

SOFLAM PEQ-1C

Special Operations Forces Laser Acquisition Marker



The Special Operations Forces Laser Acquisition Marker (SOFLAM) performed with distinction in both Operation Enduring Freedom and Operation Iraqi Freedom. This rugged and reliable tactical laser was used by Special Operations Forces, Joint Terminal Attack Controllers, and Forward Air Controllers under difficult wartime conditions to designate high value and time sensitive targets for precision munitions engagement in both Afghanistan and Iraq. The results significantly contributed to coalition success in both conflicts and allowed quick and precise destruction of enemy forces with minimal collateral damage.

In order to make this proven product even more effective for the warfighter, Northrop Grumman Laser Systems developed an advanced version of the SOFLAM that is smaller, lighter and operates from a single BA-5590 battery. SOFLAM PEQ-1C replaces the "power hungry" flashlamp-pumped laser with a "state of the art" diode-pumped laser that utilizes passive cooling. The result is a silent, more efficient laser designator with a longer mean time between failure.

Use of the athermal technology eliminates the major drawbacks of most diode-pumped laser systems, specifically warm-up time and standby power consumption. The SOFLAM PEQ-1C reduces the number of BA 5590 batteries required for operation from five to one. This allows operators to carry more mission essential items and fewer batteries for the laser designator while performing terminal attack control duties.

The SOFLAM PEQ-1C is a significant improvement to laser technology and provides the warfighter a smaller, lighter, and more efficient solution to their laser designator needs at an affordable price.

SOFLAM PEQ 1C Benefits:

- · Less weight, fewer electronics less complexity
- One BA 5590 battery instead of five
- Smaller size and volume
- Silent operation
- Increased system reliability
- Continuous operation at 25° C



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System Specifications

Physical Characteristics

- Size: 11.2 x 13.2 x 5.2 inches (28.5 x 33.6 x 13.1 centimeters)
- Weight: 11.3 lbs (5.2 kg)
- Volume: 435 cubic inches (7,100 cubic cm)
- Operating Temperature: -32° to $+49^{\circ}$ C (-30° F to $+120^{\circ}$ F)
- NATO: Three (3) mounting rails for night vision devices
- Tripod Interface: ¼" -20 tapped hole
- Tilted Eyepiece: 45 degrees
- · Operation Manual and Remote Control
- Battery Power: 24 VDC Lithium or re-chargeable NiCad
- Vehicle Power: 24 VDC (MIL-STD-1275)

Performance

- Laser Type: Nd YAG
- Wavelength: 1.064 im
- Pulse Energy: 80 millijoules
- Pulse-to-Pulse Stability: 15%
- Beam Divergence: 0.3 mrad
- Boresight Retention: 0.3 mrad
- Modes: Range and Mark (Designate)

Ranging

- Ranging: 200 to 19995 meters (\pm 1 meter)
- Range Counter Logic: Selectable First/Last
- Range Discrimination: 35 meters
- Display: 5 Digit Red LED in Eyepiece

Sighting Optics

- Power: 10X
- Field of View:

Horizontal: 5 Degrees Vertical: 4.4 Degrees

- Reticle: 0.2 mrad open cross
- Diopter Adjustments: +2 to -6
- Exit Pupil: 5 mm Diameter (nominal)
- Eye Relief: 15 mm

Mark (Designate)

- Marking: Target in Excess of 10 km
- Pulse Repetition Frequency: Band I / Band II
- User Programmable PRF Codes
- PRF Coding: Selected by Three Pushbuttons

I/O and Data Display

- Data Input and Output: RS-422 Compatible **Full Duplex** DATA OUTPUT
- Range 5 Digit Display DATA INPUT
- Azimuth: 0000 to 6399 mils or 0 to 359.9 degrees
- Elevation:
 - -400 to +400 mils or
 - -22.5 to +22.5 degrees

Specifications and features are subject to change without notice

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