

Section 1 - Introducing the BLR10b

Congratulations on your purchase of the Acura BLR10b Ballistic Rangefinding Binoculars 10x42! Your BLR10b coupled with your Revic Ops App will calculate the right shoot to solution for your rifle and round based upon all of the relevant factors for any shooting scenario.

Every time you press the FIRE button, on-board sensors measure distance, incline angle, barometric pressure, temperature, and compass bearing to provide a firing solution.

Your ballistic calculations are powered by the Revic doppler ballistic engine that uses precise algorithms configured to provide ultra-fast corrections displayed as a Shoot-To-Range in BDC, MOA or MILs at the measured distance. Wind corrections are also provided in MOA or MILs for each ballistic solution.

Section 2 - Getting Started

Quick Start/Battery Installment

1. The BLR10b Binocular is powered by a 3 Volt Lithium battery, commonly referred to as CR2. Please note that there will be a battery already installed. Please remove the red insulator sheet in the battery compartment before using it.
To install/reinstall the battery:
 - a. Remove the battery compartment cover (found on the underside of your binoculars) by lifting up the hinged tab and turning counter-clockwise,
 - b. Insert the battery, positive end (+) first.
 - c. Re-insert the battery compartment cover and use the hinged tab to turn clockwise.
 - d. Once secure, press down on the hinged tab for a flush end cap.
2. Press and release the larger round FIRE button to power ON the unit. Each time the unit is powered on, the unit is ready to take a measurement.
3. Select a target and look through the eyepiece and use the center circular reticle to aim at the target.
4. Press and hold the FIRE button. The distance hash marks will flash while the laser is active. The laser will remain active for up to 10 seconds while acquiring data about the target. Release the FIRE button once the distance is displayed. If the distance is not displayed, release the FIRE button and repeat.



Connect your BLR10b to a Device

Your BLR10b communicates with the Revic Ops App to access the ballistic profiles that you can customize inside the app.

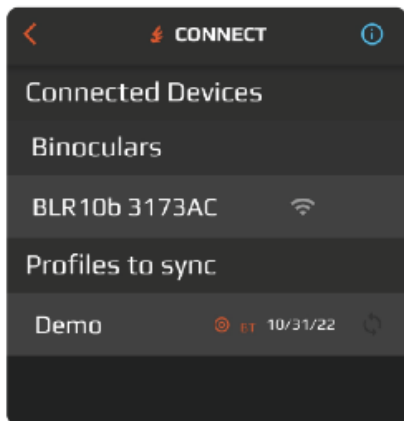
For your BLR10b to access and connect to your ballistic files, do the following:

1. Download the Revic app from the Google Play Store or the Apple App Store, or gunwerks.com/app, or simply take a picture of the QR code below and you will be taken directly to the app store.
2. Program the ballistic profile of your rifle inside the app.



3. When powered on, the BLR10b is configured so the Bluetooth is on and actively searching for a device to connect to. The Bluetooth icon will flash until connected to the Revic app.
4. In the Revic app, select the Bluetooth icon to show the available devices and select your BLR10b Device ID number from the list.
5. Once the device is connected via bluetooth, the bluetooth icon in the BLR10b will remain solid, and the signal icon in the app will be illuminated.

ON REVIC APP



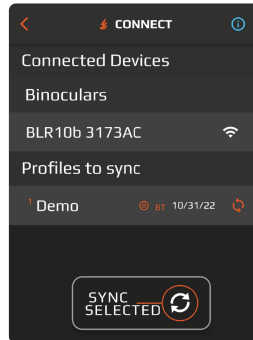
ON BLR10b DISPLAY



Selecting a Profile

Select your desired rifle's profile to add it to your BLR10b by doing the following:

1. In the app, from the main screen, open the Sync Module.
2. Select the icon next to the ballistic profile you would like to add.
3. Next, press the Sync button to transmit the your desired profile to the connected BLR10b device. The app will confirm the selected profile has been successfully synced to the binocular.



The BLR10b will store 1 synced profile from the app. This is to make sure that you don't accidentally use the wrong profile in a critical shooting situation.

