

VPort 364 Series

Excellent video quality, 4-channel H.264/MJPEG industrial video encoders



- > Dual simultaneous H.264 and MJPEG video streams
- > Video latency under 200 ms
- > Moxa DynaStream™ function supported for network efficiency
- > ONVIF supported for standardization and interoperability
- > 802.1X and SSL/SSH for advanced network security
- > Industrial design with -40 to 75°C operating temperature
- > VPort SDK PLUS provided free



Introduction

The VPort 364 is a 4-channel industrial video encoder that supports the H.264 video compression algorithm, which uses less bandwidth than other video compression standards; the VPort 364 provides the best video quality available on the market today. In addition, the VPort 364 supports simultaneous dual video streams with different formats:

H.264 and MJPEG. The two video streams can be used for different purposes, such as viewing, recording, or analysis. In addition, the rugged industrial design with -40 to 75°C operating temperature, built-in fiber Ethernet ports, IP30 protection, and industrial certifications, make the VPort 364 highly suitable for use in harsh environments.

Specifications

Video

Video Compression: H.264 (MPEG4 part 10, AVC) or MJPEG
Video Inputs: 4, BNC connector (1.0 Vpp, 75 ohm)
Video Streams: Dual streams (one for H.264, the other for MJPEG)
NTSC/PAL: Manual
Video Resolution and FPS (frames per second) in single video stream:

	NTSC		PAL	
	Size	Max. FPS	Size	Max. FPS
QCIF	176 x 112	30	176 x 144	25
CIF	352 x 240	30	352 x 288	25
VGA	640 x 480	30	640 x 480	25
4CIF	704 x 480	30	704 x 576	25
Full D1	720 x 480	30	720 x 576	25

Note: When enabling H.264 and MJPEG video streaming simultaneously, the total FPS of these 2 video streams will be approximately 30 FPS. For example, if MJPEG is configured at 10 FPS, then H.264 will be configured at 20 FPS.

Video Viewing:

- DynaStream supported for changing the video frame rate automatically
- Adjustable image size and quality
- Timestamp and text overlay

Audio

Audio Inputs: 1, Line-in or MIC-in with RCA connector
Audio Outputs: 1, Line-out with RCA connector
Audio Format: Mono, PCM

Network

Protocols: TCP, UDP, HTTP, SMTP, FTP, NTP, DNS, DHCP, UPnP, RTP, RTSP, ICMP, IGMPv3, QoS, SNMPv1/v2c/v3, DDNS, Modbus/TCP, 802.1X (Pending), SSL/SSH (Pending)
Ethernet: 1 10/100BaseT(X) auto negotiating RJ45 port, or 1 100BaseFX fiber port (single/multi-mode, SC connector)

Serial Port

PTZ Ports: 1, RS-232/422/485 port (5-pin terminal block connector), max. speed of 115.2 Kbps

Console Port: 1, RS-232 RJ45 port

GPIO

Digital Inputs: 4, max. 8 mA
 Low: +13 V to +30 V; High: -30 V to +3 V

Relay Outputs: 2, max. 24 VDC @ 1 A

LED Indicators

STAT: System status

PWR1: Power 1

PWR2: Power 2

FAULT: Can be configured to correspond to system alarm, power failure, or disconnected network

V1, V2, V3, V4: Video input signal activity for channels 1 to 4

Power Requirements

Input Voltage: 2 12 VDC or 24 VDC/VAC inputs for redundancy, terminal block connector

Power Consumption: Max. 7.5 W

Physical Characteristics

Housing: Metal, IP30 protection

Dimensions: 80.2 x 135 x 105 mm (3.16 x 5.31 x 4.13 in)

Weight: 1110 g

Installation: DIN-Rail mounting or panel mounting (with optional mounting kit)

Alarms

Video Motion Detection: Includes sensitivity tuning

Video Loss: Video loss alarm

Scheduling: Daily repeat timing schedule

Imaging: JPEG snapshots for pre/trigger/post alarm images

Email/FTP Messaging: Automatic transfer of stored images via email or FTP with event-triggered actions

Custom Alarms: HTTP event servers and CGI events for setting customized alarm actions

Pre-alarm Buffer: 24 MB per channel for JPEG snapshot images

PAN/TILT/ZOOM

PTZ Camera Control: Via RS-232/422/485 PTZ port

PTZ Control Functions: PAN, TILT, ZOOM, FOCUS, moving speed, preset position (max. 25 positions), and 24 custom commands

PTZ Function Updates: Driver upload supported

Supported Device Protocols: Pelco D, Pelco P, Dynacolor DynaDome, Cohu, Custom Camera

Transparent PTZ Control: Control PTZ cameras with legacy PTZ control panel or keyboard connected to a PC or VPort decoder

