



Nikon Monarch Gold LASER1200



**Nikon Team REALTREE** LASER1200



### **Instruction Manual**



## **Laser Rangefinder**

Thank you for purchasing the Nikon Laser 1200. This high-spec laser rangefinder has a waterproof design in order to be used for sports, leisure and other outdoor situations. The Nikon Laser 1200 also supports the measuring accuracy of existing Nikon Laser Rangefinders.

Please observe the following guidelines strictly so you can use the equipment properly and avoid potentially hazardous problems. Before using this product, read thoroughly the "SAFETY PRECAUTIONS" and instructions on correct usage accompanying the product. Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure

Keep this manual within reach for easy reference.

- · Specifications and design are subject to change without
  - · No reproduction in any form of this manual, in whole or in part (except for brief quotation in critical articles or reviews), may be made without written authorization from NIKON VISION CO., LTD.

# **Key Features**

- Measuring range: 10m-1,100m/11 yards-1,200 yards
- Distance measurement display 0.5m/yard (<1,000m/yards)
- 1m/yard (≥1,000m/yards)

   Easy-to-aim 7x optical observation system
- Backlight LCD for situations with little or no light.
- Target Priority Switch System allows you to easily match the measuring situation with one of the two Priority Systems
- Waterproof design (NOT designed for underwater usage)
   Invisible/Eyesafe FDA Class I Laser
- 8-second results display
- Compact, ergonomic design
  Automatic shut-off (after approx. 8 sec. unattended)
- Default to "Last Use" settings
- 20-second continuous measuring function
- · Diopter adjustment function

The Nikon Laser 1200 emits invisible, eyesafe, infrared energy pulses that reflect off the selected target back to its optical receiver. Sophisticated precision charge circuitry is used to instantaneously calculate distances, by measuring the time it takes for each pulse to travel from the rangefinder to the target and back. The maximum range of the instrument depends on the reflectivity of the target, its color, surface finish, size and shape

### The following factors ensure best range and accuracy: Niahttime use

- Cloudy weather

- Bright-colored targetsTargets with highly reflective surfaces
- Targets with shiny exteriors
- Large-size targets
- Shooting targets facing at 90 degrees

### Measurement may result in inaccuracy or failure in the following cases:

- Slender or small target
- Target has diffusing reflective surface
  Target does not reflect the laser beam (glass, a mirror, etc.)
- Black target
- Target has pronounced depth
- In snow, rain or fog
- Target measured through glass Reflective surface measured from diagonal direction
- Moving target
- Obstacle moving in front of the target
- · When targeting the surface of water

# **CAUTIONS BEFORE USE**

Please observe the following guidelines strictly so you can use the equipment properly and avoid potentially hazardous problems. Before using this product, read thoroughly the "SAFETY AND OPERATION PRECAUTIONS" and instructions on correct usage accompanying the product. Keep this manual vithin reach for easy reference.

# **⚠ WARNING**

This indication alerts you to the fact that any improper use ignoring the contents described herein can result in potential death or serious injury.

# **△ CAUTION**

This indication alerts you to the fact that any improper use ignoring the contents described herein can result in potential

### SAFETY AND OPERATION PRECAUTIONS ⚠ Warning

# Never look directly at the laser beam or directly at the sun

- when using the Nikon Laser 1200.
- Do not depress the POWER button while aiming with the eye or looking into the optics from the objective side.
- Do not operate the unit with other additional optical elements such as lenses or binoculars. Using an optical instrument together with the Nikon Laser 1200 increases the danger of damaging the eyes.
- Do not disassemble the Nikon Laser 1200. A product that has been disassembled is not guaranteed by the manufacturer.
- If the Laser 1200's body cover is damaged, or if it emits a strange sound due to dropping or for some other cause, immediately remove the battery and stop using

# **△** Cautions

- When not using the Nikon Laser 1200, do not push the POWER button
- Do not leave the Nikon Laser 1200 within the reach of small
- Rain, water, sand or mud should be removed from the rangefinder body surface as soon as possible, using a soft, clean, dry cloth.
- Although the Nikon Laser 1200 is waterproof, it is not designed for use underwater.
- Do not swing the Nikon Laser 1200 by its strap. It may hit
- someone and cause injury. Do not leave the Nikon Laser 1200 in an unstable place, as it
- may fall and cause injury, or damage the equipment.
  Do not look through the Nikon Laser 1200 while walking. You
- may walk into something and get hurt. Do not leave the Nikon Laser 1200 in a car on a hot or sunny day, or near heat-generating equipment. This may damage or negatively affect it.
- Do not leave the Nikon Laser 1200 in direct sunlight. Ultraviolet rays and excessive heat may negatively affect or even damage
- When the Nikon Laser 1200 is exposed to sudden changes in temperature, water condensation may occur on lens surfaces.
- Do not use the product until the condensation has evaporated. Do not use alcohol for cleaning the main body.

