

# Pulsar Helion 2 XP50 Pro thermal imager



High Definition thermal sensor 640x480 pixels @ 17  $\mu\text{m}$

Sharp, high-contrast thermal images for better identification of animals, their limbs and even the smallest details such as branches, leaves, grass and terrain.

Large sensing range up to 1800

A powerful F50/1.0 long-range objective lens combined with a high-sensitivity 640x480@17  $\mu\text{m}$  thermal imaging sensor provide exceptional detection capabilities.

A standard object of 1.8 m high can be detected up to 1800 m away in complete darkness.

Image Detail Boost Function

The Helion 2 Pro thermal imager produces bright, high contrast images with accurate contours and informative visualization of the smallest objects and areas with minimal temperature differences.

A hunter can clearly identify objects, both target and background, and accurately evaluate the trophy.

## What's new?

### **Large aperture lens**

The properties of thermal imaging camera optics have a decisive influence on the ability of a thermal imaging camera to capture even the lowest radiation levels.

Ultimate detection efficiency is achieved with the fast lens of the Helion 2 XP50 Pro (F50/1.0) thermal imager in combination with a highly sensitive thermal sensor. The Helion 2 XP50 Pro always offers users the best quality, most detailed and high contrast informative images, even during rain or fog, when the temperature contrast of the observed scene is minimal.

Ultra-strong magnesium alloy housing

The lightweight magnesium alloy housing is distinguished by its high structural strength and resistance to external mechanical and climatic loads.

The material of the housing effectively removes and dissipates the heat generated by the electronics, ensuring the operational stability of the

and maintains a high quality image during prolonged observation.

### **Full colour HD AMOLED display**

The new 1024x768 HD AMOLED screen has improved color reproduction, is energy saving, provides high contrast images with fast response, as well as clear and smooth images when observing on the move or in cold conditions.

### **2.5x-20x variable magnification**

Digital zoom, up to 8x, provides better focus and overall object recognition at long distances.

The zoom changes gradually in 2x steps or continuously for a truly optimal, customized field of view for a specific situation.

**Built-in photo and video recorder with 16 Gb memory**

The built-in video recorder is a great asset when it comes to filming or shooting once-in-a-lifetime experiences.

With one press of the REC button, you capture footage that you can easily share with colleagues, friends and family. 16 Gb internal memory provides many hours of recorded video and tons of photos.

### **8 color palettes**

With a choice of 8 color palettes, users can more effectively observe their field of view, allowing them to optimize the device for specific tasks and respond to changing observation conditions.

White Hot, Black Hot and Red Hot are optimal for object detection, Rainbow and Ultramarine help increase the chances of recognition and identification. Red Monochrome, Sepia and Violet are best suited for long night observation.

### **Wifi. Integration with IOS and Android devices**

Built-in Wi-Fi module provides connectivity of Helion 2 with Android or iOS smartphones or tablets. The combination of smartphone and thermal imager offers a range of unique features, such as instant image streaming, downloading and sharing of recorded files, firmware update capabilities and many others.

**Quick-change high-capacity battery (up to 8 hours operating time)**

Quick-change rechargeable battery packs provide enough power for up to 8 hours of non-stop use.

On one battery, the unit can run all night without needing to be replaced.

Any ordinary power bank connected via Micro USB can be used as an external power supply.

The IPS14 battery pack, available as a separate item, provides up to 16 h. of operation time.

### **Picture-in-picture function**

Picture-in-Picture displays a magnified image at the top center of 10% of the total field of view for precise zooming on an object of interest.

### **IPX7 rated waterproof**

IPX7 waterproof for protection against heavy rain, snow or other precipitation. The unit is designed to operate smoothly even after immersion in up to 1 meter of water for up to 30 minutes.

### **Wide range of operating temperatures (-25 to +50 °C)**

Helion 2's housing, power supply, optics and electronics are designed with applications in a wide temperature range in mind. Helion provides reliable and effective performance in freezing temperatures down to -25°C.

### **Stadiametric distance meter**

The stadiametric rangefinder is a dynamic rangefinder designed to help determine the approximate range of objects with a known height of 1.7 m (deer), 0.7 m (wild boar) and 0.3 m (rabbit).

### **High frame rate**

The high frame rate (50 Hz) makes it comfortable to use dynamic cameras

It is forbidden to export viewers with electronic image intensifier to countries outside the EU.

### **Sensor**

640x480 @ 17 μm (NETD <25 mK)

### **Objective lens**

F50/1.0

### **Magnification, x**

2.5 - 20 (x8 zoom)

### **Field of view (HxV), degrees / m@100m**

12.4x9.3 / 21.8x16.3

### **Detection range, m**

1800

## **Sensor**

### **Type**

uncooled

### **Resolution, pixels**

640x480

### **Pixel pitch, $\mu\text{m}$**

17

### **NETD, mK**

<25 mK

### **Frame rate, Hz**

50

## **Optics**

### **Objective lens**

F50/1.0

2.5 – 20

### **Magnification, x (V), degrees / m @ 100**

12.4x9.3 / 21.8x16.3

15

## **Display**

### **Eye relief, mm**

AMOLED HD

### **Resolution, pixels**

1024x768

## **Range Performance**

### **Detection range, m**

1800

## **Video Recorder**

### **Video / photo resolution, pixel**

1024x768

**Video / photo format**

.mp4 / .jpg

**Built-in memory, GB**

16

**Built-in memory capacity**

8+ hours of video or >100 000 pictures

**Wi-Fi**

Wireless Standard

802.11 b/g

**Frequency, GHz**

2.4

**Line-of-sight reception range, m**

15

**Environmental Characteristics** Degree of protection, IP code (IEC60529) IPX7 (waterproof)

**Operating temperature range, °C**

-25 – +50

**Connections and Compatibilities****Mount, type**

1/4" socket

**Power Supply**

Output voltage, V

3.0 - 4.2

**Battery type**

Li-Ion Battery Pack IPS7

**Capacity, mAh**

6400

**Operating time on battery pack (at t=22°C), h \***

8

**External power supply, V**

Micro USB Type B (5V)

**Weight & Size**

Body material

Magnesium alloy

**Dimensions, mm**

242x75x60

**Weight, kg**

0.5