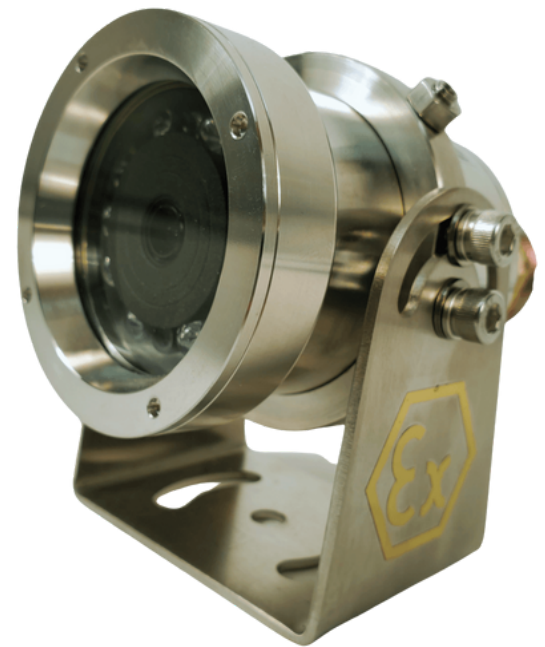
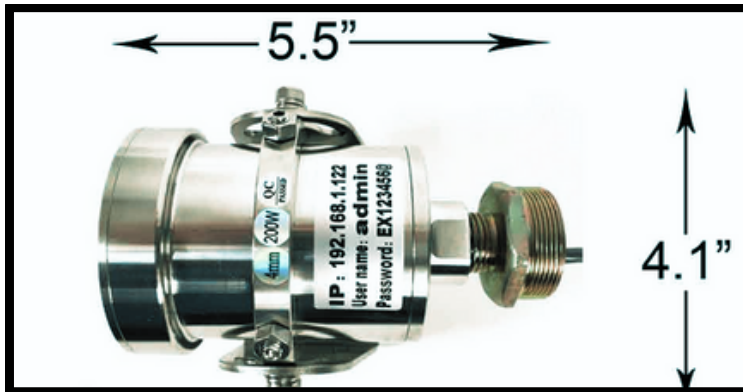


EXPLOSION PROOF INFRARED IP



RUGGEDCAMS

DIMENSIONS



Camera	
Sensor	1/2.7", 2 megapixel scan CMOS
Lens	4mm Fixed Focal Length (F1.2)
Effective Focal Length (35mm Equivalent):	~42 mm (standard-angle, not wide)
CPU	TI-DSP
Min Illumination	Color: 0.1 lux @ F1.2 B/W: 0.01 lux @ F1.2 (IR assist)
IR Range	100 Ft.
IR Wavelength	850 nm LEDs, effective up to 100 ft (30 m)
Day/Night	Automatic Day/Night switching
IR Switch	IR Lamp Auto-Open when <0 Lux
S/N	>52db
Noise Reduction	2D/3D-DNR
Video	
Max Resolution	1920x1080
Video Compression	H.265, H.264, MJPEG
Frame Rate	1080P (1920x1080): Max 25fps, 720 (1280x720): Max 25 fps
Image Setting	Rotate mode, Saturation, Brightness, Contrast adjustable by client software web browser
H.264 Encoding type	Base Line Profile? Main Profile
Compression Output Rate	32 Kbps-8Mbps
Video Streaming	Main and Sub