- - Do not leave the polyethylene bag used for packaging within the reach of small children.
  - · Be careful that small children do not inadvertently swallow the eyecup. If it does happen, consult a doctor immediately.
  - If you use the rubber eyecup for a long period of time, you may suffer skin inflammation. If you develop any symptoms, consult a doctor immediately.
    When carrying the Nikon Laser 1200, store it in the soft case.
  - If your Nikon Laser 1200 should fail to operate correctly, discontinue use immediately and consult the Troubleshooting
  - Table. If you are unable to fix the problem, contact your local dealer for instructions on where to send it for repair.

# **CARE AND MAINTENANCE**

- When removing dust on the lens surface, use a soft oil-free brush.
- When removing stains or smudges like fingerprints from the lens surface, wipe the lenses very gently with a soft clean cotton cloth or quality oil-free lens tissue.
- Use a small quantity of pure alcohol (not denatured) to wipe stubborn smudges. Do not use velvet cloth or ordinary tissue, as it may scratch the lens surface. Once the cloth has been used for cleaning the body, it should not be used again for the lens surface.

 Clean the body surface with a soft, clean cloth and a dry cloth. Do not use benzene, thinner, or other organic agents because they may cause discoloration or rubber degeneration.

# Water condensation or mold may occur on the lens surface.

- because of high humidity. Therefore, store the Nikon Laser 1200 in a cool, dry place.
- After use on a rainy day or at night, thoroughly dry it at room temperature, then store in a cool, dry place.

# **NOTES ON LITHIUM BATTERY**

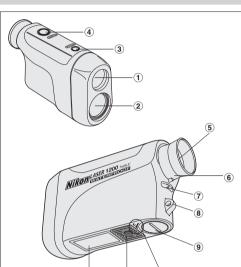
If handled incorrectly, battery may rupture and leak, corroding equipment and staining clothing. Be sure to observe the

- Install battery with the + and poles positioned correctly. · Battery should be removed when exhausted or during
- extended periods of non-use.
- Use the same type of battery.
- · If battery fluid contacts eyes or skin, rinse well with water. If swallowed, consult a doctor immediately.
- Do not short-circuit battery chamber terminals
- Do not carry batteries together with keys or coins in a pocket or bag. This may overheat and short-circuit batteries.
- · Do not put batteries in fire or water. Never disassemble batteries.
- Do not charge batteries.
- · Do not subject stored batteries to extremes in temperature.
- Do not subject batteries to strong vibrations or shock.

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## Nomenclature

- 1 Monocular objective lens/Laser emission aperture
- (2) Laser detector aperture
- (3) MODE button
- 4 POWER button
- (5) 7x monocular eyepiece
- 6 Eyecup/diopter adjustment ring
- 7 Diopter index 8 Strap eyelet
- Battery chamber cover
- 10 Battery chamber cover "Open/Close" indication
- (11) Tripod socket
- (12) Product number/explanatory label



# Status of the Internal Display

1. [ ] — Reticle (aiming system)
Use to take aim at the target. Position the target at the center of the reticle, which will always appear in the display

Laser applying mark
 Appears at the same position as the reticle, indicating that the laser is being applied for a measurement. (Also remains present during continuous measuring.)

[ \* ] — Appears while measuring. 2. [888.8] — Distance/measurement status display

Digitally indicates measured distance in meters/yards. Also indicates measuring status such as "Measurement in progress", "Measurement unsuccessful" or "Unable to measure" Display of results: (<1,000m/yards) e.g. 576.5 yards =  $[5.75.5v_D]$ 

Display of results: (≥1,000m/yards)

e.g. 1,055m = [ 1055<sup>m</sup> 1 [=] — Now measuring

[---] — Failure to measure or unable to measure distance 3. [ m] — Indicates distance being measured in meters.

4. [YD] — Indicates distance being measured in yards.

5. [ ] — First Target Priority display Appears when the First Target Priority is selected. Does not appear when Distant Target Priority is selected.

**6.** [ — Indicates battery condition. (See "Changing Batteries")

Although the LCD was produced using the most advanced technology, it is impossible to eliminate dust completely. When using this product, the LCD is magnified by high magnification of the eyepiece lens and dust may appear as a defect. It will not, however, affect measurement accuracy.

# **Changing Battery**

Type of battery: 3V CR2 lithium battery

**Battery condition indicators** 

Battery has enough charge for use <del>-</del>

-ì<del>ض</del>í-. Battery charge is getting low flashing: Battery charge is low and battery should be replaced.

disappears: Battery is exhausted and should be replaced

flashing in the LCD indicates that the battery should be replaced.

