

# NVECTECH



# NVEC - 14



## WARNINGS

- Please read this manual carefully! Use and maintain the product according to the specifications.
- Keep the optical surface clean, be careful not to scratch or touch the glass surfaces.
- If you leave finger-prints on, or contaminate the glass surfaces, use only clean and soft materials to clean it.
- Do not point the monocular at the bright light source (a fire, car headlights, lanterns, street lamps, room lights).
- The image effect depends on the scenery and weather conditions.
- Remove the battery from the unit when it is planned to store for a long time.
- Protect the unit from moisture, sudden temperature drops and shocks.
- Please put the protection cover on when the device is carried or transported.
- In order to protect the image intensifier tube, please put the objective protection cover on when the device is not used or used under strong sunlight conditions.

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## GENERAL

### Product description:

The NVG can be used as a handheld, head-mounted or helmet-mounted night vision system, the user can operate the device in moonlight or starlight condition (including mobility, use of weapons, short-range surveillance, map reading, vehicle maintenance and the administration of first aid).

The NVG can be adjusted in vertical or horizontal when it is helmet-mounted and has the function of manual gain control, IR illuminator, upturn and rollover power off, strong light protection and low battery indicator, the device will power off when exposed in the super light conditions for more than 60s.

## SPECIFICATION

Product Specification	
Model	NVG
Magnification	1X
Lens	25mm; F1.2
FOV	40°
Focus Distance	0.25m ~ +∞
Eye Relief	25mm
Diopter	-4 ~ +2
LED Indicators (in the FOV)	IR illuminator Upturn screen off Strong light protection Low battery indicatar
Image Intensifier	GEN 2+ (≥64lp/mm)
Tube Compatibility	MX10160 contact, NWVT 3 cable
IR Illuminator	850nm
Battery Type	1 AA battery
Operating Time	55h
Ingress Protection	IP67
Operating Temperature	-40°C ~ +50°C
Weight	270g±5%
Size	96mm×57mm×69mm

## PACKING



**NVEC - 14**



**Long Eyecup**



**Bracket**

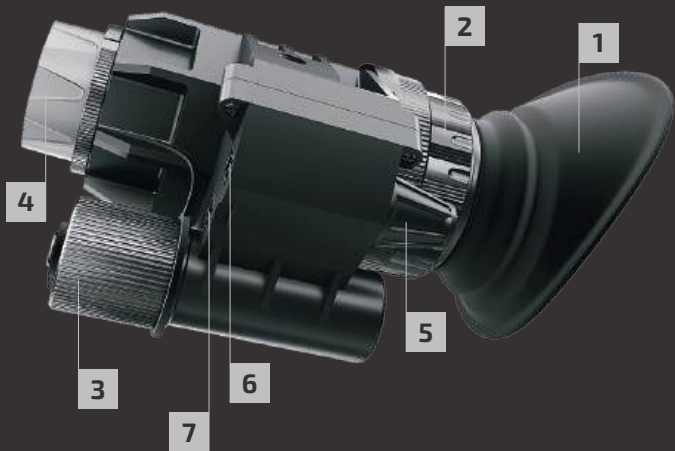


**Waterproof Case**



**Product Manual**

## DETAILS



No	Product Specification
1	Eyepiece Cap
2	Eyepiece
3	Battery Cap
4	Objective Lens
5	Potentiometer Knob
6	IR illuminator
7	Brightness Perception



## ASSEMBLY

### Battery Installation

#### Note:

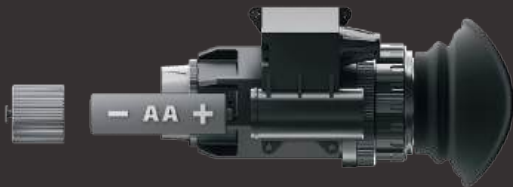
To protect the intensifier tube when the NVG is in standby mode or not in use or when it is being operated in daylight, keep the protective lens cap securely fitted over the lens.

#### Note:

If operating the device at temperatures below  $-20^{\circ}\text{C}$  ( $-4^{\circ}\text{F}$ ), the use of an alkaline battery is not recommended, as the severe cold will adversely affect the life of the battery. In these conditions, it is recommended that you use a lithium-iron disulfide 1.5V AA battery, or its equivalent.

