Lahoux Optics

Lahoux *Sight 35*

Thermal scope

Remarks

The user manual describes the use of the Lahoux Sight 35 and the precautions for use. In order to ensure the safety of the user, the reasonable and effective maintenance and use of the Lahoux Sight 35, as well as to ensure the normal life of the Lahoux Sight 35, Lahoux Optics requires the user to read the operating instructions completely and to strictly observe the regulations before the Lahoux Sight 35 is used.

The use and maintenance of the Lahoux Sight 35 is only subject to the supplied user manual. Other materials are for reference purposes only.

If you experience any problems while using the Lahoux Sight 35, please forward your feedback to your retailer or Lahoux Optics as soon as possible.

Contents

⚠ **Precautions**

- Do not clean non-optical surfaces of the thermal scope with a chemical solvent, but wipe with a soft cloth.
- The lens has a special coating to enhance the optical performance. Cleaning is only necessary if the lens is clearly dirty. Rubbing too hard can cause the lens coating to wear out. Do not touch the surface of the lens, as acidic materials of the skin can damage the coating. Use compressed air or a soft brush or possibly a soft spectacle cloth.
- After use, during transportation or when the camera will not be used for an extended period of time, remove the batteries and place the thermal scope in its protective packaging.
- Please install the battery according to the symbols on the device.
- Immediately stop using batteries with overheating, discolouration, deformation, smell or other abnormal phenomena during use, charging and storage.
- When the thermal scope will not be used for a longer period, please check it every six months.

⚠ Warning

- Do not directly expose the thermal scope to high intensity radiation sources such as the sun, carbon dioxide laser and electric welding machines.
- Keep the time interval between power-on and power-off longer than 20s.
- As the thermal scope combines precision optical instruments and electrostatically sensitive electronic devices, prevent unnecessary shock, drops and vibrations to prevent damage.
- Do not disassemble the thermal scope yourself. In case of malfunction, contact the supplier in time. Unauthorized disassembly of the Lahoux Sight 35 will irrevocably void the warranty.

Preface

This User Manual provides detailed information on the operation method and precautions of the thermal imager. In order to safeguard the personal safety of operators, reasonably and effectively maintain and use the thermal imager, and maintain the normal service life of the thermal imager, please carefully read and strictly obey the following operation specifications before using the thermal imager.

Our company shall not bear any legal responsibility for any mistake and accident caused by own reasons or reasons of any third party in the course of using this product by the user or property loss and personal injury caused by misjudgment against images.

We prepare this Manual with the purpose of facilitating users to use and understand our products. We will try our best to ensure the accuracy of contents of this Manual, but we still cannot ensure the completeness of contents of it. Since we have been continuously updating and upgrading our products, we reserve the right to modify this Manual at any time without prior notice.

1 Introduction

The Lahoux Sight 35 thermal scope is designed for outdoor and hunting. Based on the principle of thermal Imaging, without external light source, independent of light sources, users can observe objectives (even hiding behind barriers, branches of trees, grass, bush etc.) via this scope, irrespective if it's day or night, bad weather like rain, snow, fog, haze etc.

The Lahoux Sight 35 has multiple power options to ensure ultra-long operation.
It can be used for hunting, observation and detecting during low visibility. The tube has a 30mm standard diameter, to enable all kinds of mounting rings.

2 Specification

Model	Lahoux Sight 35
Detector	
Type	Uncooled
Resolution	384x288 pixels
Pixel pitch	12 μm
Sentsitivity (NETD)	≤50 mK
Frame rate	50 Hz
Optics	
Objective lens	35 mm
Field of view	7.5° $\times$ 5.6°
Magnification	3.0$\times$ - 12.0$\times$
Digital zoom	1.0$\times$ - 4.0$\times$
Eye relief	70 mm
Dioptre adjustment	-4 - +4 D
Detection range (Target size:1.7m$\times$0.5m	1816 m
Display	
Type	LCOS
Resolution	1280$\times$960 pixels
Operational Parameters	
Battery	Built-in two 18650 batteries and a replaceable 18500 battery
Max. operating time (at 22 ºC)	15 h*
External power supply	5V (Type C USB)
Diameter of the riflescope tube for ring mounting	30 mm
Max. recoil	1000 g/s^2
Encapsulation	IP67
Internal memory	16 GB
Operating temperature range	-20~+50 ℃
Weight (without replaceable battery)	<950 g
Dimension	385$\times$85$\times$75 mm
USB interface	Type-C