Powering OFF the BLR10b

If no button presses are detected after 20 seconds, the BLR10b will enter sleep mode to conserve battery power. The BLR10b will power OFF automatically after 60 seconds of the display being off. If a Bluetooth connection was established, power off will occur automatically 5 min from the last button press.





Section 3 - Basic Operations

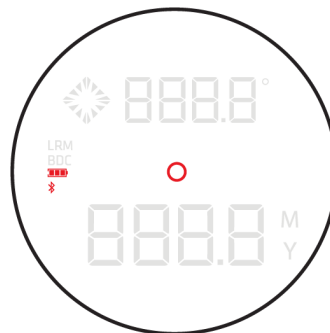
Buttons

The BLR10b has a 4-button keypad located on the top panel of the binocular. The buttons provide easy access to the instrument functions, programming, and operating commands while using your BLR10b. Operation of the buttons is further detailed in section 3 and 4.



Ranging Reticle

The center circular reticle shown below is used to aim the binoculars. The reticle is dimensioned to be the same size as the spread of the laser beam.



Eyecup

The adjustable eyecups are designed for comfort and to block extraneous light. To adjust the eyepiece, turn it counter-clockwise. To return the eyepiece to its original position, turn it clockwise.

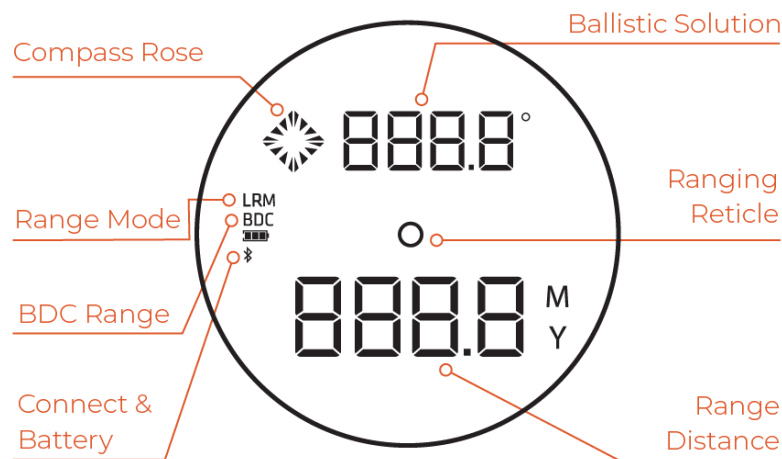
Eyepiece Diopter Adjustment

The eyepiece diopter adjustment rings allow you to focus the LCD display for your eye. To adjust the focus:

1. Adjust the eyecups to your preferred position.
2. Adjust the focus knob until a clear image is achieved.
3. With the display illuminated, turn the Right diopter adjustment ring in or out until the display is clear.
4. Adjust the Left diopter adjustment ring until the image and display are clear.

LCD Display

An Organic Light-Emitting Diode (OLED) Display is mounted within the optical system and projects information into the field of view.



Laser Range Sensor

The IEC Class 1M laser range sensor emits eye-safe invisible infrared energy pulses. The BLR10b determines distance by measuring the time it takes for each pulse to travel from the rangefinder to the target and back. The ranging reticle flashes whenever the laser is being transmitted. The laser may be active for a maximum of 10 seconds while it scans.

Targeting

The BLR10b automatically provides the best accuracy and acquisition distance to a given target. The maximum measurement distance varies with target quality and environmental conditions. The maximum measurement distance in ideal conditions is approximately 5,000 yards on a reflective target.

When selecting a target, you should consider the following for better-ranging results:

- Reflectivity: Lighter colors and shiny surfaces provide better reflection.
- Angle: Aiming perpendicular to a target versus aiming at an angle can affect MOA/MILs adjustment.
- Lighting Conditions: Overcast skies will increase the unit's maximum range while sunny skies will decrease the unit's maximum range.

Altimeter

Your rangefinding binocular is equipped with a barometric pressure sensor that is mounted inside the housing. A Gore-Tex® membrane allows an accurate sampling of barometric pressure while maintaining a weatherproof seal. This device measures relative pressure uncorrected to sea level - this is station pressure. The BLR10b automatically converts station pressure to an equivalent altitude for standard conditions. Both the station pressure reading and equivalent altitude are accessible under Quick Keys, which will be explained later on.

