
SSM Professional / Enterprise

	Professional	Enterprise
GENERAL		
Maximum Number of Cameras	288	Unlimited
Maximum Number of Clients	5	Unlimited
Centralized Management	Yes	Yes
Architecture	Multi-server	Multi-server
Clients	SSM console, Configuration manager, SSM Mobile	SSM console, Configuration manager, SSM Mobile
Supported Devices	Network Camera / Encoder / Decoder, DVR / NVR	Network Camera / Encoder / Decoder, DVR / NVR
SUMMARY		
Basic Component	System Manager, Media Gateway, Recording Server, Screen Mirroring, Virtual Matrix	Yes, Yes, Yes, -
Add-on Component	Transaction Server, Transcoder, Failover Server, Live Monitoring, Search Playback, Event Monitoring, Map Monitoring, POS/ATM Monitoring, Wall Management, Google Map Monitoring, Video analytics Monitoring, Advanced Health Monitoring, Access Control Monitoring, Video Summary Search, Active Directory Integration, Site Federation	Yes, Yes, Yes, Yes, -
Features	Yes, Yes, Yes, Yes, -	Yes, Yes, Yes, Yes, -
COMPONENT		
Media Gateway	Max. Media Gateway's: 4, Max. Bandwidth (In / Out): 400 / 600Mbps, Max. Devices per Server: 128 network cameras or 288 cameras of recorder, Max. Cameras: 128	Unlimited, 400 / 600Mbps *, 128 network cameras or 288 cameras of recorder *, 400Mbps *
Recording Server	Recording Performance: 400Mbps, Playback Performance: 100Mbps, Mode: Manual, Continuous, Event (Pre / Post), Schedule, Auto Recovery Backup: Yes, Video Summary: -, Event Boostup Recording: Yes, ONVIF Protocol: Profile S (except SSM-RS00L)	400Mbps *, 100Mbps, Manual, Continuous, Event (Pre / Post), Schedule, Yes, Yes, Profile S (except SSM-RS00L)
Screen Mirroring	PC screen Streaming for recording: Yes, Max. monitors: 4, Max. Streaming: 5, Frame rate: Up to 30fps	Yes, 4, 5, Up to 30fps
Virtual Matrix	Max. Monitors: -, Modules: -, Sequence Monitoring: -, Event Monitoring: -, Map Monitoring: -, Playback on Wall Monitor: -, Screen Merge: -	48, VM manager, VM Gateway, VM decoder, Yes, Yes, Yes, Yes, Yes
Transaction Server	Access Control: -, Intrusion Detection: -, Intercom: -, Video analytics: -, Playback transcoding: -	Samsung, Honeywell, JCI, Gallagher, Siemens, Bosch, Honeywell, Samsung, Stentofon, Agent Vi, For console and Mobile
Transcoder	Max. Input Resolution: -, Max. Output Resolution: -, Max. Transcoding Channels: -	5M, D1, 10
Federation	Max. Site Hierarchy Level: -, Max. Sites: -, Cameras per Site: -	4 *, 25 *, 288 *
Federation Server	Auto System Failover: -, Target Server Architecture: -	Yes, MG, RS, VM, Active / Standby

* The latest product information / specification can be found at hanwha-security.com
* Design and specifications are subject to change without notice.

SSM-RS10L/20L/30L

SSM Recording Server
(Video Recording Server Solution)



Key Features

- 4 models from 16 to 128 channels recording
- Supports H.265, H.264, MPEG-4, JPEG codec
- 400Mbps / 100Mbps for Recording / Playback
- Supports various recording mode :
Manual, Continuous, Event with pre/post and schedule
- For faster video search, Video summary feature provides minutes video clip for several hours
- Supports failover recording system
- Supports automatic data recovery from network failover with camera SD card (ARB)