*The actual operation time depends on the intensity of using Wi-Fi, Video-Recording and other functions;

Packing list
• Lahoux Sight 35 thermal scope
• Eyecup
• Protective bag
• Type C cable
• Power adapter
• Lens cloth

3 Features

- 12μm detector
- High quality image
- Micro step digital zoom
- Double power supply system for a long run time
- Standard 30 mm tube diameter
- Stadia-metric rangefinder
- Long detection range
- High image frequency: 50 Hz
- Built-in storage, supports photo and video recording
- Built-in Wi-Fi module to connect with Lahoux app
- Digital compass and motion sensor
- Picture in picture (PIP)
- Bad pixel correction
- User-friendly interface

4 Parts
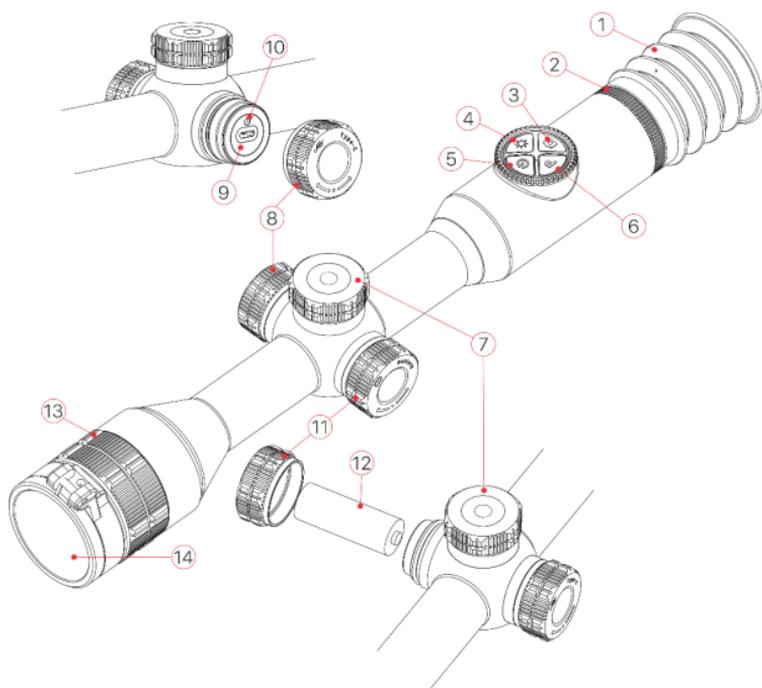
1. Eyecup
2. Diopter adjustment ring
3. Photo button
4. Brightness button
5. Power button
6. Palette button
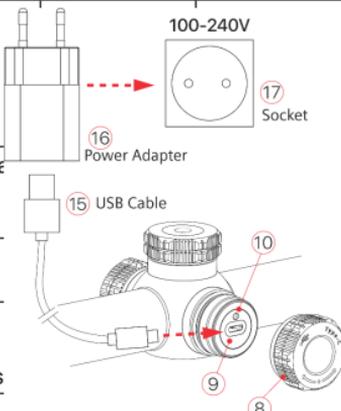7. Rotary encoder knob

8. USB port cover
9. Type USB-C port
10. LED indicator light
11. Extended battery cap
12. 18500 battery
13. Objective lens focus ring
14. Objective lens cap

5 Button functions

Button	Status/ current operation mode	Short press	Long press	Rotate
Power button	When switched off:	——	Switch on	——
	Normal viewing	Shutter calibration	Switch off/ standby	——
	Standby	Exit standby	——	——
	Advanced menu	Exit to previous menu without saving		
	Pixel calibration	Locate dead pixel or cancel		
Palette button	Normal viewing	Change palette		
Brightness button	Normal viewing	Adjust screen brightness		
Photo-graphy	Normal viewing	Take photograph	. recording	
Rotary encoder knob	Normal viewing	Enter shortcut menu	Enter advanced menu	Adjust zoom level
	Shortcut menu	Adjust parameters	Save & exit to normal viewing	Switch menu options/ change reti-cle zeroing: clockwise: move left/ down anticlock-wise: move right/up
	Advanced menu	Confirm selection & return (or enter submenu)	Save & exit to normal viewing	
	Pixel calibration/ zeroing	Switch X/Y axis	Save & exit to normal viewing	

100-240V

⑰ Socket

⑯ Power Adapter

⑮ USB Cable

⑩

⑨

⑧

6 Charging battery

The Lahoux Sight 35 has a double power supply system –
built-in rechargeable lithium-ion battery pack and a replaceable
18500 battery. The whole system supports the standard
working time of 15 hours. Please ensure the batteries are fully
charged before first time use.

