


STARLIGHT
ITALIA

EO/ULL/IR/NV CAMERA PAYLOAD

Features

- Light weight
- Multiple choice of sensor
- Ruggedized for maritime application
- Operator interface unit
- Multi-format video outputs
- Radar slaving
- Gyrostabilization



**X
S
E
R
I
E**

FEATURES

X SERIE marries mechanical and electro-optical engineering to provide users with discrete self-contained systems.

Navigation:

The X SERIE multi sensor payload boasting of thermal imaging, night vision based on 2A+ light amplification tube and optical day camera to provide unparalleled, hazard detection, threat assessment and situational awareness 24/7.

Operator Interface:

A range of operator control panels are available that enables X SERIE systems to be integrated both in new and existing ship configurations.

Gyrostabilization

The X SERIE is equipped, as option, with gyro platform, based on a proprietary software.

The **X SERIE** is designed to be used for various marine applications like SAR (Search and Rescue) boats, law enforcement vessels, high-speed patrol craft and other types of vessels.

The camera can provide equally clear, high resolution video in total darkness, as well as in bright sunlight.

You can even see through smoke and fog.

The camera module is actively stabilized to counteract the motion of the ship and providing a live video feed.

The X SERIE can be completely custom built to meet your exact requirements.

Options include, but are not limited to, night vision camera, uncooled thermal cameras, ultra low-lux cameras, zoom low-lux cameras, radar integration, gyro stabilization, video computing and more.

MAIN APPLICATIONS:

1. SAR (Search and Rescue) operations:

- Quick and easy search for anomalies even on rough sea conditions.
- Safe and exact navigation during the SAR operation.
- Recording SAR or MOB operations.

X SERIE system create new opportunities for SAR operations and makes them more safe and effective.

2. LAW ENFORCEMENT

- Law enforcement, speedboat, police thermal marine cameras.
- Night vision and navigation systems.
- Identification of the vessels at limited visibility.
- Detection illegal traffic on sea and pollution monitoring.
- Detecting unexposed boats and blind pilotage assistance.
- SAR operations.

X SERIE camera system provides the opportunity to identify the vessels at night and in poor visibility and on rough sea conditions.

3. ICE DETECTION

- Ice and iceberg detection thermal marine cameras and night vision..
- X SERIE camera system** for ice detection ensures higher safety even in rough sea conditions and at night.

The camera system gives a much broader and more accurate live video feed of the location of ice bank compared to the commonly used information provided by the radar and the narrow search light.





	SX NIGHTHAWK	SX NIGHTHAWK PRO	SX PL 640	SX IR FORCE	SX STARLIGHT ONE FB DESIGN
360° Continuous Pan	●	●	●	●	●
360° Continuous Tilt				●	●
3 Axis Joystick				●	●
Proportional Touch Joystick	●	●	●	●	●
Embedded DVR		●		●	●
Ultralow-lux day color camera	●	●	●	●	●
Light Intensifier Electron Tube	●	●			●
High-Sensitivity Thermal Camera			●		
Ultra-Sensitivity Shutterless Thermal Camera				●	●
Day Camera Optical Zoom				●	●
Thermal Camera Digital Zoom			●	●	●
Auto Image Reversal Function				●	●
OSD Multi-touch Function				●	●
ISP Multi-touch Display				●	●
Parallel View Function				●	●
Pip View Function				●	●
Image Computing Software				●	●
Radar Slaving				●	●
Gyro Stabilization	●	●	●	●	●
Multi Input Platform				●	●
Embedded UPS Aided				●	●

X-SERIE SENSORS

THERMAL CAMERA SX PL640:

FEATURES

FIELD OF VIEW / CAMPO VISIVO	HorizFov=34°. VertFov=26°. (@ wide zoom)
SENSOR / TIPO SENSORE	Uncooled FPA Microbolometer
RESOLUTION / RISOLUZIONE	640x480
NETD / SENSIBILITA' TERMICA	NETD ≤ 60mK
SPECTRAL RANGE / INTERVALLO SPETTRALE	8-14 μm
FOCAL LENGTH / LUNGHEZZA FOCALE	18 mm
FRAME RATE / FREQUENZA DEI FOTOGRAMMI	≥ 25 Hz
DIGITAL ZOOM	X1/X2/X3/X4
CALIBRATION	AUTO
DIGITAL FILTER	YES
GAIN/BRIGHTNESS ADJUSTMENT	FULL AUTO - BLACK / WHITE VIEW
OPERATION TEMPERATURE	-20°C / +60°C

