DH-XVR1B04-I

4 Channel Penta-brid 1080N/720p Cooper 1U 1HDD WizSense Digital Video Recorder

WizSense

- H.265+/H.265 dual-stream video compression
- Supports Full channel AI-Coding
- Supports HDCVI/AHD/TVI/CVBS/IP video inputs
- Max 5 channels IP camera inputs, each channel up to 2MP; Max 20 Mbps incoming bandwidth
- Up to 4 channels video stream (analog channel) SMD Plus

SMD Plus	AI Coding	H.265	1080p HDMI / VGA	Coax Audio	1200m Long Distance

Launched by Dahua Technology, WizSense is a series of AI products and solutions that adopt independent AI chip and deep learning algorithm. It focuses on human and vehicle with high accuracy, enabling users to fast act on defined targets. Based on Dahua's advanced technologies, WizSense provides intelligent, simple and inclusive products and solutions.

Series Overview

Dahua Technology, a world-leading video-centric smart IoT solution and service provider, debuted its new XVR series, Cooper Series featuring SMD Plus to benefit customers from AI upgrade. The series are designated to reduce false-alarm rates and human surveillance costs, thus bringing great value to customers in search of products with accurate human/vehicle alarm to raise the security level of various indoor and outdoor facilities.

Functions

SMD Plus

With intelligent algorithm, Dahua Smart Motion Detection technology can categorize the targets that trigger motion detection and filter the motion detection alarm triggered by non-concerned targets to realize effective and accurate alarm.

AI Coding

Compared with H.265/H.264, AI coding can reduce more than 50% bit rate and storage requirements while have no loss of decoding compatibility, providing clear human and vehicle details.

Smart Codec

With advanced scene-adaptive rate control algorithm, Dahua smart codec technology realizes the higher encoding efficiency than H.265 and H.264, provides high-quality video, and reduces the cost of storage and transmission.

HDCVI/AHD/TVI/CVBS Auto-detect

The XVR can auto recognize the signal of front-camera without any setting. It makes operation more friendly and convenient.

High Definition Camera Input

The XVR supports up to 2MP HDCVI camera and 2MP IP camera input.

Coaxial Audio/Upgrade/Alarm

The integrated design can reduce wiring troubles which makes it much more cost-effective and convenient for installation.

Long Distance Transmission

The HDCVI system supports long distance transmission over coaxial cable and UTP, max. 800 m for 1080p and 1200 m for 720p.

Technical Specification

System

Main Processor	Embedded processor
Operating System	Embedded linux

SMD Plus

Performance	4 channels
AI Search	Search by target classification (Human, Vehicle)

Video and Audio

Analog Camera Input	4 channels, BNC
HDCVI Camera Input	1080p@ 25/30 fps, 720p@25/30/50/60 fps
AHD Camera Input	1080p@ 25/30 fps, 720p@ 25/30 fps
TVI Camera Input	1080p@25/30 fps, 720p@25/30 fps
CVBS Camera Input	PAL/NTSC
IP Camera Input	4+1 channels, each channel up to 2MP
Audio In/Out	1/1, RCA
Two-way Talk	Reuse audio in/out, RCA

Recording

Compression	AI Coding/H.265+/H.265/H.264+/H.264
Resolution	1080N; 720p; 960H; D1; CIF
Record Rate	Main Stream: All channels 1080N/720P/960H/D1/CIF/(1~25/30fps) Sub stream: CIF (1~15 fps)
Bit Rate	32 kbps–4096 kbps per channel
Record Mode	Manual; Schedule (General, Continuous); MD (Video detection: Motion Detection, Video Loss, Tampering); Alarm; Stop
Record Interval	1 min– 60 min (default: 60 min), Pre-record: 1 s–30 s, Post-record: 10 s–300 s
Audio Compression	G.711A; G.711U; PCM
Audio Sample Rate	8 KHz, 16 bit per channel
Audio Bit Rate	64 kbps per channel

Display

Interface	1 HDMI; 1 VGA
Resolution	1920 × 1080, 1280 × 1024, 1280 × 720
Multi-screen Display	When IP extension mode not enabled: 1/4 When IP extension mode enabled: 1/4/6
OSD	Camera title; Time; Video loss; Camera lock; Motion detection; Recording

Network

Interface	1 RJ-45 Port (100 Mbps)
Network Protocol	HTTP; HTTPS; TCP/IP; IPv4/IPv6; 3G/4G; UPnP; RTSP; UDP; SMTP; NTP; DHCP; DNS; IP Filter; PPPoE; DDNS; FTP; Alarm Server; P2P; IP Search (Supports Dahua IP camera, DVR, NVS, etc.)
Max. User Access	128 users