6.1 Charging the internal battery

- Rotate USB cover (8) anticlockwise to open.
- Plug in the Type-C USB cable (15) to Type-C port (9) on the
  scope.
- Connect power adapter (16) to the USB cable. Plug the pow-
  er adapter into the wall socket (17) with 100-240V to charge.
- When charging, an icon ⊡ appears in the display. The LED
  (10), next to the type-C port, shows red during charging;
  when LED changes to green, it is fully charged.
- When the icon turns into ▭, it means low battery. Please
  charge in time, to avoid battery over discharge, resulting in
  battery aging.

Note: Only the internal battery will be charged when charging
through the USB port.

6.2 Installing 18500 battery

- Rotate the battery cap (11)
  anticlockwise to open.
- Install the 18500 battery (12)
  according to the symbol with
  the positive side inwards.
- Close the battery compart-
  ment cap clockwise.
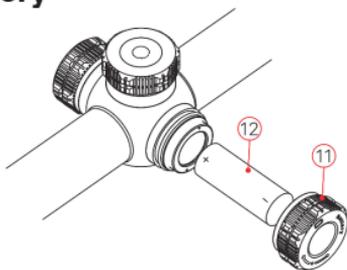
Note: You can use another battery
with more or less capacity (mAh).
The run time will change.

Attention: A so called '18500'
battery must meet the following
dimensions: length: 50 mm and
diameter: 18 mm.

6.3   Safety measures

- Please charge with included adapter 5V. 2A. Using other type adapters may lead to irreversible damage to the battery or adapter.
- If the device will not be used for some time, it should be partially charged. Avoid fully charged or completely discharged batteries.
- When bringing the device from a cold to a warm environment, please wait for 30-40 minutes to reach room temperature before charging the device.
- Do not use a damaged charger.
- Charge the scope in a temperature range of 0° to +40°, otherwise battery life will be reduced significantly.
- Please don't leave the device unattended while charging.
- After being fully charged, avoid charging the battery for over 24 hours.
- The device has a short-circuit protection system. It is recommended to avoid circumstances that could lead to a short-circuit.
- Recommend operation temperature range is -20° to +50°, avoid operating the device outside this temperature range, it may reduce the battery life.
- When the device is operated in sub-zero temperatures, the capacity of batteries is reduced. That is normal and not a defect.

6.4   Switching battery, power supply

The Lahoux Sight 35 supports a multi power supply system:
A built-in lithium-ion battery pack, a replaceable 18500 battery and power supply through the USB port.
- When both batteries are available, the status bar on the top right of the image, will reveal two battery icons. The replaceable battery on the left and the built-in battery on the right.

- If there is no replaceable battery, only the built-in battery icon will show green on the status bar.
- The device will select the replaceable battery as first power source when installed and sufficiently charged. When the replaceable battery is empty or low, the device will switch automatically to the built-in battery.
- When the device is switched on, the replaceable battery can be hot swapped. The Lahoux Sight 35 will switch to the built-in battery.

- When an external power supply is connected, the USB port (9) will switch automatically to the external USB power supply. A lighting shaped icon will appear inside the left icon, which indicates charging the built-in battery.
- A standard mobile power bank of any capacity can be used.

Note
- When the icon is green ▭, this means it is charged over 20% and operational. When the icon is red ▭, this means low battery, please charge the device.
- The flash icon ▭ inside means the scope is charging the internal batteries with an external power supply.
- When the external power supply is disconnected, the device will switch to the replaceable 18500 battery. If there is no replaceable 18500 battery or this battery is low in power, the device will switch to the built-in battery pack.

7 Mounting

7.1 Rifle mounting

Warning!
Don't aim the thermal imager at any high intensity radiation source, such as a laser emitter, the sun or a high intensity fire. Any damage that is caused by not following the instructions is not covered by the warranty.

It is advised to have the Lahoux Sight 35 mounted by a competent gunsmith.

For accurate shooting, please install the Lahoux Sight 35 on the correct location on your rifle.
- The Lahoux Sight 35 is designed with a 30mm diameter tube that is suited for standard 30mm mounts as used for daylight scopes.
- Follow the instructions of the supplier and choose proper tools for mounting.
- Make sure to have enough eye relief for safe and comfortable viewing.
- It is suggested to install the scope as low as possible, preventing contact with the barrel or other parts.
- It is suggested to use a torque wrench to fasten the rings. Avoid overtightening to not damage the scope. Suggested torque is less than 2.5 Nm.
- To zero the scope, please refer to *Chapter 9, Zeroing* in this manual.
- It is suggested to use the eyecup when the scope is used during dark circumstances to avoid stray light.