Security

Password: User level password protection

Filtering: By IP address

Authentication: 802.1X (Pending)

Encryption: SSL/SSH (Pending)

Environmental Limits

Operating Temperature:

Standard Models: 0 to 60°C (32 to 140°F)

Wide Temp. Models: -40 to 75°C (-40 to 167°F)

Storage Temperature: -40 to 85°C (-40 to 185°F)

Ambient Relative Humidity: 5 to 95% (non-condensing)

Standards and Certifications

Safety: UL 60950-1

EMI: FCC Part 15 Subpart B Class A, EN 55022 Class A

EMS:

EN 61000-4-2 (ESD), Level 2; EN 61000-4-3 (RS), Level 3;

EN 61000-4-4 (EFT), Level 3; EN 61000-4-5 (Surge), Level 3;

EN 61000-4-6 (CS), Level 3; EN 61000-4-8; EN 61000-4-11

Shock: IEC 60068-2-27

Freefall: IEC 60068-2-32

Vibration: IEC 60068-2-6

Note: Please check Moxa's website for the most up-to-date certification status.

MTBF (mean time between failures)

Time: 465,000 hrs

Database: Telcordia (Bellcore), GB 25°C

Warranty

Warranty Period: 5 years

Details: See www.moxa.com/warranty

System Requirements

Minimum Viewing System Requirements

CPU: Pentium 4, 2.4 GHz or above

Memory: 512 MB memory or above

OS: Windows XP/2000 with SP2 or above

Browser: Internet Explorer 6.x or above

Multimedia: DirectX 9.0c or above

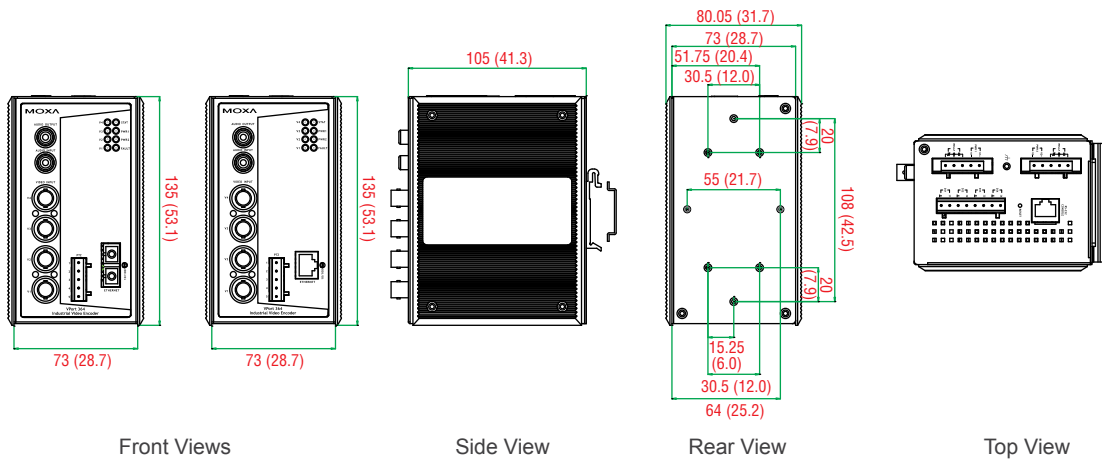
Software Development Kit

VPort SDK PLUS: Includes CGI commands, ActiveX Control, and API library for customized applications or system integration for third-party developers (the latest version of SDK is available for download from Moxa's website).

Standard: ONVIF

Dimensions

Unit: mm (inch)



Ordering Information

Available Models		Port Interface		
Standard Temperature (0 to 60°C)	Wide Temperature (-40 to 75°C)	10/100/1000 BaseT(X)	Multi-mode, SC Connector	Single-mode, SC Connector
VPort 364	VPort 364-T	1	–	–
VPort 364-M-SC	VPort 364-M-SC-T	–	1	–
VPort 364-S-SC	VPort 364-S-SC-T	–	–	1

Optional Accessories (can be purchased separately)

SoftNVR-IA V3.0: 64-channel IP surveillance software for industrial automation applications

DR-4524/75-24/120-24: 45/75/120 W DIN-rail 24 VDC power supplies

MDR-40-24/60-24: 40/60 W DIN-rail 24 VDC power supplies, -20 to 70°C operating temperature

WK-46: Wall mounting kit

RK-4U: 4U-high 19" rack mounting kit

Package Checklist

- VPort 364 video encoder
- 2 5-pin terminal blocks for 2 power inputs and 2 relay outputs
- 8-pin terminal block for 4 DIs
- 5-pin terminal block for the RS-232/422/RS-485 PTZ control port
- Quick installation guide (printed)
- Documentation and software CD
- Warranty Card