#### Install the battery as follows:

1. Unscrew the battery cap;
2. Insert the AA battery (observing the polarity markings on the body of the device);
3. Screw the battery cap back securely.



## OPERATING

### Upturn the image tube to power off:

- Press the potentiometer knob three times (no more than 1s between two intervals);
- On: the blue light flicks twice (500ms/time);
- Off: the blue light flicks twice (250ms/time);
- Upturn and rollover  $>90^\circ$  to power off;
- Return to the normal state to power on.

### Strong light protection:

- Press the potentiometer knob five times (no more than 1s between two intervals);
- On: the green light flicks twice (500ms/time);
- Off: the green light flicks twice (250ms/time);
- Exceed the illuminance continuously (the read IC value is 120) for 1 min to power the image tube off;
- Press the potentiometer knob again to power on.

### IR illuminator:

- Long press the potentiometer for 2s to turn on/off the IR illuminator;
- When the status light is continuously red, then the IR illuminator is on, the vice versa.

## Note:

Upturn power off (auto turn off the IR illuminator), when the strong light protection and IR illuminator switch are on, there is priority control when they are carried out at the same time: the latter can interrupt the former, and if the latter is finished, the interrupted former will continue to perform.

## Battery level inspection:

- When the battery voltage is less than 1.1V, the red status light would flash for 500ms every 10s;
- When the voltage is more than 1.2V, the red status light will stop flashing and turn off.

## Auto sleep mode:

- The image intensifier tube will be auto off if the device remain stationary state for more than 3min
- The image intensifier tube will be turned on again if the device gesture changes.

## SERVICE

### Note:

- The NVM is a precise photoelectric instrument which should be handled with care.
- Do not scratch the lens surface or touch with hands.
- Do not wipe the shield with wet lens paper or when it is wet, as this can damage the coating.

When cleaning the equipment, avoid scratching the lens or leaving fingerprints on the optical equipment. Improper cleaning may damage the optical system.

### Clean the lens following the below instructions:

1. Do not use abrasive materials, such as paper or a scrub brush.
2. Wipe only when there is visible contamination.
3. Preferred method for cleaning lens materials: optical-grade cloth, pure water (deionized or other) , isopropyl alcohol (IPA).

# PROBLEMS

## 1. Fails to activate:

- Check that battery are installed in the correct direction and whether the battery power is sufficient or not. Check whether the battery cap is damaged or deformed.
- Replace the battery or install it correctly.
- Clean the contact surfaces on the battery cap.

## 2. Battery cap difficult to remove:

- Check for damaged battery cap.
- If damaged please contact Customer Support.

## 3. IR illuminator fails to activate:

- Turn the IR illuminator on in a dark area. Visually estimate whether or not the observed scene is illuminated.
- If the IR illuminator fails to activate, please contact Customer Support.

## 4. LED indicators fail to activate:

- Visual inspection.
- Please contact Customer Support.

## **5. Poor image quality:**

- Check objective lens or eyepiece focus.
- Check for fogging or dirt on the lens.  
Damaged optical components.
- Refocus the lens. If image quality is still poor please contact Customer Support.

## **6. Focusing ring cannot be moved:**

- Check to see if the focusing ring is bent or broken.
- If damaged, please contact Customer Support.

## **7. Eyepiece ring cannot be moved:**

- Check to see if the eyepiece ring is bent or broken.
- If damaged, please contact Customer Support.

## **8. The device does not turn off when exposed to high levels of light:**

- Perform the following test under daylight or bright room lights (non-fluorescent lights): put the objective lens cap on and turn on the monocular device to see if it cuts off the power after 60 seconds.
- If damaged, please contact Customer Support.

# NVECTECH

Model:

Serial number:

Date of sale:

Seal and signature of the seller:

**Kosmichna st. 49-g,  
Dnipro, Ukraine**  
site: [www.nvectech.com](http://www.nvectech.com)  
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**Customer Support:**

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[www.nvectech.com](http://www.nvectech.com)



**1 YEAR WARRANTY!**

