

IMPERX

EIPVR: EtherNET/IP™ Process Video Recorder Third Generation



Camera image supplied may not reflect actual dimensions or mount for this model. Refer to mechanical dimensions and ordering information on reverse side.

See the problem, *fix* the problem.
Reduce downtime and eliminate guesswork.

Imagine having the ability to see the events before and after a process failure in slow motion from your office, your home, or wherever business takes you! The EtherNet/IP™ Process Video Recorder (EIPVR) is self-contained and embeds into a production line, seamlessly interfacing with your PLC or plant floor computers to capture high speed video of your process and machinery.

Leveraging off open standards, the EtherNet/IP™ PVR starts with ruggedized high speed Power over Ethernet (PoE) camera systems which continuously record video at up to 250 frames per second. Upon receipt of an EtherNet/IP™ trigger, an AVI/MPEG-4 file is created and loaded onto a mapped network drive for easy access via your plant floor or remote PC. With the EIPVR, you can conveniently collaborate with experts world-wide quickly driving to root cause and resolving system failures.

- supports up to 4 cameras recording simultaneously
- in either monochrome or color

Process Video Recorder



NEW Triggering Capabilities

In addition to receiving triggers via EtherNet/IP™ our 3rd generation system has been enhanced to receive triggers from the following:

- **TCP/IP:** TCP/IP opens up the possibility of using a standard PC to send triggers. An example program is provided.
- **Digital Input (24 VDC):** Normally, a PLC is used to sense a digital input and generate an EtherNet/IP™ trigger. In cases where a PLC is not available we also accept a digital input directly to our EIPVR controller.
- **Inspection Result:** Imagine an inspection system that not only finds a defect but also provides the video that caused it. For example, when a cap is not on a bottle you also receive a video of the bottle at the capping machine to see what happened. Inspection results can be absence/presence, code reading, contamination, color matching, OCR, and more.

PVR Configuration

Configuration is easy. Just use your favorite web browser to access the PVR's built-in web server. From there you can view live video or adjust parameters such as exposure, frame rate, and the shared drive path.

Event Analysis

Our comprehensive, yet easy-to-use, view utility allows the user to view recorded events with:

- User configurable playback speed
- Ability to crop video and save shorter video clips
- Ability to add bookmarks with user notes
- Automatically polls the video server for new videos
- ActiveX controls included



EIPVR Specification

	Description
Recording	Records up to 60 seconds of video at 250 frames per second (fps) with user specified pre and post trigger duration. Longer recording durations possible at slower frame rates. Upon receipt of EtherNet/IP™ trigger, an AVI/MPEG-4 file is created on a shared drive path AVI file can be a subset of the 60 second video buffer
Trigger	<ol style="list-style-type: none"> 1. EtherNet/IP™ command containing the start and duration of recording using IEEE 1588 or relative time 2. TCP/IP™ command containing the start and duration of recording using IEEE 1588 or relative time 3. Digital Input (24VDC) - <i>optional</i> 4. Image Processing Result - <i>optional</i>
Configuration Parameters	Frame rate, exposure, shared drive path, AVI or MPEG-4 file format
Camera	IMPERX monochrome progressive scan CMOS, offering 3 resolutions (1920x1080, 1280x760, 640x480), up to 250 fps, C-mount, Power over Ethernet (PoE). Can be located up to 100 m from controller using Cat6 cable Operating Temp: -40° C to +85° C; Storage Temp: -50° C to +90 °C
EIPVR Controller	Four PoE Gigabit Ethernet ports for cameras and two standard Gigabit Ethernet ports. Dimensions (W x D x H): 260 x 150 x 68 mm (10.24" x 5.90" x 2.68") Input power: 24 VDC Operating Temperature: 0°C to +50°C
Optional Camera Enclosure	Standard Protection: Aluminum enclosure, 70 mm diameter x 15 mm. Accommodates LED ring light. IP67 Protection: Available upon request
Optional LED Ring Light	90 mm diameter, white LEDs, PoE Interface (able to power ring light & camera with a single Cat5e or Cat6 cable). Other LED wavelengths upon request.

EIPVR Ordering Information

	Category	Manufacturer Part Number	Description
Main Models	EtherNet/IP™ Process Video Recorder	EIPVRCTRL4	EIPVR controller with support for up to four (4) cameras w/ AC Power
		EIPVRCTRL4/INSP	EIPVR controller with support for up to four (4) cameras w/ AC Power. Includes inspection capability.
		EIPVRCAM	Event Recorder & Viewer Software, camera, 8mm lens
		EIPVRCAMHD	Event Recorder & Viewer Software, HD camera, 8mm lens
		EIPVRCAMIP67	Event Recorder & Viewer Software, IP67 Housing, HD camera, 8mm lens
Ordering Options	Enclosures*	ELC-A11AP0-AB000	Aluminum enclosure & LED ring light combination, sliding lens adjustment, PoE interface, two mounting brackets
		ENC-A11LP0-SB000	Aluminum enclosure, 70 mm diameter x 15 mm. Accommodates LED ring light. Includes two (2) mounting brackets
	LED Ring Light*	LED-R090W0-GM000	LED ring light, 90 mm, white LEDs, PoE interface
	GigE Cables	GET-2	GigE cable, RJ45 to RJ45 thumbscrew, 2 m
		GET-30	GigE cable, RJ45 to RJ45 thumbscrew, 30 m
		GET-50	GigE cable, RJ45 to RJ45 thumbscrew, 50 m
			Other lengths available upon request
	Lenses	NCN38014	8 mm lens, f1.4-1.6, M27xP0.5
		NCN31214	12 mm lens, f1.4-1.6, M27xP0.5
			We offer fixed focal length lenses from 3.5 mm to 100 mm
NCZ85900		Manual zoom lens, 8.5-90 mm, F2.5-close, M48 x P0.75	
		Motorized zoom lenses (iris, focus, zoom) available as an option	
Regulation			FCC, CE Certification (Imperx, Inc. has been assessed and certified as meeting the requirements of ISO: 9001:2008 and ISO: 14001: 2004)

* Options indicated are for EIPVRCAM only.



Authorized Automation Distributor
North Coast Technical, Inc
 8761 Mayfield Rd, Suite 302
 Chesterland, OH 44026
 (440) 729-7540 | sales@nctechsales.com | www.nctechsales.com

Rev: eipvr_r6_2019



Industrial Cameras & Imaging Systems

+1-561-989-0006 | sales@imperx.com | www.imperx.com