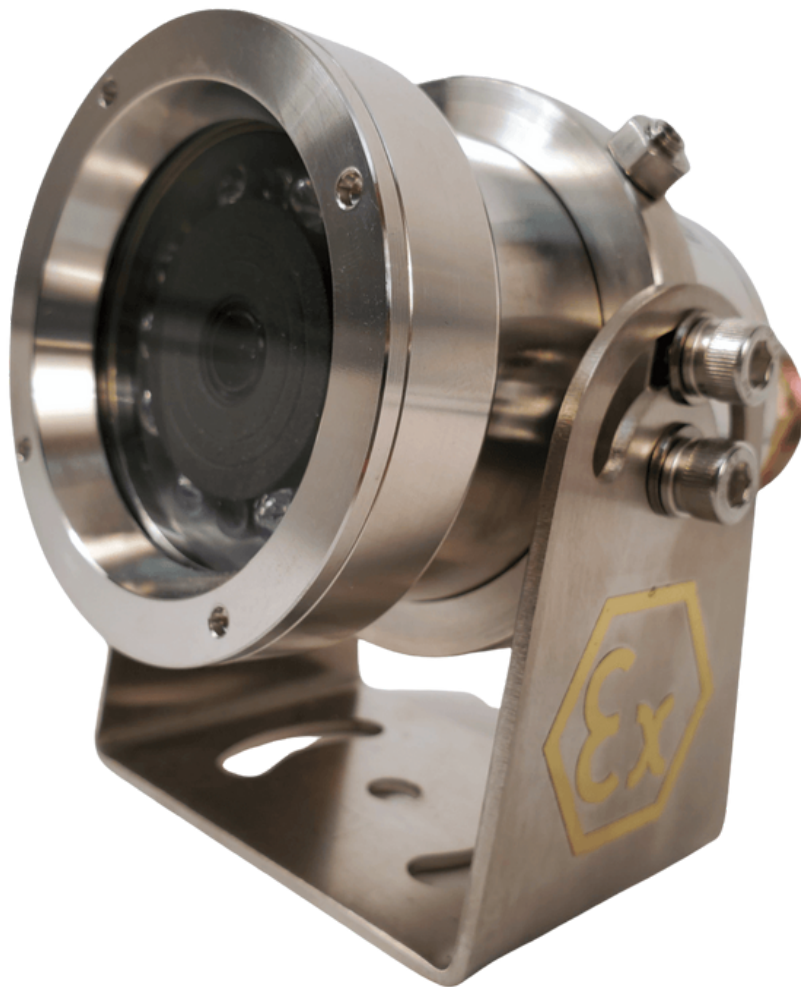
Network	
Protocols	RTSP/FTP/PPPOE/DHCP/DDN NTP/Upnp
Compatible Integration	ONVIF, PSIA, CGI, ISAPI, GB28181

Engineering	
Hyperfocal Distance:	~12.8 ft (3.9 m) — sharp focus from ~6.5 ft (2 m) to infinity
Field Coverage (Horizontal)	10 ft distance → ~6.7 ft wide view 25 ft distance → ~16.7 ft wide view 50 ft distance → ~33.5 ft wide view
Dynamic Range (Effective)	~60–70 dB (with 2D/3D DNR)
Infrared Sensitivity	CMOS QE ~20–25% @ 850 nm (supports 100 ft IR range)
Latency (Typical)	~150–250 ms on LAN with H.265
Streaming	Supports dual-stream (primary 1080p + substream at lower res)
Thermal Features	Heater/defogger (cold-start capable at -40°C)
Reliability	MTBF: >50,000 hrs (no moving parts except IR cut filter) Shock Resistance: >20G typical Vibration Resistance: >3G typical

General	
Material	304 Stainless and 316L Stainless
Power	48V PoE or 12VDC Extrenal Power Consumption: Max 17.23W
Dimensions	5.5"x 3.6"x 4.1"
Weight	2.6 lbs
Working Environment	-40°C to +60°C (-40°F to +140°F)
Ingress Protection	IP66
Compliance	NDAA Compliant, ATEX Explosion Proof (Zone 1 / Zone 2 certified)

