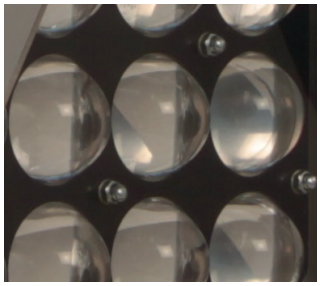
E8554

LED range light signal for leading lights, up to 24 M range

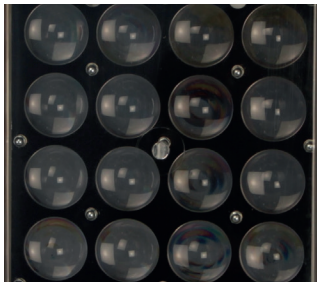
The E8554 is a robust high-performance, long life marine LED range lantern with several standard beam configuration alternatives available. The field proven E8554 design is foreseen with life cycle extension capability by replacing the LEDs after ten to twelve years for improved power efficiency. An E8554 Lantern supports fast PWM control necessary for generating navigational signals at reduced intensities, as well as for utilizing Fixed-and-Flashing (FFL) rhythmic characters or Slow Flash Front (SFF).

- **Standard IALA colours Red, Green, White**
- **Factory-customized luminous intensity with peak value depending on selected colour and horizontal divergence**
- **Uniquely uniform beam width "flat top" horizontal profile, 3.5° to 30° FWHM**
- **Vertical divergence ≥ 3.8° (FWHM)**
- **Focal height 216 mm**
- **Internal redundant arrays and constant current electronics, dual power/signal receptacles as standard**
- **Stainless steel outer frame and pedestal, aluminium heat sink / back plate**
- **A 4x6 matrix of 24 lenses of machined optical grade UV-stable acrylic**
- **UV resistant, field-replaceable polycarbonate front cover**
- **Robust light unit for redundant AtoN systems without programmable parts inside**
- **Two built-in light sensors for redundant control systems**
- **Day and Night mode luminous intensities are currently configured by flasher by adjusting PWM duty cycle, hard-wired D/N intensities for external selection a future option**
- **Optionally available in "smart" version with externally integrated flasher and telematics controller**
- **Optionally available without the pedestal for building LED clusters for high-intensity leading lines**

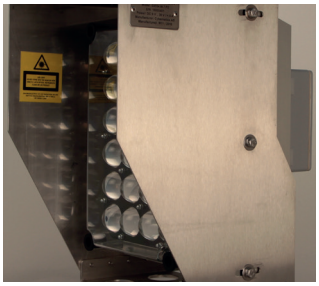


High power LEDs and custom optics
Flexible platform for several horizontal divergence alternatives.

Integrated light sensors
Redundant leading light systems may use either integrated or additional light sensors.

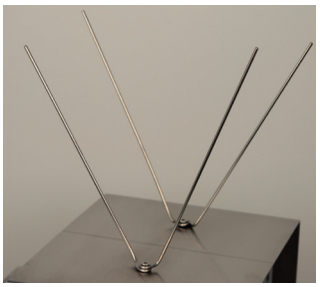


Field-replaceable protective screen
UV-stable polycarbonate front cover with integrated PUR seal is a commercially available spare part.

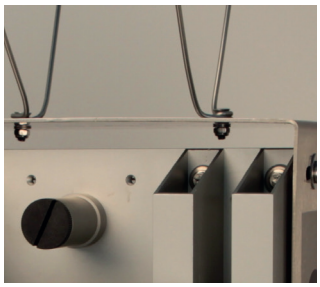


Vertical beam tilting arrangement
The light module can be tilted inside the protective frame within the limits of ±6°.

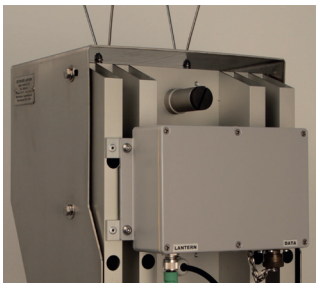
Pedestal
Combination of three and four Ø16 mm mounting holes on a 200 mm ring. Horizontal beam alignment within ±8° is possible by turning the light unit on the pedestal.



Bird Deterrents
Stainless steel as standard.