Temperature Sensor

A temperature sensor is also located inside the housing and is exposed to ambient conditions. There may be a slight response time delay while the unit reaches outside temperature if your binoculars have been warmed by your body or vehicle temperature for instance.

Inclination Sensor

There is also an inclination sensor located inside the housing of the binocular. When the binocular is aimed at an object and the range is obtained by pressing the Fire button, the inclination angle to the target is automatically calculated for you.

Section 4- Menus

QUICK KEYS FUNCTIONS		SETTINGS MENU (HOLD 3 SEC)	
LRM	Target Mode	TEMP	Temperature
187.3 _y	Range/Ballistic Solution	Mode	Mode
187.3 _y	Range Scan Measurement	Unit	Unit
' 12	Wind Speed and Direction	Hand	Hand
brt 1	Display Brightness	Lat	Lat
279.0	Last Calculated Data	Cal	Calibration
		bt	Bluetooth

QUICK KEYS

Your BLR10b is equipped with Quick Keys to allow for efficient operation of high-use functions. The Quick Keys are accessed from the main screen without the need to enter the main menu.

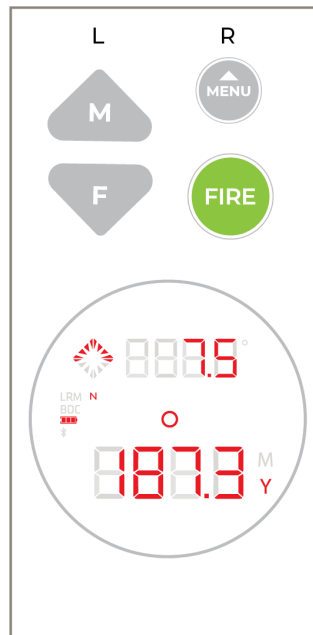
Targeting Mode Setting - Select the targeting mode based on various field conditions: From the main display short press the menu button to cycle through the 4 available Targeting Modes: Near, Far, Long Range Mode (LRM) Near and LRM Far. Once the desired target mode is shown in the left center of the field of view press the Fire/Enter button to save the selection. Additional information on the targeting modes is listed in section 6 of this menu.



Range/Ballistic Solution- To acquire the distance to your target and calculate the ballistics solution from the main display, align your target with the ranging reticle and press the fire button.

The ranged distance display will flash sequentially as the target distance is being acquired. The target distance will then be displayed in the ranged distance display.

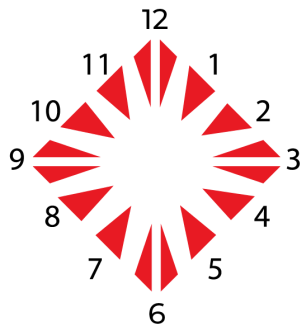
When in Profile Output Mode the ballistic solution will be displayed (when in profile mode) in the upper display, alternating between the elevation and windage solutions. The compass rose will also alternate indicating the direction of the elevation and windage solutions.



Range Scan Measurement - Continuously acquire the range of targets: With the Near or Far Target Ranging Modes selected, press and hold the Fire button from the main display.

Once the 1st distance range is acquired, the ranging reticle will continue to flash as additional ranges are acquired. The most recently acquired range will be displayed in the lower display segments. Once the Fire button is released, the last acquired range will be displayed in the lower display segments, and the ballistic solution will be displayed in the upper display segments.

Wind Speed and Direction- Change the speed and direction of the wind vector: From your main display, press either the arrow up or arrow down button to start the Wind Vector Input, then move the arrows up and down to change directions on the wind “clock.” The number in the upper display segments will indicate the relative wind direction, synced with the clock position.

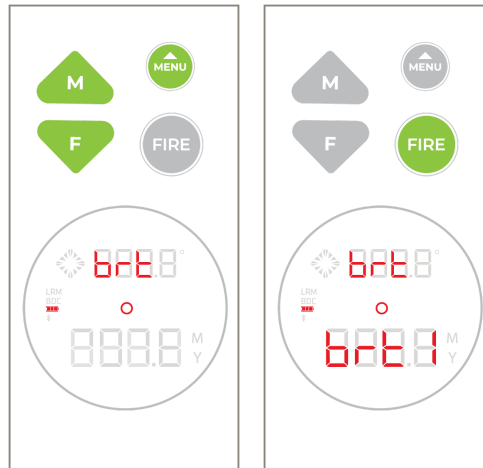


Once you have reached the desired direction, press the Menu button to advance to the wind speed adjustment. Use arrows to adjust the wind speed to the desired value.