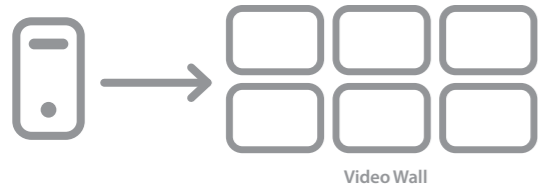
	SSM-RS10L	SSM-RS20L	SSM-RS30L	SSM-RS00L
DEVICE				
Supported Device	Network camera, Encoder			
Supported Protocols	Samsung, ONVIF profile S			Samsung
Max. Register Device	36	72	128	16
PERFORMANCE				
Video / Audio	Video Compression Format	H.265, H.264, MPEG-4, MJPEG		
	Multi-Profile	Live 1, Live 2, Record, Event record, Mobile		
Recording	Audio Compression Format	G.711 u-law (PCM), G.723, G.726 (ADPCM), AAC		
	Performance	Up to 400Mbps (@ 4 HDD's)		
Search & Playback	Manual Recording	Yes		
	Continuous Recording	Yes		
	Event Recording	Yes		
	Schedule Recording	Yes		
System	Pre / Post Event Recording	Pre : 10 ~ 60sec Post : 1,200sec		
	Event Notification	Audio, E-mail, SSM C console		
System Requirements	Performance	Up to 100Mbps, Up to 16CH		
	Time Search	Yes		
	Event Search	Yes		
	Timeline Search	Yes		
	Smart Search	Yes		
	Bookmark Search	Yes		
System	Video Summary	Yes		
	Synchronous Playback	Yes		
	Security	Multi-Level user access authority		
	Data Security	SSL		
System	Number of HDDs	Up to 24		
	Supported Storages	SATA II 7200rpm, e-SATA, SAS, iSCSI		
	System Failover	Yes (by SSM-HA)		
	Network Failover	Yes (Auto recovery Backup)		
System	Time Synchronization	NTP		
	MISC.			
System Requirements	Recommended	CPU Intel Core i7-4770@3.40GHz RAM 16GB, HDD SATA II 7200rpm (SSD is Recommended for OS) * RAID : RAID 5, 8Bay, HW RAID Controller (AF Supported)		
	Minimum	Windows Server 2008 R2 *, Windows Server 2012 R2 *, Windows 7, Windows 8/8.1, Windows 10 * Recommended		

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NETWORK CAMERA
NVR
NETWORK PERIPHERAL
ACCESS CONTROL SYSTEM
ANALOG CAMERA
DVR
LENS
PERIPHERAL
MONITOR
CONTROLLER

SSM-VM10L/20L

SSM Virtual Matrix
(Video Wall Display Solution)



Key Features

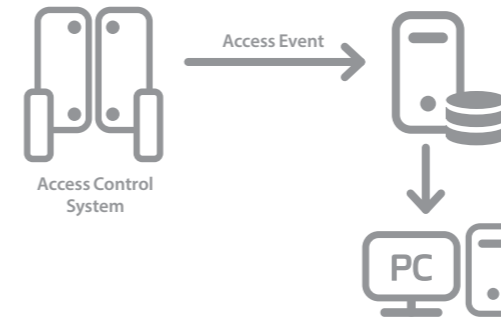
- 3 models from 16 to 48 monitors
- Consists of gateway, Decoder and manager
- Provides various live monitoring mode :
Wall layout, wall / monitor sequence and map monitoring
- Screens of multi monitors can be merged like one monitor
- Event spot per wall, Monitor and tile makes operators to focus only on event occurred live video

	SSM-VM10L	SSM-VM20L	SSM-VM00L
GENERAL			
Max. Number of Monitors	16	36	48 (H/W decoder)
Modules	VM manager, VM gateway, VM decoder		
Control Interface	SSM console, VM manager		
FEATURES			
Live Monitoring	Wall Layout	Upto 8 x 8 split mode	
	Wall Sequence	Yes	
	Monitor Sequence	Yes	
	Map Monitoring	Yes	-
	Screen Merge	Yes	-
	Auto Profile Change	Yes	-
Event Monitoring	Wall Spot	Yes	-
	Monitor Spot	Yes	-
	Tile Spot	Yes	-
Playback	Video Playback on Wall	Yes	-
MISC.			
Data Security	SSL		
3 rd Party IP Video Wall Integration	Leadtech		
System Requirements	Recommended	CPU Intel Core i7-4770@3.40GHz, RAM 8GB, 10GB HDD, NVIDIA GTX760, Video memroy 2GB, DirectX 9.0	-
	Operating System	Windows 7, Windows 8/8.1, Windows 10 VMG : Windows Server 2008 R2, Windows Server 2012 R2 Recommended	-

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SSM-TS10L

SSM Transaction Server
(3rd party System Integration Solution)



Key Features

- 3rd Party System Such as Access Control System, Intrusion Detection System and Video analytics can be Integrated with SSM by Transaction Server
- Provides Event Popup with Personal Information of a Person who Passed a Gate on Map
- Translated Events Can be Used as Event Action Setup that Can Meet on Various End-User Requirements

