

Explorer-Pro

Low Light Monochrome Camera

Low light sensitivity 2×10^{-5} lux faceplate

The Teledyne Bowtech EXPLORER PRO low light level high resolution monochrome underwater CCD camera, is the ideal solution for extremely low light level, underwater viewing and navigation, yet still producing excellent images in high intensity illumination.

The camera housing is manufactured using high quality hard anodised aluminium, rated to 2,000 metres operating depth as standard, or titanium housing, rated to either 4,000 or 6,000 metres operating depth.

The camera is fitted with a wide angle, high speed, aspherical lens, giving a diagonal field of view of 103° through a fully water corrected front port. The camera features built-in reverse polarity and surge protection.

The miniature, high quality $1/2''$ CCD sensor, offers high resolution and low light level sensitivity. It is the ideal camera for low light underwater viewing tasks.



Applications: ROV/AUV, Defence

PRODUCT FEATURES AND BENEFITS

- High resolution monochrome 570TVL
- Wide angle 103° diagonal in water
- Water corrected optics
- Practically SIT performance
- Low light sensitivity 2×10^{-5} lux faceplate
- 2000m rated hard anodised aluminium
- 4000m or 6000m rated titanium housing



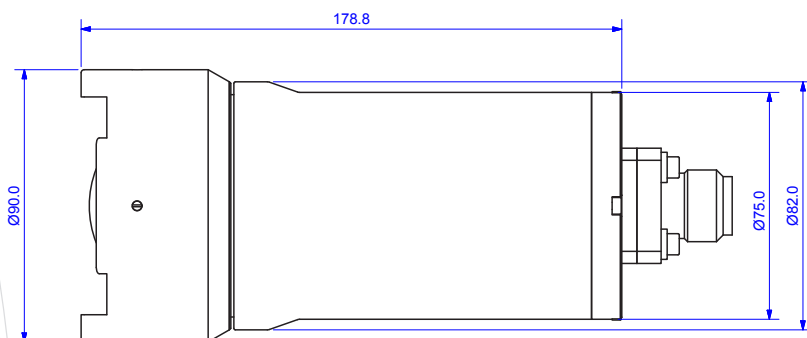
TELEDYNE BOWTECH
Everywhereyoulook™

Explorer-Pro

Low Light Monochrome Camera

TECHNICAL SPECIFICATIONS

| | | |
|---------------|------------------------|--|
| Electrical | Resolution | 570 TV lines horizontal, 570k pixels |
| | Minimum Illumination | 2×10^{-5} lux (faceplate) |
| | Sensor Type | 1/2" CCD |
| | Sensor Elements | 752 (H) x 582 (V) CCIR, 768 (H) x 494 (V) EIA |
| | Signal to Noise Ratio | >52dB |
| | Scanning | 625 line 50Hz CCIR, 525 line 60Hz EIA |
| | Input Voltage | 12 to 24 Vdc |
| | Current | 170 mA maximum |
| | Composite Video Output | 1.0 V pk-pk Ω |
| Environmental | Depth Rating | 2000m, or 4000m and 6000m options |
| | Storage Temperature | -30°C to +70°C |
| | Operating Temperature | -10°C to +40°C |
| | Shock | 3 Axis (operating), 30g peak, 6ms half-sine pulse |
| | Vibration | 10g, 20-150Hz |
| Optical | Lens | Wide angle, high speed, aspherical |
| | Iris Control | Automatic |
| | Focus Fixed | 300mm to infinity |
| | Angle of View in Water | 93° (H) x 68° (V) 103° diagonal |
| | Window | Fully water corrected quartz glass |
| Mechanical | Dimensions | 75mm (d) x 178.8 (l) (excluding connector) |
| | Weight in Air | 1.4kg aluminium / 1.9kg titanium |
| | Weight in Water | 0.5kg aluminium / 1.0kg titanium |
| | Standard Housing | Hard anodised aluminium-6082-T6 or titanium alloy grade 5 option |
| | Standard Connector | 5506-1508 |
| | Optional Connector | Large selection of connectors available |



Connector Face Patterns not to scale



55 Series MCBH Micro Seanet
Wetcon



Specifications subject to change without notice.
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