Once the wind speed is set at the desired value, press the Fire/Enter button to save the wind vector settings.

Display Brightness - To select the brightness of the display: From the main display press and hold the Up and Down Arrow buttons along with the Menu button. With the menu button depressed, move the Arrow Buttons to select the desired brightness (Levels 1-4 or Auto). Once the desired brightness level is selected, release all buttons.



Display Last Calculated Data - View the sensor data and calculated ballistic solution:
 From the main display, press the Menu button and Fire button to display the Last Collected Data. Use the up and down arrows to scroll through the data.

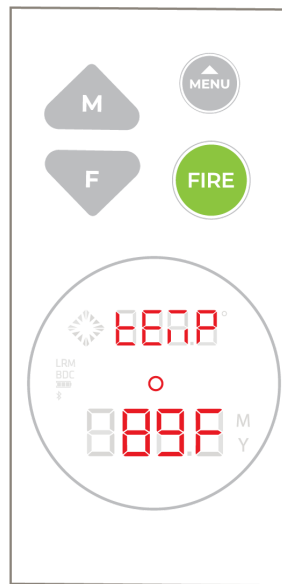


Data Type	Displayed Name	Example Value
Range	Rang	505
BDC Result	BDC	501
Elevation Correction	ECor	7.1
Wind Correction	WCor	2.2
Wind Speed	WSpd	5
Wind Direction	WDir	40
Pressure	Pres	24.9
Temperature	Temp	75
Azimuth	Azmt	350
Shooting Angle	Angl	0 (+/-)
Hardware Version	HRDW	0.3
Firmware Version	FRMW	4.5

SETTINGS MENU

The settings menu can be accessed with a long press of the Menu button. To scroll through the menu, use the up and down arrows. To select, press the menu button again. To go back, click the fire button.

Temperature Override: Manually adjust the temperature value. Use the up and down arrows to edit the temperature setting. Press the Fire button to save the value. Press and hold the menu button to reset the sensor value.



Range Output Mode: Select between Range only (RNG), Ballistic Profile (Prof), and Clear (Clr).

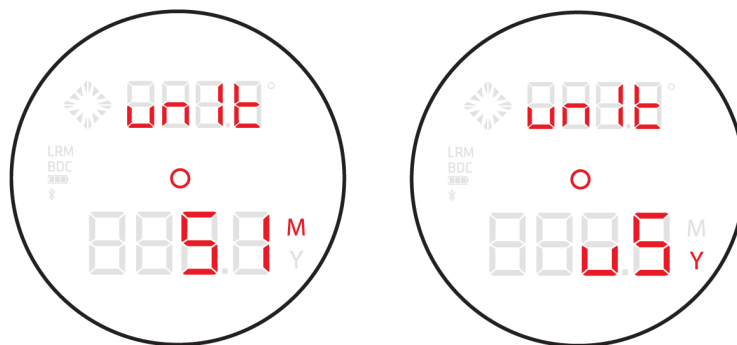
Range: Only the LOS distance is displayed after acquiring a range

Profile: All profile parameters required to calculate a ballistic solution are used including units of measure, wind mode (vector or base wind), and if ballistic turret (BDC) solutions are displayed. The profile name will flash after “Prof” flashes for 1.5 seconds. The BLR10b stores 1 profile synced through the Revic app.

Clear: All profile data is cleared from the BLR10b, and the unit is reset to the original factory Range Output mode.

Units of Measure: Choose your preference of measurement. 4 options are available.

- Y/US outputs yards for distance and US units for everything else within the BLR10b.
- Y/SI outputs yards for distance and SI (System International) units for everything else within the BLR10b.
- M/US outputs meters for distance and US units for everything else within the BLR10b.
- M/SI outputs meters for distance and SI (System International) units for everything else within the BLR10b.