7.2 Basic settings

- Open the objective lens cap (14).
- Long press the power button (5) for 2 seconds to start up for normal viewing. Wait 3 seconds before entering the main menu after start up.
- Rotate the dioptre adjustment ring (2) to adjust the sharpness of the icons on the screen.
- Rotate the objective lens adjustment ring (13) on the objective lens to adjust the focus.
- To set Image mode during normal viewing: short press Palette button (6) to switch image mode, modes are White Hot, Black Hot, Red Hot, Pseudo colour and Target highlight. The top status bar shows the mode in the left corner.
- Set screen brightness: short press brightness button (4) to switch screen brightness levels 1−5. The brightness indication icon appears on the bottom of the screen momentarily, default brightness is level 3.
- Set image sharpness: short press rotary encoder knob (7) to set image sharpness (refer to "shortcut menu"), default is level 1.
- Set image calibration type: select calibration type in main menu: Automatic (A), Manual (M) and Background (B), default is A.
- During normal viewing short press power button (5) to calibrate. For background calibration, please cover the lens with lens cap (14), the background calibration starts after 2s.
- To switch off the scope long press power button (5) There will be a 3 seconds countdown. Release the button after the countdown to switch off. A prompt may appear, indicating saving data. After saving data the screen will turn black, indicating the device is switch off. ***Please don't cut off power supply when saving data, otherwise I may not be saved.***
- To enter the standby mode, release the power button before the countdown is finished. Short press power button (5) to return to normal operation.

8 Zeroing

The Lahoux Sight 35 can be zeroed with the "freeze" method. We recommend to zero while the scope has a normal operating temperature.
- Use a target at a distance you like to use 100m or 200m etc.
- Long press rotary encoder knob (7) to enter main menu, select rifle profile first and select one of the options (A-C).
- Long press rotary encoder knob (7) to enter main menu, select "Zeroing"; short press rotary encoder knob (7) to enter next level menu.
- According to distance to target, select or add new distance before correction (Refer to main menu function: "Zeroing profile and Zeroing").
- Once the zeroing distance is set, rotate rotary encoder knob (7) to select "zeroing" icon, short press rotary encoder knob (7) to enter zeroing interface (Refer to main menu function: "Zeroing").
- The reticle appears in the centre of the screen and the adjustment in the top left corner.
- Aim and shoot at the target.
- Observe the location of impact, if the location of impact and aiming point are not aligned, keep the scope still, long press both Palette button (6) and Photo button (3), the image will freeze and a freeze symbol ❄ will appear on the left of the screen.

- Short press rotary encoder knob (7) to switch between X-axis or Y-axis, the location of the indicator ❯ shows the selected option, and the icon turns blue.
- Use the rotary encoder knob (7) to adjust, rotate clockwise to move left or down, anticlockwise to move right or up.
- When finished, short press rotary encoder knob (7) to switch to the other axis, this also saves the setting.
- When the reticle is moved to the position of actual impact, long press rotary encoder knob (7) to save and exit to main menu.
- Repeat previous steps until the position the scope is zeroed.

Note: When zeroing is set for 2 or 3 distances you can quickly switch the zero in the shortcut menu.

9 Calibration

When the image is degraded or unbalanced a NUC (Non uniformity correction) or calibration will improve the image. A NUC corrects the detector temperature to remove unwanted effects in the image.

There are three types of calibration: Automatic (A), Manual (M) and Background (B). The calibration can be selected in the main menu.

- Automatic (A): The scope will calibrate fully automatically, before an automatic calibration, there will be a 5 secs countdown behind the shutter icon on the status bar. Short press power button (5) to cancel the shutter calibration, during count down. The scope can be calibrated manually by short press of the power button (5) in this mode.
- Manual (M): During normal viewing short press the Power Button (5) to perform a manual shutter calibration without covering the lens.
- Background Calibration(B): Cover the lens, short press Power Button (5), a prompt appears in the display "cover lens during calibration". The background calibration starts after 2s.

10   Digital zoom

The Lahoux Sight 35 has a Micro step digital zoom from 1-4 times zoom magnifying the image 3-12 times.

