

# NVR0801-4KS3

8CH Smart 1U 1HDD Lite Network Video Recorder



- Supports Smart H.265+, H.265, Smart H.264+, H.264 and MJPEG decoding formats.
- Max. decoding capability: 6 × 1080p@30 fps.
- Max. 80/80/60 Mbps incoming/recording/outgoing bandwidth.
- Supports IP cameras with a resolution up to 12 MP.
- AI by Recorder supports 4-channel SMD.
- AI by Camera supports perimeter protection and SMD.
- Supports one-click arming and disarming.



## Series Overview

The NVR0801-4KS3 is favored for its outstanding performance. It supports 4K resolution for scenes that require highly detailed images, and can serve as the edge, central, or backup storage with an intuitive shortcut menu for remote management and control. This NVR also features Smart Motion Detection (SMD) by recorder, which can distinguish target vehicles and humans from ordinary ones in real-time. This NVR is both cost-effective and easy-to-install, making it ideal for a wide range of applications such as villas, shops and other small and medium-sized scenes.

## Functions

### SMD Plus

With intelligent algorithm, POLICEtech 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.

### Perimeter Protection by Camera

Automatically filters out false alarms caused by animals, rustling leaves, bright lights, etc. Enables system to act secondary recognition for the targets. Improves alarm accuracy.

Technical Specification	
<b>System</b>	
Main Processor	Industrial-grade processor
Operating System	Embedded Linux
Operating Interface	Web, Local GUI
<b>AI</b>	
AI by Recorder	SMD
AI by Camera	Perimeter protection; SMD
<b>Perimeter Protection</b>	
Perimeter Performance of AI by Camera (Number of Channels)	All channels (4 targets/s)
<b>SMD Plus</b>	
SMD Plus by Recorder	4 channels: Secondary filtering for human and motor vehicle, reducing false alarms caused by leaves, rain and lighting condition change
SMD Plus by Camera	All channels (8 targets/s)
<b>Audio and Video</b>	
Access Channel	8 channels
Network Bandwidth	80 Mbps incoming, 80 Mbps recording and 60 Mbps outgoing
Resolution	12 MP;8 MP;6 MP;5 MP;4 MP;3 MP;1080p;720p;960p;D1;CIF;QCIF
Decoding Capability	AI disabled: 1-channel 12 MP@30 fps; 1-channel 8 MP@30 fps; 2-channel 6 MP@30 fps; 2-channel 5 MP@30 fps; 3-channel 4 MP@30 fps; 6-channel 1080p@30 fps AI enabled: 1-channel 8 MP@30 fps; 1-channel 6 MP@30 fps; 1-channel 5 MP@30 fps; 2-channel 4 MP@30 fps; 4-channel 1080p@30 fps
Video Output	1 HDMI, 1 VGA HDMI: 3840 × 2160, 1920 × 1080, 1280 × 1024, 1280 × 720 VGA: 1920 × 1080, 1280 × 1024, 1280 × 720
Multi-screen Display	1/4/8/9
Third-party Camera Access	ONVIF
<b>Compression Standard</b>	
Video Compression	Smart H.265+; H.265; Smart H.264+; H.264; MJPEG
Audio Compression	G.711a; G.711u; PCM; G726;
<b>Network</b>	
Network Protocol	HTTP; HTTPS; TCP/IP; IPv4; IPv6; UDP; NTP; DHCP; DNS; SMTP; IP Filter; DDNS; IP Search (Supports IP camera, DVR, NVS, etc.); P2P; Auto Registration
Mobile Phone Access	iOS; Android
Interoperability	ONVIF 23.12(Profile T; Profile S; Profile G); CGI; SDK
Browser	Chrome; IE; Safari; Edge; Firefox
<b>Recording Playback</b>	
Multi-channel Playback	Up to 8 channels