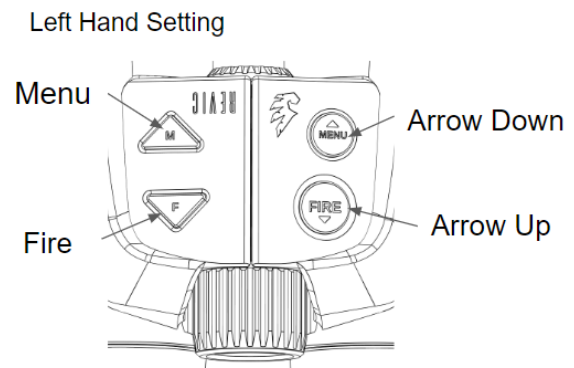
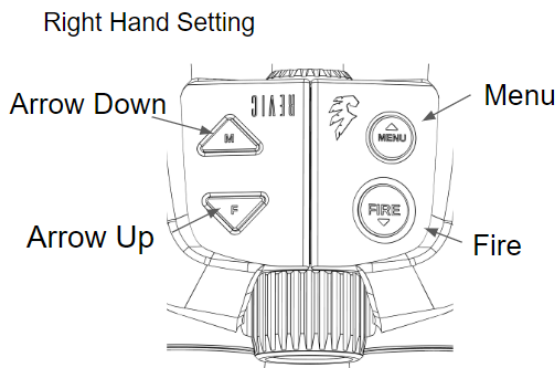


Correction Angle MOA, MILs: The elevation and windage correction is displayed in the unit of measure provided by the profile (MOA or MILs). To change the correction angle units, update the profile in the Revic App, and sync the updated profile to the BLR10b.

Hand Setting: The button configuration can be switched for primary use by right or left hand.

Right Hand (rh): Fire and Menu buttons on the right side of the binocular.

Left Hand (Lh): Fire and Menu buttons on the left side of the binocular.



Latitude: Can only be adjusted manually through the BLR10b. Select this option by pressing the menu button and using the up and down arrows to adjust your latitude. The default setting is 45° N.

Compass Calibration: Choose this option to calibrate your device and establish a baseline for north. During calibration, rotate the device on all axes in an infinity pattern until the unit reads “Pass.” Calibrate as needed.

Bluetooth: Turn the Bluetooth on/off. How to connect your device is explained in the “Connect to a Device” section.

Section 6: Measurement Modes

Range Mode

- a. Line of Sight Only

Profile Mode

- a. Ballistic calculations are always shown along with Distance (MOA or MIL is a profile setting)
- b. BDC is displayed when active in the profile setting.

Scan Mode

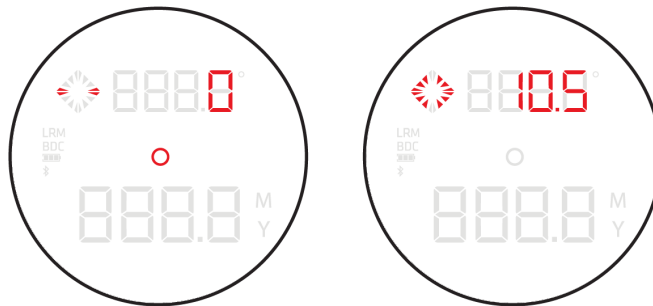
When the Target Mode is set to Near or Far, Scan mode will start after the first range is collected and the Fire button is depressed. The SCAN will continue for up to 10 seconds, giving you different ranges as you move. This can be used when you have difficulty getting a range-hold the fire button down, and it keeps sending pulses out.

Section 5 – SETTING WIND

Base Wind

The base wind feature provides a simple 3 or 9 o'clock wind solution without spindrift. To set the base wind, enter a base wind value into the Ballistic Profile in the Revic App. The recommended setting is 5mph.

The base wind solution is displayed with both wind directions of the compass rose illuminated.