3 Close the battery chamber cover

(1) Open the battery chamber cover Insert a coin or similar item into the slot in the battery chamber cover, and rotate it following the "Open/Close" indication. The cover

may not open easily due to its O-ring seal for water and dust resistance. (2) Replace the old battery with a new one

Install new battery with the [+] and [-] correctly positioned following the "Battery installation" indication seal in the battery chamber. (Insert battery positioning the [+] pole towards the inside of the chamber.) [The Laser 1200 will not operate if the battery is installed incorrectly.]

Screw the cover back in place using a coin or similar item. The cover may not close easily due to the O-ring seal for water and dust resistance. Confirm that the cover is correctly closed.

Battery life

Continuous operation: Approx. 5,000 times (with backlight off at 20°C) Target focusing, measurement, and automatic power off are included in a single cycle. This figure may differ according to

temperature, and other factors such as target shape, color, etc.

\* The Laser 1200 comes with a 3V CR2 lithium battery. However, due to natural electric discharge, the life of the battery will likely be shorter than that

Replace battery if the Laser 1200 is ever submerged in water or if water enters the battery chamber.

Composition	
Bodyx	ĺ
Soft case (CAS)x	
Neckstrapx	i
Lithium battery (CR2)x	ı



## **Operational Summary**

### Caution — use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure

1. Install a battery in the battery chamber. (See "Changing Batteries")

2. Rubber eyepiece cup
Eyeglass wearer: Collapse the eyepiece cups.

Non-eyeglass wearers: Do not collapse the eyepiece cups.

### 3. Diopter adjustment

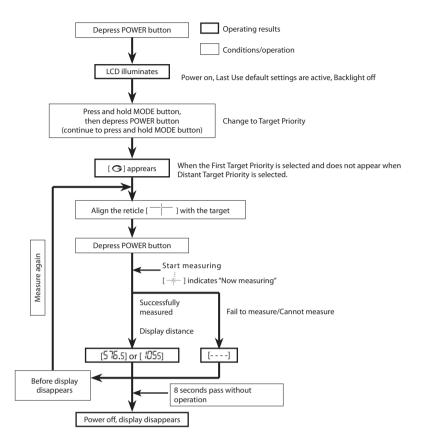
Adjust diopter to obtain a clear image in the LCD.

First, rotate the diopter adjustment ring counterclockwise until it comes to a complete stop. Next, turn on the power to activate the LCD when you look through the Laser 1200. Rotate the diopter adjustment ring clockwise until the display comes into focus.

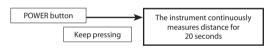
If the diopter is not adjusted to correspond to your eyesight, you may not be able to clearly focus your subject.

### 4. Measuring

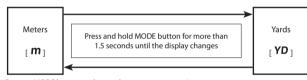
Note: Depressing and holding down the POWER button causes all symbols to be displayed in the LCD panel. After you remove your finger from the POWER button, the last-used setting is displayed. (If you briefly press the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button then remove your finger, the LCD pressure from the POWER button thepanel may display the last-used setting without displaying all of the symbols. This is not a malfunction or other problem.)



### Continuous measurement



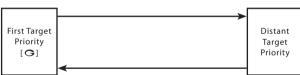
# 5. Select unit of measurement: $\mathbf{m}$ (meter) or $\mathbf{YD}$ (yard)



\* Depress MODE button to change the measurement unit.

# 6. Selecting target priority

Target Priority Switch System allows you to select display mode from First Target Priority and Distant Target Priority.



# Switching procedure

- 1. LCD panel should be on.
- $Press \ and \ hold \ MODE \ button, then \ depress \ and \ hold \ POWER \ button \ within \ one second, \ and \ continue \ to \ press \ and \ hold \ buttons. \ (If \ hold \ ho$ buttons are not pressed in the correct order, switching will not take place.)
- Hold both buttons (approx. two seconds) until "G" appears or disappears (depending on current target priority), to confirm switching.
- Then release buttons

# [Deciding which Target Priority to use]

When obtaining different results from a single measuring operation, the Laser 1200 will display the distance to the farthest target on the LCD panel when using Distant Target Priority mode, while First Target Priority mode will show the range to the nearest target.

ex.) When measuring a tree standing in front of a house;

_	-	
	Tree	House
Distance to target	135m	157m

"135m" (distance to the tree) will be displayed in First Target Priority mode, and "157m" (distance to the house) in Distant Target Priority

First Target Priority mode, for example, has applications for golf, while Distant Target Priority is useful when hunting in heavily wooded areas.

# 7. Backlight

# Use the backlight to see the LCD panel in dark conditions.

By pressing MODE button briefly (less than 1.5 seconds) while the power is on, the backlight can be turned ON and OFF. The backlight can also be turned off by turning the Laser 1200's power off. In this case, the backlight will be off when the Laser 1200's power is turned on again.