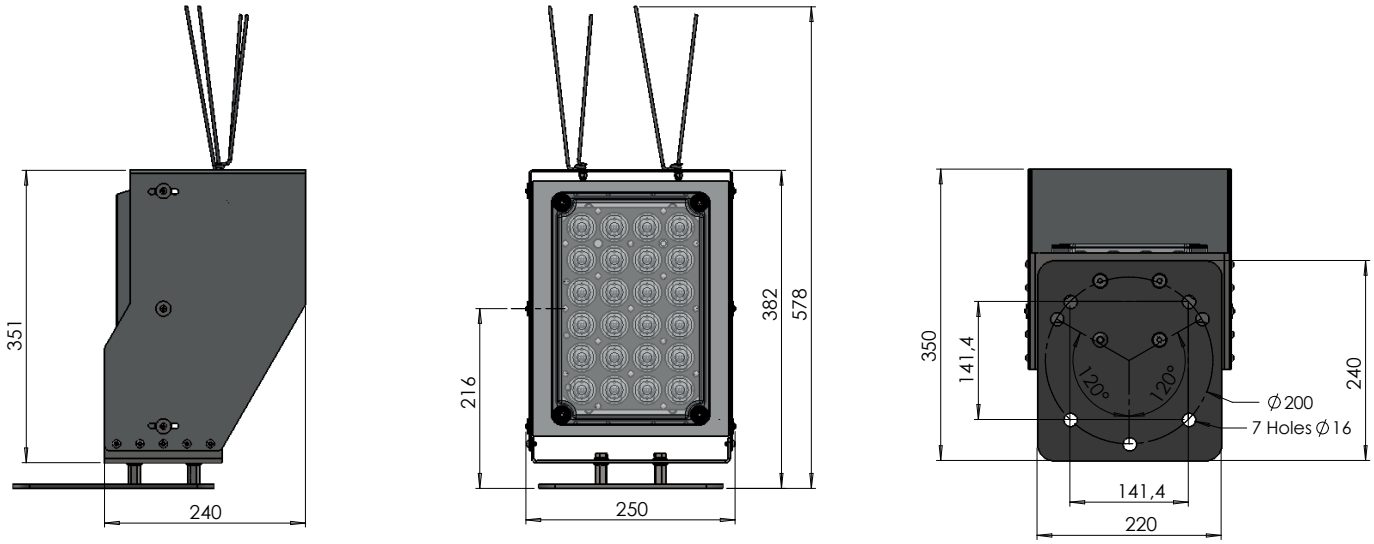
Sighting Scope mount
Mechanical interface for attaching an optional Sighting Scope.



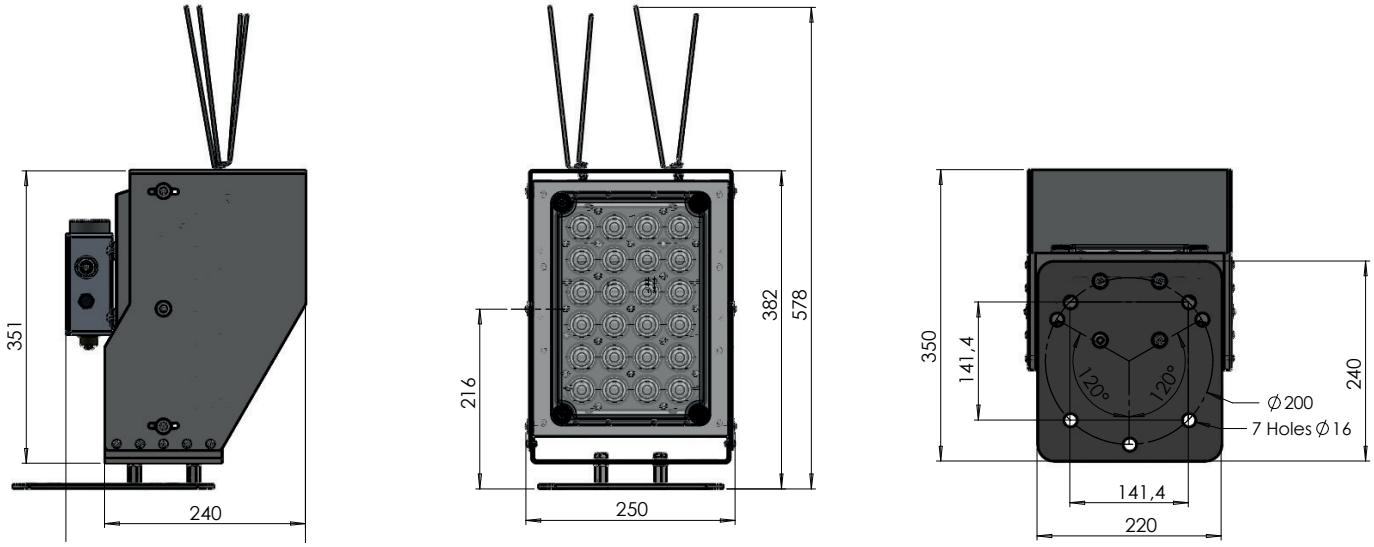
Optional integrated flasher
Alternatives range from simple robust flashers to fully programmable Flashers with GPS synchronization and calendar based seasonal operation.