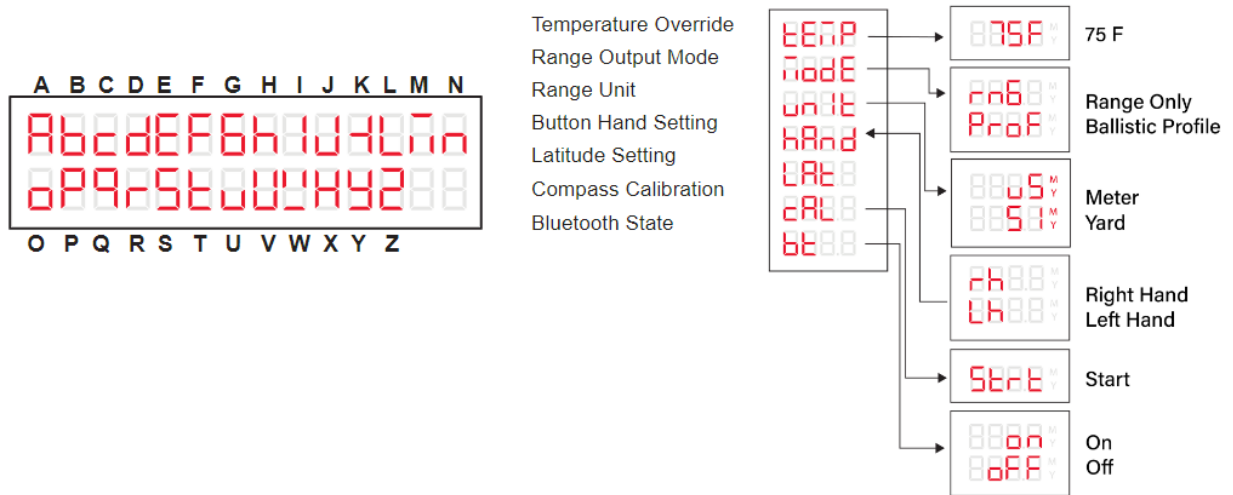
If the wind setting has been manually changed from Base Wind, press and hold the up and down arrows simultaneously to reset to the profile Base Wind setting. If no Base Wind value is set in the synced profile the wind setting will be reset to a base wind of 0.

Wind Vector Input

Wind vector input provides more accurate wind solutions. It enables both wind direction and speed input and compensates for head and tailwind, aerodynamic jump (profile setting), and spindrift (profile setting).

Section 4- Quick Keys Wind Speed and Direction provides details to change the Wind Vector.

Diagram of Alphabet and Menu User Interface:



APPENDIX

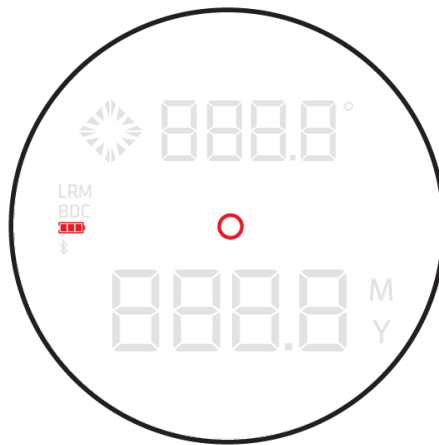
Care & Maintenance

The battery is the only user-replaceable part in the BLR10b. Do not remove any screws. To do so will affect or void the warranty.

Low Battery Warning

The BLR10b monitors the battery voltage. The battery power indicator is located on the left side of the LCD, between the data segments.

- The BLR10b has a constant battery power indicator. When the battery indicator reaches one bar, we suggest you replace the battery as soon as possible.
- Although the unit still operates, it is recommended that you install a new battery before making changes to a profile or going on a hunt.
- When the voltage drops below one bar, the system operation is locked and then powers off.
- You must replace the battery to return to normal system operation. The synced profile will be saved.



Protecting from Moisture and Dust

The BLR10b is IP67 rated, which means it is sealed to provide protection from dust and rain, but will not withstand prolonged submersion (1-meter submersion up to 30 minutes).

Precautions

Avoid staring directly at the laser beam for prolonged periods.

The BLR10b is designed to meet FDA eye safety requirements and is classified as eye-safe to Class 1 limits, which means that virtually no hazard is associated with directly viewing the laser output under normal conditions. As with any laser device, however, reasonable precautions should be taken in its operation. It is recommended that you avoid staring into the transmit aperture while firing the laser.