- During normal viewing rotate the knob (7) to zoom the image;
- Rotate clockwise to zoom in, anticlockwise to zoom out;
- The current magnification appears low in the middle of the screen and disappears after 2s. The magnification is also shown in the top status bar on the left.
- One complete rotation of the rotary knob covers the complete zoom range. Every click zooms 0.3 times in or out with micro steps.

11   <u>Photography & video recording</u>

The Lahoux Sight 35 has a built-in 16GB storage for photography and video recording. Photo and video files have a time stamp. we advise to synchronize time and date settings in the Lahoux App before taking photographs or recording video. Refer to instructions in *chapter 17, WI-FI* to download the app.

11.1 Photography

During normal viewing short press the photography button (3) to take a photo, the image freezes for 0.5 seconds and a camera icon appears on the top left corner of the screen.

11.2 Video recording

- During normal viewing long press photography button (3) to start a recording.
- Recording icon and timer appear on the top left of the screen. Time format: 00:00:00 (Hour: Minute: Second)
- When recording, short press photography button (3) to take photographs
- Long press photography button (3) stops and saves the recording

Remarks
- You can use the menu while recording video.
- Photos and videos will be saved in the formats IMG_HHMMSS_XXX.jpg (photo), VID_HHMMSS_XXX.mp4 (video) in the built-in storage.
- It is impossible to reset the serial numbers of media files.

Caution
- The maximum duration of recording video is 5 minutes. When the recording exceeds 5 minutes the video will be saved to a new file automatically.
- Check the available free memory regularly and transfer media files to other devices to ensure ample memory space.

11.3 Access to internal storage

The device will be identified as an SD card by your computer
• Connect device with a PC or Mac via a USB type-C cable;
• Switch on the scope;
  - The scope will automatically come up as an 'Internal Storage' that can be normally accessed like any other external device.
• The folders are named: xxxx(year)xx(month)xx(day);
  - Inside the folders are both photos and videos taken that day.
• Select desired files or folders to copy or delete.

12   Status bar
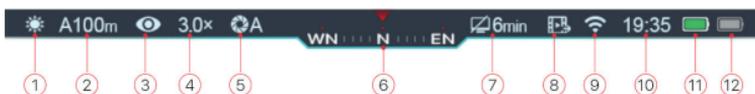
The status bar is located on top of the screen and shows the current status of the scope. From left to right:
1. Current image mode (☀: White Hot; ☾: Black Hot; 🔥: Red Hot; ▮: Pseudo Colour; 🐦: Target Highlight).
2. Current zeroing profile and range (e.g., A100m)
3. Ultra-clear mode (∅: Ultra clear Off; ⬤: Ultra Clear On)
4. Current Zoom in rate (e.g., 3.0×)
5. Calibration mode (In automatic shutter mode (A), there will be a countdown icon 🕐00:05, showing the time till calibration)
6. Compass (not visible when turned off)
7. Standby settings
8. Video output status (no icon is shown when video output is switched off)
9. Wi-Fi status (📶: Wi-Fi off; 📶: Wi-Fi on and connected)
10. Clock (download the Lahoux app to set time in the app)
11. Replaceable battery status (18500 battery)
12. Built-in battery status.

13 Shortcut menu

Several common functions can be adjusted in the shortcut menu: Reticle type, reticle colour, image sharpness, zero pre-set distance

- During normal viewing short press rotary encoder knob (7) to enter the shortcut menu.
- Rotate rotary encoder knob (7) to select the following functions: (selected options will be highlighted)
  - **Reticle Type**: rotate rotary encoder knob (7) to select the reticle icon. A short press will select six reticle types.
  - **Reticle Colour**: Reticle colours white, black, red, green can be selected.
  - **Image Sharpness**: 1-5 settings of image sharpness can be selected.
  - **Zeroing pre-set distance**: select one of three pre-set zero distances to quickly adjust the point of impact.
- Long press rotary encoder knob (7) to save modifications and exit to normal viewing.

Without any operation in 5s, the device will exit to normal viewing.