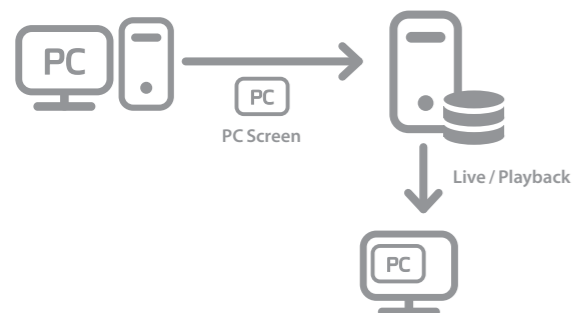
	SSM-TS10L	
GENERAL		
Supported System	Access Control	Samsung, Honeywell, JCI, Gallagher, Siemens
	Intrusion Detection	Bosch, Honeywell
	Intercom	Samsung, Stentofon
	Video analytics	Agent Vi
ACCESS CONTROL		
Supported System	Samsung SAMS	21 events
	Honeywell Pro3000 / Pro3200	13 events
	JCI-P2000	15 events
	Gallagher CCFT	7 events
	Siemens Sipass	12 events
	Controller	INPUT_SIGNAL_OCCURRED / INPUT_SIGNAL_OCCURRED, INPUT_SIGNAL_RELEASED / SYSTEM_SETUP_MODE / INPUT_DISCONNECTED
Supported Event	Door	ACCESS_GRANTED / ACCESS_DENIED / INVALID_TIME_SCHEDULE / ANTIPASS_BACK_ENTRY / ANTIPASS_BACK_EXIT / INVALID_PASSWORD / ACCESS_DOOR_ERROR / BIOMETRIC_ERROR / DURESS_ALARM / ARM / DISARM / OVERTIME_DOOR_OPENED / OVERTIME_DOOR_CLOSED / FORCED_DOOR_OPENED / 2MEN_TIME / ACCESS_TRIAL_WHITE_ARMED / IO_STAUS_CHANGE
INTRUSION DETECTION		
Supported System	Bosch IP7400	1 event
	Honeywell VISTA128	1 event
Supported Event	Detector	BURGLARY_ALARM
INTERCOM		
Supported System	Samsung SAMS	6 events
	Stentofon XE1	6 events
Supported Event	Intercom	STNT_STATION_BUSY / STNT_STATION_FREE / STNT_STATION_CONNECT / STNT_STATION_DISCONNECT / STNT_CALL_REQUEST / IO_STAUS_CHANGE
VIDEO ANALYTICS		
Supported System	Agent Vi	9 events
Supported Event	Camera	ASSET_PROTECTION / CAMERA_TAMPERING / CROWN_DETECTION / LOITERING / OCCUPANCY / STOPPED_VEHICLE / SUSPICIOUS_OBJECT / THERMAL_CAMERA / VEHICLE_TAILGATIONG
MISC.		
System Requirements	Recommended	CPU Intel Core i7-4770@3.40GHz, RAM 8GB, 20 GB HDD(SSD is recommended)
	Operating System	Windows 7, Windows 8/8.1, Windows 10, Windows Server 2008 R2, Windows Server 2012 R2

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SSM-SC10L

SSM Screen Capture
(PC Screen Capture and Streaming Solution)



Key Features

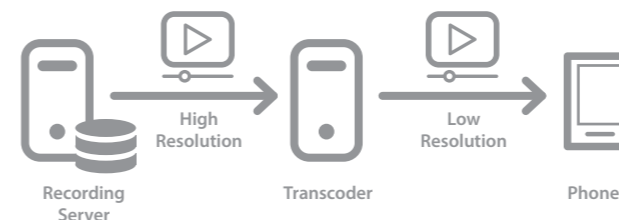
- Captures PC screen and make Video Stream
- The Video Stream acts same as a camera so it can be displayed on SSM console or recorded in Recording Server
- Supports max. 2560 x 1600 Resolution
- Supports H.264 and MJPEG
- Supports max.5 Output streams

SSM-SC10L		
FEATURES		
Video Source	Max. Resolution	2560 x 1600
	Source	PC monitor screen
Video Stream	Protocol	IPCAM2
	Video Codec	H.264, MJPEG
	Audio Codec	G.711
	Max. Output stream	5
	HW Acceleration (H.264)	NVidia : GTX-650 series, 340.33 driver Intel : HD 2000 AMD VGA : Radeon HD 7700, R7 250, R9 270 (Single monitor is needed for AMD)
MISC.		
Language	English, Korean	
System Requirements	Recommended	CPU Intel Core i7-4770@3.40GHz, RAM 8GB, 10GB HDD, NVIDIA GTX760, Video memroy 2GB, DirectX 9.0
	Operating System	Windows 7, Windows 8/8.1, Windows 10 Windows Server 2008 R2, Windows Server 2012 R2

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SSM-TC10L

SSM Transcoder
(Video Transcoding Solution for Mobile Users)