Never point the unit directly at the sun.

Exposing the lens system to direct sunlight, even for a brief period, may permanently damage the internal components and may cause permanent eye damage.

Avoid direct sun exposure on the eyepiece.

Exposing the eyepiece to direct sunlight can damage the internal display. The eyepiece cover should be in place when the unit is not in use.

Do not expose the instrument to extreme temperatures.

BLR10b components are rated for a temperature range of -4°F to 140°F (-20°C to 60°C).

Protecting from Shock

The BLR10b is a precision instrument and should be handled with care. It will withstand a reasonable drop shock.

Transport

When transporting the BLR10b, the unit should be secured in the provided carrying case. The eyepiece cover should be in place whenever the BLR10b is not in use.

Cleaning

Clean the BLR10b after each use, before returning it to its carrying case. Check all of the following items:

- Moisture: If the unit is exposed to excess moisture, towel off excess moisture and air dry the instrument at room temperature with the battery removed and the battery compartment open.
- Exterior dirt. Wipe exterior surfaces clean to prevent grit buildup in the carrying case. Isopropanol may be used to remove dirt and fingerprints from the exterior.
- Ocular and Objective lenses: Cleaning the lenses after each use is suggested. Failure to keep the lenses clean may cause damage.

Storing

If you won't be using the BLR10b again soon, remove the battery before storing the instrument. The storage temperature should be between -20°F to 162°F (-29C to 72C).

Warranty and Service

Gunwerks LLC warrants this product to be free from defects in material or workmanship for a period of five (5) years from the date of purchase. This limited warranty does not cover failures resulting from abuse, negligence, or unauthorized repairs. During this period, if the product is found to have defects in material or workmanship, Gunwerks LLC will, at its option and without charge, repair or replace such product.

To complete the warranty registration process for your product, please visit www.gunwerks.com/productregistration

Should you require assistance or service, please submit a support request to <https://www.gunwerks.com/support-requests> or call (307) 296-7300

Specification	Value
Measurement Range	10 to 5000 yds
Tilt Sensor Range	89 degrees
Temperature Sensor Range	-20C to 60C or -4°F to 140° F.
Pressure Sensor Accuracy	10 to 34 inHg
Optical	10x42mm
Field of View	6.1 degrees
Weight	900g or 32oz
Overall dimensions (Length X Width X Height)	132*70*145mm or 5.2x2.8x5.7in
Environmental Protection	IP67
Operating Temperature	-20C to 60C or -4°F to 140° F.
Storage Temperature	-29C to 72C or -20°F to 162° F.
Battery	CR2
Battery Life	4000 Range Cycles
Laser Type	IEC Class 1
Beam Divergence	1.459 x 0.062mrad
Ballistic Output Units	MOA or MILs
Measurement/Ballistic Solution Time	<2 sec
Target Modes	Near, Far, LRM Near, LRM Far

Legal

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This product is covered by patents pending and the following US Patents: Find our patents at patent-list.info

Gore-Tex is a registered trademark of W. L. Gore and Associates. Google Play Store is a registered trademark of Google, LLC. App Store® is a registered trademark of Apple Inc. All other trademarks are the property of their respective owners.

Industry Canada Notice

This device contains license-exempt transmitter(s)/receiver(s) that comply with Innovation, Science and Economic Development Canada's license-exempt RSS(s). Operation is subject to the following two conditions:

- This device may not cause interference.
- This device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'industrie Canada applicable aux appareil radio exempts de licence.

L'exploitation Est Autorisée aux deux conditions suivantes:

- l'appareil ne doit pas produire de brouillage, et
- L'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

This device meets the exemption from the routine evaluation limits in sections 2.5 of RSS 102 and compliance with RSS-102 RF exposure, users can obtain Canadian information on RF exposure and compliance.

Supplier's Declaration of Conformity

47 CFR § 2.1077 Compliance Information

Unique Identifier: AY-R-E1101
Gunwerks LLC
201 Blackburn St Cody Wy, 82414
T: (307) 296-7301

FCC Compliance Statement (e.g., products subject to Part 15) This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Changes or modifications not expressly approved by the party responsible for compliance could void your authority to operate the equipment.

Note:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.