14   Main menu

- During normal viewing, long press rotary encoder knob for 3 seconds to enter main menu.
- Rotate rotary encoder knob (7) to select main menu options, rotate clockwise to move down and counter clockwise to move up. This is cyclic on both pages.
- Short press rotary encoder knob (7) to modify current settings or enter next level of menu.
- The location of indicator indicates the selected option. The selected icon will change from white to blue.
- In all menu items, long press rotary encoder knob (7) to save modification and exit to previous level of menu, short press power button (5) will exit to previous level without saving.
- In all menus, the scope won't save any modification and exits if there is no operation in 15s.
- When exiting any menu, the indicator remains in the last position. After a restart the indicator indicates the first option in the menu.
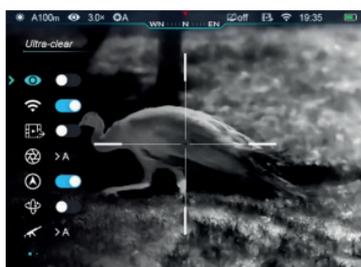
Main menu options and descriptions

Ultra-clear mode 👁	• Long press rotary encoder knob to enter main menu. • Select "Ultra-clear" • Short press rotary encoder knob to turn ON or OFF. • (The scope will do a NUC.) • The status is shown in the status bar.
Wi-Fi 📶	• Long press rotary encoder knob to enter main menu. • Select "Wi-Fi" by rotating rotary encoder knob. • Short press rotary encoder knob to turn ON/OFF. • The status is shown in the status bar.
Video output	• Long press rotary encoder knob to enter main menu. • Select "Video output" by rotating rotary encoder knob. • Short press rotary encoder knob to turn ON/OFF. • When there is video transmission an icon will be shown. • The status is shown in the status bar.

Calibration	There are 3 calibration modes: Automatic(A), Manual (M) and Background (B).
	 • Select "Calibration"
	 • Short press rotary encoder knob to enter next level.
	 • Rotate rotary encoder knob to select:
	   - **Automatic shutter calibration** (A) This will calibrate automatically.
	   - **Manual shutter calibration** (M): user can calibrate when necessary.
	   - **Background Calibration** (B) Lens needs to be covered.
	 • Short press rotary encoder knob to confirm.
	 • The status is shown in the status bar.

Compass	• Select "Compass"; • Short press **rotary encoder knob** to Turn ON/OFF. • Only when compass is turned on, it is shown in the status bar.
Gravity sensor	• Select "Gravity sensor" (Motion sensor). • Short press **rotary encoder knob** to turn ON/OFF. • The angle indicators are shown on both sides of the screen. • The left indicator shows the tilt angle, and the right indicator the pitch angle.
Zeroing Profile	• Select zeroing profile. • Short press **rotary encoder knob** to enter profile. • Select one of the Profiles, A/B/C, by rotating the rotary encoder knob. • Short press rotary encoder knob to confirm and exit to previous menu.

| Zeroing ⊕ | Please set zeroing profile before zeroing.
The Lahoux Sight 35 supports zeroing between1-999 meters.
• Select "Zeroing" in main menu.
• Short press rotary encoder knob to enter next level, there are 3 quick zeroing distances that can be set.
• Rotate rotary encoder knob to select and adjust one of the zeroing distances before zeroing. When this is 100 meters select the first one.
• If you like to use another distance use the second one, enter and set the distance. The distance can be entered one digit at a time with the rotary knob. <u>SAVE THIS DISTANCE BY LONG PRESS ROTARY KNOB.</u> The Lahoux Sight 35 enters the previous menu. <u>SAVE AGAIN BY LONG PRESS ROTARY KNOB.</u> Then, when needed, continue to set the next distance setting.
• After setting for instance 100/200/300 meter the menu appears like the image below.
 |
| | **Zeroing**
_ ¦ _
¦ | • Short press rotary encoder knob to select the reticle icon to zero the distance you would like to shoot. The X- and Y- coordinates can be selected next.
• To adjust the point of impact. One click is 1,71 cm at 100 meters. The zero can also be adjusted the normal way.
• It is also possible to use the "freeze" method.
• Aim at the target's centre. Fire and observe the actual impact location.
• Keep the scope still, hold down Palette and Photo button simultaneously. The image freezes and the icon of image freeze is shown on the screen.
• Short press rotary encoder knob to switch the X- or Y-axis.
• Rotate rotary encoder knob to move the reticle, clockwise to move indicator left or down, anticlockwise to move indicator right or up.
• When finished, short press rotary encoder knob to switch to the other axis. |