Key Features

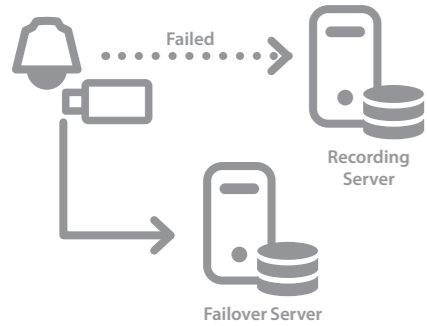
- Transcoder is for Mobile users in Bandwidth Limited Environment
- Transcoder Runs in Media Gateway and Activated by Additional License
- Supports H.264, MPEG-4, MJPEG
- Max. 10 Streams Can be Transcoded
- Max. D1 Resolution for Transcoded Output Stream

SSM-TC10L		
GENERAL		
Supported Client	SSM Mobile	
Video Source	Recorded Video Data for Playback	
FEATURES		
Video Input	Max. Channels	10
	Codec	Input : H.264, MJPEG, MPEG-4
	Resolution	5M
Video Output	Codec	H.264 High Profile at 50 GoP size
	Codec	20fps@D1 25fps@CIF 30fps@QCIF
	Codec Misc.	Entropy Coding Type : CAVLC Deblocking : ON Bit rate Type : VBR
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SSM-HA

SSM Failover Server
(System Failover Solution for SSM Components)



Key Features

- Failover Solution for Recording Server, Media Gateway and Virtual Matrix Gateway
- Active and Standby Failover architecture
- Number of Target Server is not Limited
- Configuration Can be Done by any Browsers

SSM-HA		
GENERAL		
Failover Architecture	Active (Target) - Standby, N + M Redundancy	
Target Servers	Recording Server, Media Gateway, Video Matrix Gateway	
Max. Target Server	Unlimited	
Configure Interface	IE 9, FireFox 12, Safari 5.1, Chrome 18	
FEATURES		
Standby Server	Failover	Thru Heartbeat Check
	Heartbeat	1 second
Standby Server	IP Address	Yes
	Data Recovery on RS	Yes
	Auto Failback	Yes
Data Recovery	Auto Recovery	Yes
	Pause-Resume	Yes
REQUIREMENTS		
Storage Needed	Needs More Than 2GB	
Disk limitation for RS	2 HDDs for the Recording and Recovery Except the OS Disk	
System Requirements	Active and Standby System Spec should be Same (OS, HDD's, Ethernet)	

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SSM Mobile

SSM Mobile Viewer for Android / iOS



Key Features

- Local / Remote Connection to SSM
- View Layout / Device List by User
- View Live Streaming Video with PTZ Control
- Supported Format : H.264, MJPEG
- Video Image Flip / Mirror, Video Image Capture
- Calendar Search / Playback / Bookmark Functions
- SSM Login for Security
- Quick & Easy Access at Mobile Environment & Wi-Fi Networks
- Compatible with "Dynamic Domain Naming Service" (DDNS)
- Multi-Language

* The SSM Mobile Application Can be Downloaded from Google Play Store & Apple App Store.

SSM Mobile		
GENERAL		
Max. Video Resolution	1920 x 1080	
Device List with Thumbnail Image	Yes	
Mobile Network Status Display	Yes	
FEATURES		
Live Monitoring	Screen-split Mode	1, 4, 9, 16
	PTZ Control	Yes
	Screen Capture	Yes
	Digital Zoom	Yes
	Camera Focus Control	Yes
	Audio Listen	Yes
Search & Playback	Auto / Manual Profile Change	Yes
	Date / Time Search	Yes
	Event Search	Yes
	Bookmark Search	Yes
	Playback Resolution Change	Yes (SSM transcoder is needed)
MISC.		
Language	English, French, German, Spanish, Italian, Russian, Chinese, Japanese, Korean, Turkish, Polish, Czech, Serbian, Romanian, Portuguese, Dutch, Croatian, Hungarian, Greek, Swedish, Danish, Finnish, Norwegian	
System Requirements	Recommended	CPU 1.4GHz, RAM 2G, Available RAM 1G or more, Network 3G, 4G (LTE), Wi-Fi
	Operating System	Android OS 4.4.x, 5.x, 6.x iOS 7, iOS 8, iOS 9
	Mobile Phone Tested	Android Galaxy S3 (v4.4.4), Galaxy S5 (v4.4.2) Galaxy S6 Edge (v6.0.1), Galaxy Note 4 (v5.1.1) Galaxy Tab S2 10.1 (v5.0.2) iOS iPhone 5S (v8.4.1), iPhone 6 (v8.1.1), iPhone 6S (v9.2), new iPad 3 (v7.0.4), iPad 2 (v8.3)

* For proper monitoring with SSM Mobile on your device, the device should suffice minimum requirements.
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