THERMAL CAMERA SX IR FORCE / SX ONE

FEATURES

FIELD OF VIEW / CAMPO VISIVO	HorizFov=25°. VertFov=19°. (@ wide zoom)
SENSOR / TIPO SENSORE	Silicon CMOS Uncooled Microbolometer Chip
RESOLUTION / RISOLUZIONE	640x480 - 307200 pixel -17μm pitch.
NETD / SENSIBILITA' TERMICA	NETD <40mK @ Whole Band
SPECTRAL RANGE / INTERVALLO SPETTRALE	Longwave Broadband >7μm
FOCAL LENGTH / LUNGHEZZA FOCALE	25/35 mm
LENS TYPE	ATHERMALIZED - DIAMOND SURFACE TREATMENT
ZOOM	ULTRA DIGITAL UP TO 8X
FRAME RATE / FREQUENZA DEI FOTOGRAMMI	Shutterless Technology → from 30 up to 100 FPS
DETECTION RANGE / CAMPO DI RILEVAMENTO	Up to 1 Km-Man /3 Km-Small Boat @ 25mm Focal Length
HUMAN TARGET / BERSAGLIO UMANO	1 Km
DIGITAL SIGNAL PROCESSING	DSP STARLIGHT CALDERA™
VIDEO REFRESH RATE /FREQUENZA AGGIORNAMENTO - ACQUISIZIONE	50-60 Hz
IMAGE PROCESSING / ELABORAZIONE IMMAGINI	Video Grabbing, Recording. Multiview Real Time, PIP, Videoanalysis, Computer Graphica



X-SERIE SENSORS



LIGHT INTENSIFIER CAMERA X-SERIES_NIGHTHWAK / EVO

FEATURES

SENSITIVITY	0,000001 lux
FIELD OF VIEW / CAMPO VISIVO	HorizFov=30°. VertFov=30°
SENSOR / TIPO SENSORE	SuperGen. Intensifier Electron Tube Starlight
RESOLUTION / RISOLUZIONE	> 60 plmm
WINDOW TYPE	Electron Beam Treated Sapphire Glass

ULTRA LOW LIGHT COLOR CAMERA ALL MODELS

FEATURES

SENSITIVITY	0,00005 lux @ color
FIELD OF VIEW / CAMPO VISIVO	HorizFov=30°. VertFov=30°. (@ wide zoom)
SENSOR / TIPO SENSORE	SuperChip II SSNR III Starlight
RESOLUTION / RISOLUZIONE	1000 lines

ULTRA LOW LIGHT ZOOM SX IR FORCE / SX ONE

FEATURES

OPTICAL ZOOM	20X
DIGITAL ZOOM	COMBINED 40X
SENSOR / TIPO SENSORE	SuperChip II SSNR III Starlight
RESOLUTION / RISOLUZIONE	1000 lines

OTHERS

FEATURES

PTZ PAN TILT RANGE	360° CONTINUOS
PTZ PAN SPEED	0°- 100°/S
VIDEO OUTPUT	DVI / VGA / HDMI / COMPOSITE SIGNAL
VIDEO FORMAT	PAL (NTSC)
VOLTAGE	9-36 V DC
CONSUMPTION	50W
IP GRADE	IP67
DIMENSION	180X180X310 mm
WEIGHT	4,9 kg


STARLIGHT

Starlight Italia is a provider of marine security, marine safety and marine solutions to world wide customers. Since 2005 Starlight Italia was one of the first company in the world, to complete certification product from IMO, (MED) with the very stringent requirements for night vision installations on High Speed Craft ferries. During our history we have installed more than 100 night vision systems around the world.

Starlight Italia NVS help customers with their critical needs in:

- Detection of vessels, obstacles, people and other objects
- Decision and action through warnings or triggering pre-defined action after detection in darkness of threat or possible collision

Solutions Starlight Italia NVS ultra-low light cameras, image intensifiers and thermal sensors to enhance surveillance and detection capability

Starlight Italia products are designed to operate continuously for long periods in hard marine conditions.

Starlight Italia's products can satisfied all clients requirements and specifications providing a wide scale of product configuration and price.



Starlight Italia S.r.l.

Tel. +39 081 563 45 91

Fax +39 081 563 64 26

Mob. +39 333 4096003

Mob. +39 335 6630194

E-mail: info@starlightitalia.com

www.starlightitalia.com