Zeroing ⊕	**Zeroing**	• Move the indicator to the real impact location, long press rotary encoder knob to save the position of reticle and exit the submenu.
	Setting zeroing range	When necessary you can set a custom zero distance to an actual target distance should that be practical.
Standby settings ◲	• Select "Standby settings". • Short press rotary encoder knob to enter standby settings submenu with four options: 2min/4min/6min/ off. Default is off. • Rotate rotary encoder knob to select an option. • Short press rotary encoder knob to confirm selection, this will be shown in the top status bar. 	
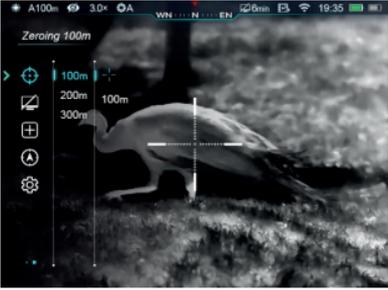
Bad pixel correction ⊞	It is possible that some display pixels may have a different brightness. They can seem brighter or darker. This is called a defective or bad pixel and it is a normal phenomenon. The bad pixel correction will remove these bad pixels. • Select "Pixel correction". • Short press rotary encoder knob to enter the menu. A cross appears in the centre of the screen and a Picture in Picture (PIP) function appears to enlarge the image. • On the right of the PIP, there is an X- and Y-axis selector and an indication of the total number of corrected pixels. • Short press rotary encoder knob to switch between X- and Y-axis. • Rotate the rotary encoder knob to move the cross to the bad pixel, clockwise moves cross left or down, anticlockwise moves cross right or up. • When the cross is exactly on top of the bad pixel, short press Power button to calibrate the pixel. The text "Add" appears in the PIP. Repeat for other bad pixels. • Short press power button on the bad pixel position to cancel the selection. The text "Del" appears in the PIP. • The PIP will move to the top left of the screen when the cross is moved to the bottom left. • Once the correction is finished, long press rotary encoder knob. The text "save or not" appears. Select *Yes* to save and exit, select *No* to cancel. • After selected yes, "Saving successful" appears and the scope will exit the menu.
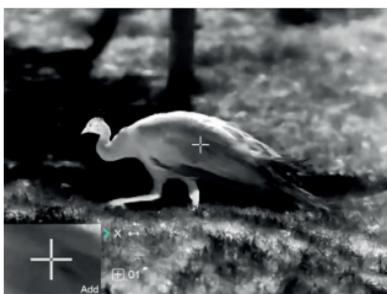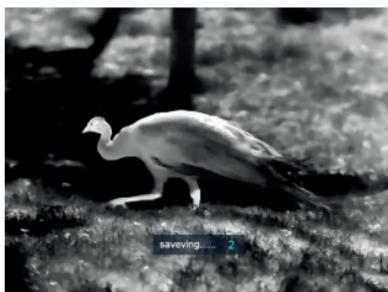
Bad pixel correction	
Compass calibration	• Select "Compass calibration". • Short press rotary encoder knob to enter calibration menu. • Follow the rotational directions of the icon and rotate the scope in the three axes shown. Make sure to rotate at least 360° per axis. • When the rotation does not start within 15 seconds the scope will exit without saving.
General settings	Setting language, Units, Status autohiding, Factory reset, etc.

General settings ⚙️	Language 🌐	• Short press rotary encoder knob to enter General settings. • Select "language" option, short press rotary encoder knob to enter. • Rotate rotary encoder knob to select language. • Short press rotary encoder knob to confirm, save and exit to main menu.
	Units of measurement 📏	• Short press rotary encoder knob to enter General settings. • Select "units of measurement". Short press rotary encoder knob to enter. • Rotate rotary encoder knob to select measuring units, short press rotary encoder knob to confirm, save and exit.
	Status auto hiding 🖼️	• Short press rotary encoder knob to enter general settings. • Select "Status auto hiding", short press rotary encoder knob to enter submenu. • Rotate rotary encoder knob to select ON/OFF. • Short press rotary encoder knob to confirm and exit to main menu. • When turned on, any used icon or status bar will hide automatically after 8 seconds. • Short press any button to cancel auto hiding.

| General settings ⚙ | Factory reset ↻ | • Short press rotary encoder knob to enter General settings.
• Select "Factory reset", short press rotary encoder knob to enter this option.
• Rotate rotary encoder knob to select "Yes/No".
• Short press rotary encoder knob to confirm selection
• The scope will reboot when selected "Yes".
• Selecting "No" will cancel and exit to main menu.
• The scope will reset the following to default status after a Factory reset:
  - Image mode: White Hot.
  - Zeroing Range: A100
  - Ultra-Clear mode: Off
  - Optical Zoom: 3.0x
  - Shutter Calibration: Automatic
  - Digital Compass: Off
  - Standby: Off
  - Analog Video: Off
  - Wi-Fi: Off
  - Gravity Sensor: Off

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| | Info ⓘ | • Short press rotary encoder knob to enter General settings.
• Select "Info".
• Short press rotary encoder knob to access the information.
• Long press rotary encoder knob to exit to previous menu.