“Flat top” horizontal profile
Uniquely uniform nearly up to 50% FWHM

Technical Specification E8554



Dual LED Range Lantern E8554



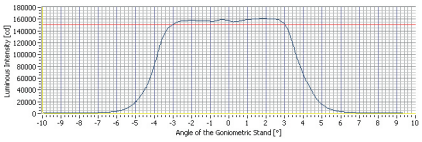
Smart LED Range Lantern E8554 with integrated flasher

Optical performance

Maximum fixed intensity – E8554 Parameter																		
Hor. divergence FWHM (typ)	3.8 deg	4.0 deg	7.6 deg	15 deg	21 deg	29 deg	3.8 deg	4.0 deg	7.8 deg	15 deg	22 deg	30 deg	3.8 deg	4.0 deg	7.9 deg	15 deg	22 deg	30 deg
Hor. divergence FWTM (typ)	6.0 deg	6.0 deg	9.5 deg	17 deg	24 deg	32 deg	6.0 deg	6.0 deg	10 deg	17 deg	25 deg	33 deg	6.0 deg	6.0 deg	10 deg	18 deg	25 deg	33 deg
Vert. divergence FWHM (typ)	3.8 deg	3.8 deg	3.8 deg	3.8 deg	3.8 deg	3.8 deg	3.8 deg	4.0 deg	4.0 deg	4.0 deg	4.0 deg	4.0 deg	3.8 deg	3.9 deg	3.9 deg	3.9 deg	3.9 deg	3.9 deg
Luminous intensity (typical)	320 kcd	180 kcd	90 kcd	90 kcd	42 kcd	60 kcd	386 kcd	255 kcd	126 kcd	126 kcd	60 kcd	79 kcd	660 kcd	440 kcd	220 kcd	220 kcd	95 kcd	110 kcd
Power consumption (typical)	47 W	32 W	32 W	64 W	44 W	90 W	63 W	63 W	63 W	124 W	60 W	120 W	70 W	68 W	68 W	132 W	64 W	130 W

Main technical specification

Power supply voltage	12 VDC (9 …27 or 36 V)
Power consumption in flash	Up to 132 W depending on configuration
Light source	High Power Light Emitting Diodes (LED)
Vertical divergence	≥ 3.8° (FWHM)
Lens material	UV stabilized Acrylic
Operating environment	-40 °C to +55 °C
Degree of ingress protection	IP 67
Weight	12.2 kg (13 kg with integrated Flasher)
Overall height (excl. bird deterrents)	382 mm
Installation	3 x Ø16, 4 x Ø16, on 200 mm circle



Order Overview E8554

Option matrix

Range lantern with white signal	E8554.W.N.X
Range lantern with green signal	E8554.G.N.X
Range lantern with red signal	E8554.R.N.X
Range lantern with blue signal	E8554.B.N.X
Range lantern with yellow signal	E8554.Y.N.X
Marking N specifies the horizontal divergence of the light signal	E8554.C.7.X
Marking D indicates a dual configuration of the Lantern	E8554.C.N.D
Marking F indicates an integrated flasher, identifying the type (F2=E867X)	E8554.C.N.F2
Marking G indicates a flasher with GPS synchronization (G=E867X.G)	E8554.C.N.X.G1
Marking T indicates an integrated telematics module (TelFiCon™-Flasher)	E8554.C.N.T3

Accessories

Transparent UV-stable polycarbonate front cover	EKJ 80-T
Bird deterrent rod set (incl. screws)	8264.050
Cable Connector, 90deg, female 6 + PE-position	C016 30F006 100 10
Sighting scope set (with carrying case)	8553.Q00
Programmable Flasher, integrated	E8672
Programmable Flasher with GPS, integrated	E8672.G

Product codes

Product ordering code consists of symbols describing the light signal colour, horizontal divergence, external wiring of the internal redundant LED arrays (dual as standard, single when supplied with integrated flasher or on special order).

Product code example: E8554.G.20.F2.G1

- Green range light signal with ≥20° horizontal FWHM
- with integrated flasher E8672 and GPS capability