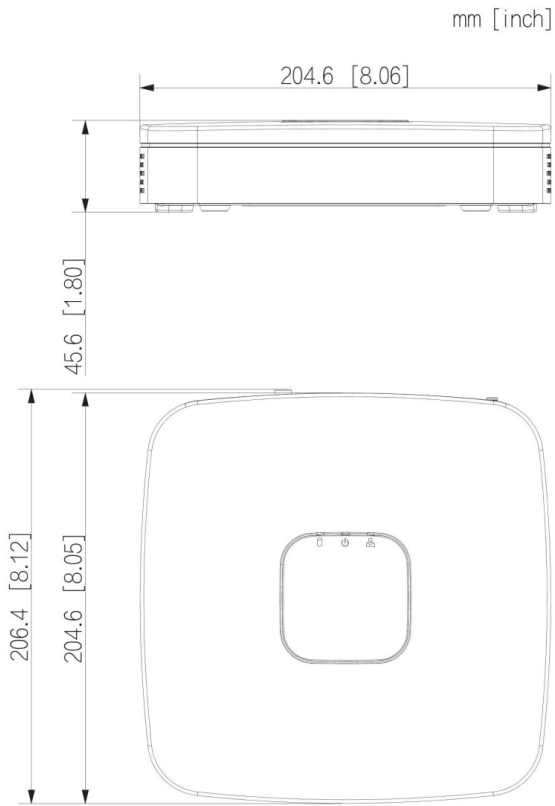
Record Mode	General, motion detection; intelligent; alarm
Backup Method	USB device and network
Playback Mode	Instant playback; general playback; event playback; tag playback; smart playback

Alarm	
General Alarm	Motion detection; camera external alarm; PIR alarm
Anomaly Alarm	Error (no disk, disk error, low space, low quota space; network disconnection; IP conflict; MAC conflict); video loss; video tampering; camera offline
Intelligent Alarm	Perimeter protection; SMD Plus
Alarm Linkage	Recording; snapshot; buzzer; log; preset; email; tour

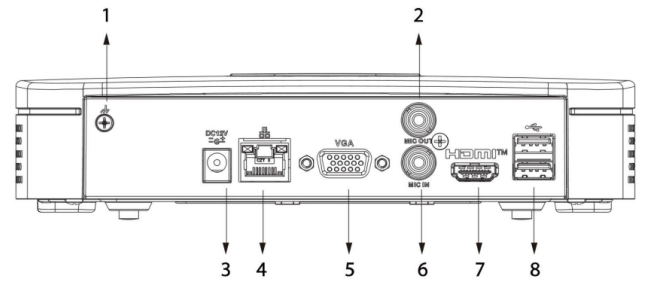
Port	
Audio Input	1-channel RCA
Audio Output	1-channel RCA
Alarm Input	NA (2 channels are optional)
Alarm Output	NA (1-channel 12 V 1 A output is optional)
Disk Interface	1 SATA port. Each disk can contain up to 20 TB. this limit varies depending on the environment temperature.
USB	2 (2 rear USB 2.0 ports)
HDMI	1
VGA	1
Network Port	1 (10/100 Mbps Ethernet port, RJ-45)

General	
Power Supply	12 VDC, 1.5 A
Power Consumption	<10 W (without HDD)
Net Weight	0.45 kg (0.99 lb)
Gross Weight	1.05 kg (2.31 lb)
Product Dimensions	204.6 mm × 206.4 mm × 45.6 mm(8.06" × 8.12" × 1.80") (W × D × H)
Packaging Dimensions	364.0 mm × 96.0 mm × 261.0 mm(14.33" × 3.78" × 10.28")(W × D × H)
Operating Temperature	-10 °C to +55 °C (14 °F to +131 °F)
Storage Temperature	-20 °C to +60 °C (-4 °F to +140 °F)
Operating Humidity	10%–93% (RH), non-condensing
Certifications	CE-LVD: IEC 62368-1:2014 CE-EMC: EN IEC 61000-3-2:2019, EN 61000-3-3:2013+A1:2019, EN 55032:2015+A11:2020, EN 55035:2017+A11:2020, EN 55024:2010+A1:2015, EN 50130-4:2011+A1:2014

Dimensions (mm[inch])



Panels



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