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15   Picture in picture (PIP)

The Picture in Picture (PIP) is a small zoomed in screen at the top of the screen. The zoom factor is 2 and the centre of the image is shown.

- Long press P button (6) during normal viewing to turn ON/OFF PIP.
- When the screen is zoomed, the PIP image will also be enlarged, including its 2× zoom.

16   Stadiametric rangefinder

The Lahoux Sight 35 has a stadiametric rangefinder to estimate the range of a known object.

- During normal viewing long press brightness button (4) to turn the rangefinder on/off.
- Once turned ON, there are two lines in the middle of screen for measurement. On the right are three objects of known height and the approximate distance.

- The objects are:
  - Deer: 1.7m in height
  - Boar: 0.9m in height
  - Hare: 0.2m in height
- Put the object in the centre of the screen and rotate rotary encoder knob (7) to adjust measuring lines to the height of the object. Rotate clockwise to increase the lines and anticlockwise to decrease. When the lines are adjusted the distance values will change.
- To change between meters and yards please refer to chapter 15 main menu, units of measure.
- Long press brightness button (4) to exit the rangefinder.

17 Wi-Fi

The Lahoux Sight 35 has the possibility to use Wi-Fi to connect to external devices (PC, smart phone).
• Switch on Wi-Fi in main menu (refer to main menu).
• It is shown as an external device like "Sight35".
• Select the device and enter 12345678 as password to connect.
• When the Wi-Fi is connected, users can communicate with the device through the Lahoux App.

You can download the Lahoux App for free from the App store (iPhone) or Google Play store (Android).

18 Technical inspection

• We suggest to inspect the device every time or at least regularly before use.
• Appearance: are all parts firmly fixed and is the scope intact. Are the mounts and scope firmly mounted to the rifle? Is there oxidation on the electrical contacts?
• Are the objective and ocular lens clear and without (oil) stains or dirt?
• Is the scope fully charged before use?

19 Maintenance

The Lahoux Sight 35 should receive maintenance at least twice per year, including:
• Wipe off dust and dirt first. Wipe the metal and plastic external surface of the scope with a soft damp cloth, not using aggressive solvents. Do not use solvents on lenses or electrical contacts.
• When needed, clean electrical contacts and the battery compartment with a contact cleaner on a cotton wipe.
• Check the surface of objective lens and eye piece. If necessary, clean dirt and sand off of the lens with pressurized air or a soft brush. (Avoiding direct contact is best.) Use a special lens cleaning cloth to gently clean the lens surfaces.

20   <u>Troubleshooting</u>

The following table lists potential issues of the device. Please check the table first when you have an issue. If there is an issue that is not included in the table, please contact your reseller.

Issue	Probable cause	Solution
Can't switch on the scope	Empty battery	Charge the battery or insert a charged battery
Battery compartment cannot be closed	Battery is not the correct size	Check if battery is of the correct dimensions 50 mm by 18 mm and replace if needed
Can't charge the scope with an external power supply	USB cable broken	Change USB cable
	External power supply empty or broken.	Check external power supply
Image not clear, not balanced, with curtain	Needs a NUC/ calibration	Refer to chapter 10 Calibration
Image too dark	Brightness to low	Adjust screen brightness
Image quality not optimal or short detection range	May be due to weather conditions, such as snow, rain, fog etc.	
Can't connect with smart phone, tablet etc.	Wi-Fi not switched on, wrong Wi-Fi password	Switch on Wi-Fi, use correct password
	Too many Wi-Fi signals around	Move device to area with no or low Wi-Fi signals.
Wi-Fi signal disappears or is interrupted	Device is too far from Wi-Fi receiver or there is a barrier between the scope and the receiver (e.g., a (concrete) wall, thick forest)	Place the scope or receiver closer until the Wi-Fi signal is stable
Compared to the image at room temperature or during warm summer nights, the quality of image in low temperature, during winter or high humidity is of lower image quality.	This is a feature of any thermal imaging device. Humidity and temperature differences will affect performance.	

21 Customer support

Should you experience any difficulties with your Lahoux Optics product, consult the manual first. If the problem remains, please contact your dealer for any question or service. Alternatively you can contact the service-centre of Lahoux Optics for technical and service related questions: services@lahouxoptics.nl.

To return products, please first request an RMA number from the service department of your supplier. Return shipments directly to your supplier. Lahoux Optics accepts no responsibility for returns without an RMA number.

Notes

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