# 8. Low battery indication

Flashing indicates that the battery charge is low and battery should be replaced. (See "Changing Battery")

## **Specifications**

The Nikon Laser 1200 features a Roof-prism monocular optical system for viewing your target. A liquid crystal display (LCD) is mounted within the optical system that when activated, displays a reticle for targeting, meter/yard and Target Priority and a target quality gauge, as well as precision and low battery indicators. It is also equipped with a built-in backlight.

Optical system Type	Roof-prism monocular	
Magnification (x)	7	
Effective diameter of objective lens (mm)	•	
Angular field of view (real) (°)	5.0	
Eye relief (mm)	18.6	
Exit pupil (mm)	ø3.6	
	7-1-1	
Diopter adjustment ±4m <sup>-1</sup>		
Laser		
Class	FDA Class I	
Wavelength (nm)	870	
Pulse duration (ns)	14	
Output (W)	15	
Beam Divergence (mrad)	Divergence (mrad) V: 2.1, H: 0.021	
thers		
Measuring range	10m-1,100m/11 yards-1,200 yards	
Distance measurement display step	<1,000m: 0.5m/yard step	
Distance measurement display step	≥1,000m: 1m/yard step	
	Body: Waterproof (maximum depth of 2 meters for up to 5	
Structure	minutes.)**	
	Battery chamber: Water resistant***	
Operating temperature (°C)	-10 — +50	
Operating humidity (%RH)	80 (without dew condensation)	
Power source	CR2 lithium battery (3V DC) x 1	
Dimensions (L x H x W) (mm)	145 x 82 x 47	
Weight (g)	Approx. 280 (without battery)	
Safety	FDA: Class 1 laser product (21CFR 1040.10 and 1040.11)	
	Fcc: Fcc Part 15 Subpart B Class B	

### \* Waterproof models:

The Laser 1200 is waterproof, and will suffer no damage to the optical system if submerged or dropped in water to a maximum depth of 2 meters for up to 5 minutes.

The Laser 1200 offers the following advantages:

- Can be used in conditions of high humidity, dust and rain without risk of damage.
- Nitrogen-filled design makes it resistant to condensation and mold.

Observe the following when using the Laser 1200:

- · As the unit does not have a perfectly sealed structure, it should not be operated nor held in running water.
- Any moisture should be wiped off before adjusting movable parts (focusing knob, eyepiece, etc.) of the Laser 1200 to prevent damage and for safety reasons.

To keep your Laser 1200 in excellent condition, Nikon Vision recommends regular servicing by an authorized dealer.

\*\* The battery chamber is water resistant, not waterproof. Water may enter the device if the Laser 1200 is submerged in water. If water enters the battery chamber, wipe out any moisture and allow time for the chamber to dry.

# Troubleshooting/Repair

If your Nikon Laser 1200 should require repair, please contact your local dealer for details regarding where to send it. Before doing so, you are advised to consult the Troubleshooting Table below

Symptom	Check Points
Unit does not turn on — LCD fails to illuminate	Depress POWER button.     Check and replace battery if necessary.
Target range cannot be obtained	Be sure that nothing, such as your hand or finger, is blocking the laser emission aperture and laser detector. Be sure that the laser emission aperture and laser detector are clean. Clean them if necessary. Be sure that the target shape and condition is appropriate to reflect the laser beam. Replace battery.
[] ("Cannot measure") appears	Be sure to hold the unit steady while depressing the POWER button.     Be sure the target is within measuring range (10 - 1,100m/11 - 1,200 yards)
Closer target cannot be measured	Be sure that nothing, such as leaves or grass, is between the Laser 1200 and the target.
Target beyond a certain distance cannot be measured	Be sure that nothing, such as leaves or grass, is between the Laser 1200 and the target.
Measurement result is unstable	Replace battery. Be sure that the target shape and condition is appropriate to reflect the laser beam. Be sure to hold the unit steady while depressing the POWER button. Be sure that nothing, such as leaves or grass, is between the Laser 1200 and the target.
Incorrect result is displayed	Replace battery. Be sure that the target shape and condition is appropriate to reflect the laser beam. Be sure that nothing, such as leaves or grass, is between the Laser 1200 and the target.

If problems persist after consulting the Troubleshooting Table, please contact your local dealer to check/repair the Laser (and the Contact of the Contact1200. Never let anyone other than the official representative of the product manufacturer check or repair the Laser 1200. Failure to follow this instruction could result in injury, or damage to the product.

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.

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.
- Consult the dealer or an experienced radio/TV technician for help.

Do not use the Laser 1200 for purposes beyond the limits of its stated accuracy.