EXPLOSION PROOF INFRARED IP

SPECIFICATIONS & QUICK START GUIDE



RUGGEDCAMS

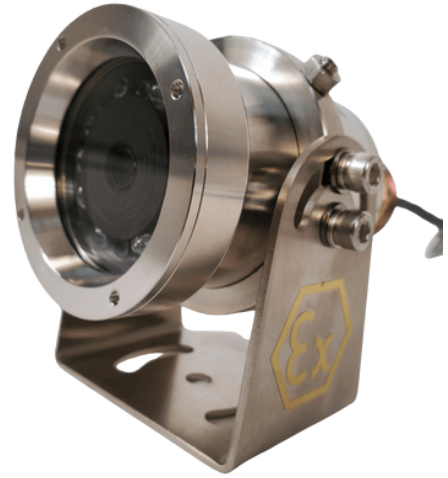
EXPLOSION PROOF INFRARED IP



RUGGEDCAMS

PRODUCT OVERVIEW

THIS EXPLOSION-PROOF MINI IP CAMERA IS BUILT FOR EXTREME ENVIRONMENTS WHERE RELIABILITY AND SAFETY ARE CRITICAL. HOUSED IN 316L OR 304 STAINLESS STEEL, IT'S DESIGNED FOR CORROSION RESISTANCE, RUGGED DURABILITY, AND HIGH-QUALITY VIDEO STREAMING OVER IP NETWORKS.



WHAT'S INCLUDED

- EXPLOSION-PROOF MINI IP CAMERA
- STAINLESS STEEL MOUNTING BRACKET
- MOUNTING HARDWARE
- COAXSEAL (FOR WEATHER-SEALING CONNECTIONS)
- QUICK REFERENCE LABEL WITH IP ADDRESS AND CREDENTIALS

KEY FEATURES

- HOUSING: 316L OR 304 STAINLESS STEEL (MODEL-DEPENDENT)
- INGRESS PROTECTION: IP67-RATED
- VIDEO OUTPUT: IP (ONVIF COMPLIANT), DUAL-STREAM SUPPORT
- POWER: POE (IEEE 802.3AF) OR OPTIONAL 12V DC
 - 12V DC WIRING: BROWN = POSITIVE (+), BLUE = NEGATIVE (-)
- DEFAULT ACCESS:
 - IP ADDRESS: SEE LABEL ON CAMERA
 - USERNAME: ADMIN
 - PASSWORD: SEE LABEL ON CAMERA
- NETWORK PROTOCOLS: ONVIF, RTSP, HTTP, TCP/IP

INSTALLATION GUIDE

1. PHYSICAL MOUNTING

- MOUNT SECURELY USING THE STAINLESS BRACKET AND INCLUDED SCREWS.
- CHOOSE A SOLID SURFACE AWAY FROM VIBRATION OR ELECTRICAL INTERFERENCE.
- ALLOW SPACE FOR CABLE ROUTING AND ADJUSTMENT.

2. POWER & NETWORK CONNECTION

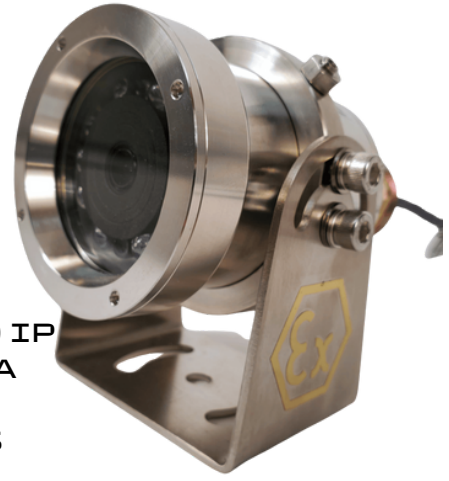
- PLUG IN AN ETHERNET CABLE TO A POE-ENABLED SWITCH, INJECTOR, OR NVR PORT.
- IF NOT USING POE, CONNECT 12V DC POWER:
 - BROWN = +12V
 - BLUE = GROUND

USE COAXSEAL AROUND RJ45 CONNECTORS OR ENCLOSURES TO ENSURE MOISTURE RESISTANCE IF INSTALLED OUTDOORS OR IN WET ENVIRONMENTS.