Smart Phone	iPhone; iPad; Android
Interoperability	ONVIF 16.12, CGI Conformant

Video Detection and Alarm

Trigger Events	Recording, PTZ, Tour, Video Push, Email, FTP, Snapshot, Buzzer and Screen Tips
Video Detection	Motion Detection, MD Zones: 396 (22 × 18), Video Loss, Tampering and Diagnosis
Alarm input	N/A
Relay Output	N/A

Playback and Backup

Playback	1/4
Search Mode	Time/Date; Alarm; MD and Exact Search (accurate to second)
Playback Function	Play; Pause; Stop; Rewind; Fast play; Slow Play; Next File; Previous File; Next Camera; Previous Camera; Full Screen; Repeat; Shuffle; Backup Selection; Digital Zoom
Backup Mode	USB Device/Network

Storage

Internal HDD	1 SATA port, up to 6 TB capacity
eSATA	N/A

Auxiliary Interface

USB	2 USB ports (USB 2.0)
RS485	N/A
RS232	N/A

Electrical

Power Supply	DC 12 V/1.5 A
Power Consumption (Without HDD)	< 7 W

Construction

Dimensions	Cooper 1U, 198 mm × 202.9 mm × 41.5 mm (7.81'' × 7.99'' × 1.63'')
Net Weight (without HDD)	0.57 kg (1.25 lb)
Gross Weight	1.08 kg (2.38 lb)
Installation	Desktop installation

Environmental

Operating Conditions	−10 °C to +45 °C (+14 °F to +113 °F), 0%–90% (RH)
Storage Conditions	−20 °C to +70 °C (−4 °F to +158 °F), 0%–90% (RH)

Third-party Support

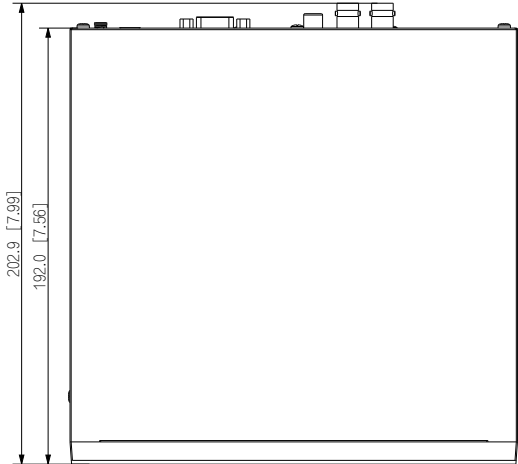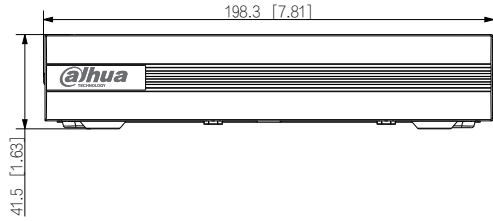|	
Third-party Support	Dahua, Arecont Vision, AXIS, Bosch, Brickcom, Canon, CP Plus, Dynacolor, Honeywell, Panasonic, Pelco, Samsung, Sanyo, Sony, Videotec, Vivotek, and more

Certifications

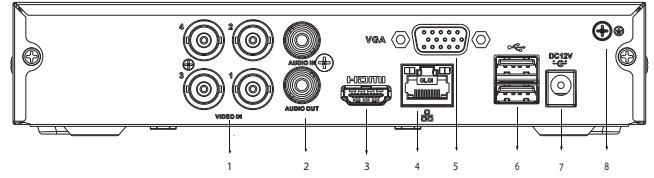|	
Certifications	FCC: Part 15 Subpart B
	CE: CE-LVD: EN 60950-1/IEC 60950-1 CE-EMC: EN 61000-3-2; EN 61000-3-3; EN 55032; EN 50130; EN 55024

Ordering Information

Type	Model	Description
4 Channel WizSense XVR	DH-XVR1B04-I	Cooper 1U WizSense Digital Video Recorder

Dimensions (mm[inch])

198.3 [7.81]

41.5 [1.63]

202.9 [7.99]

192.0 [7.56]

Panels

1	VIDEO IN	2	AUDIO IN/OUT, RCA Connector
3	HDMI Port	4	Network Port
5	VGA Port	6	USB Ports
7	Power Input	8	Ground