EXPLOSION PROOF INFRARED IP



RUGGEDCAMS



NETWORK SETUP

1. LOCATING THE CAMERA

- IF THE CAMERA IS NEW, THE DEFAULT IP ADDRESS, USERNAME, AND PASSWORD ARE PRINTED ON THE LABEL ATTACHED TO THE CAMERA.
- IN MOST CASES, YOU CAN SIMPLY TYPE THE LISTED IP ADDRESS INTO A BROWSER TO ACCESS THE CAMERA DIRECTLY.
- IF YOU'VE CHANGED THE IP OR ARE UNSURE OF ITS ADDRESS, YOU CAN USE THE IP MANAGER TOOL TO REDISCOVER IT ON YOUR NETWORK. THIS UTILITY IS AVAILABLE FOR DOWNLOAD FROM THE TECH SUPPORT SECTION OF OUR WEBSITE: [DOWNLOAD IP MANAGER](#)

2. ACCESSING THE CAMERA

- ENTER THE CAMERA'S IP IN A BROWSER (PREFERABLY INTERNET EXPLORER OR EDGE IN IE MODE FOR LEGACY COMPATIBILITY).
- LOG IN WITH CREDENTIALS FOUND ON THE CAMERA LABEL.
- CHANGE:
 - IP ADDRESS (TO MATCH YOUR NETWORK)
 - PASSWORD (FOR SECURITY)

CONNECTING TO A NETWORK VIDEO RECORDER

FOR ENVIROCAMS NVR:

1. LOG INTO THE NVR LOCAL INTERFACE OR WEB GUI.
2. GO TO CAMERA > ADD CAMERA.
3. SELECT MANUAL ADD.
4. ENTER THE IP ADDRESS OF THE CAMERA.
5. PROTOCOL: ONVIF
6. PORT: DEFAULT ONVIF PORT (USUALLY 8000 OR 8899)
7. ENTER LOGIN INFO AND CLICK ADD.
8. WAIT FOR THE STATUS TO SHOW CONNECTED OR ONLINE.

FOR OTHER ONVIF-COMPATIBLE NVRS:

- FOLLOW A SIMILAR PROCEDURE USING THE ONVIF PROTOCOL.
- USE THE CORRECT PORT AND ADMIN CREDENTIALS.
- IF THE NVR SUPPORTS AUTO-DISCOVERY, THE CAMERA MAY APPEAR IN THE DEVICE LIST.

•

RTSP STREAM ACCESS

YOU CAN ACCESS THE RTSP STREAM DIRECTLY USING COMPATIBLE SOFTWARE (VLC, BLUE IRIS, ETC.) OR INTEGRATE IT INTO AN NVR OR VMS.

RTSP FORMAT:

RTSP://ADMIN:[PASSWORD]@[CAMERA_IP]:554/STREAM1

EXAMPLE:

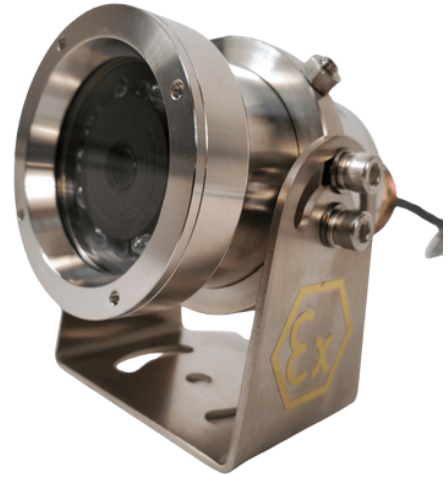
RTSP://ADMIN:123456@192.168.0.185:554/STREAM1

- STREAM1 = MAIN STREAM (USUALLY FULL RESOLUTION)
- STREAM2 = SUB-STREAM (LOWER RESOLUTION)

EXPLOSION PROOF INFRARED IP



RUGGEDCAMS



BEST PRACTICES

- **USE COAXSEAL ON ALL OUTDOOR NETWORK CONNECTIONS.**
- **REGULARLY INSPECT FOR CORROSION OR PHYSICAL DAMAGE IN HIGH-RISK ZONES.**
- **UPDATE FIRMWARE ONLY WHEN NECESSARY AND USING TRUSTED FILES/TOOLS.**

Common Issues & Troubleshooting

Problem	Solution
No video in NVR	Check IP, credentials, and ONVIF port. Confirm camera is powered.
Can't find camera	Ensure camera and PC/NVR are on the same subnet. Use discovery tools.
No RTSP video	Confirm RTSP URL, correct password, and that port 554 is open.
Power issues	Use only PoE or 12V DC—not both simultaneously unless specified safe.