



English

CATEYE

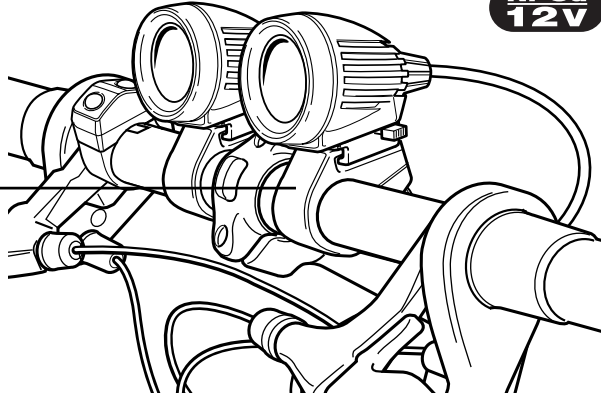
High Power Lighting System
for Bicycles
TWIN/SOLO
Model HL-NC250/260

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Printed in Japan NCM25W-011120 0688488 4

TWIN
SUPER HALOGEN
SOLO

Ni-Cd
12V

MOUNTING EXAMPLE



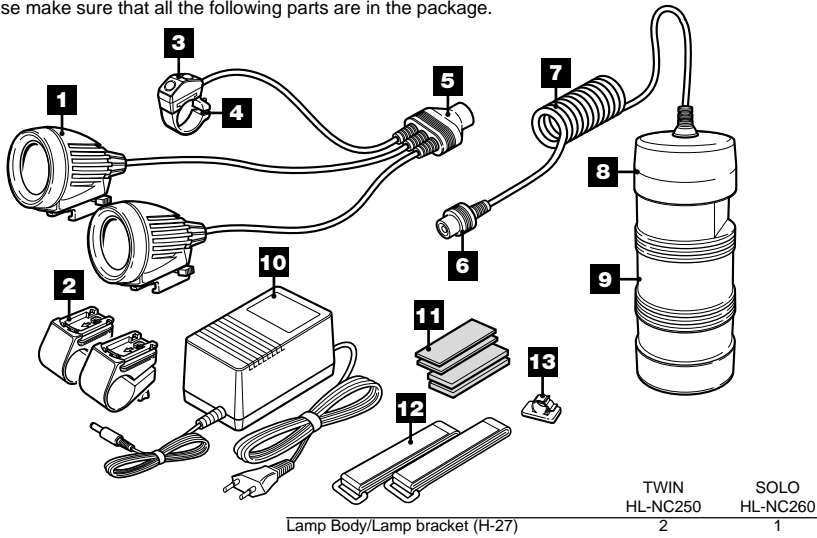
TWIN: HL-NC250

Mounted under the bars with the optional extension spacer.

SOLO: HL-NC260

NAMES

Please make sure that all the following parts are in the package.



Lamp Body/Lamp bracket (H-27) TWIN HL-NC250 SOLO HL-NC260
2 1

ENGLISH	FRENCH	DEUTSCH	SPANISH	ITALIANO	NEDERLANDS	
1 Lamp Body	Phare	Lampengehäuse	Cuerpo de Lámpara	Lampade	lampomhulsel	1
2 Bracket(H-27)	Support de phare (H-27)	Lampenhalterung (H-27)	Soporte de lámpara (H-27)	Supporto faro (H-27)	Lamphouder (H-27)	2
3 Switch	Interrupteur	Schalter	Interruptor	Interruttore	Schakelaar	3
4 Switch Bracket	Collier d'interrupteur	Halterung Schalter	Soporte del interruptor	Supporto dell'interruttore	Schakelaarhouder	4
5 Plug	Prise	Stecker	Enchufe macho	Presa di connessione	Plug	5
6 Jack	Fiche	Buchse	Enchufe hembra	Spinotto della batteria	Contactje	6
7 Cord	Câble	Kabel	Cable	Cavo	Snoer	7
8 Battery Cap	Coiffe de batterie	Batteriedeckel	Tapa de la batería	Copribatteria	Batterijdeksel	8
9 Bottle Battery	Batterie	Batteriebehälter	Cuerpo de la batería	Portabatteria	Batterijhuls	9
10 Battery Charger	Chargeur de batterie	Batterieladegerät	Cargador de la batería	Centralina caricabatteria	Batterijlader	10
11 Rubber Pad	Garniture en caoutchouc	Gummipolster	Almohadilla de goma	Spessore in gomma	Rubberen vulstukjes	11
12 Battery Belts	Sangles de batterie	Batterieriemmen	Correas de la batería	Fasce per la batteria	Batterij bandjes	12
13 Cord Holder	Attache-câble	Kabelhalter	Sujetacable	Supporto cavo	Snoerhouder	13

LIMITED WARRANTY

2-Year Warranty: Only Lamp Unit and Battery Charger (Excluding bulb and battery)

If trouble or damage occurs during normal use, the product will be repaired or replaced free of charge. Type your name, address, date of purchase and the situation of trouble clearly on the warranty certificate, and send it back to the appropriate service center together with the product. Insurance, handling and transportation charges shall be borne by the customer. After being repaired or replaced, the product will be shipped back to the customer.

Address for service:

CATEYE CO., LTD.

2-8-25 Kuwazu, Higashi Sumiyoshi-ku Osaka 546-0041 JAPAN
Attention: CAT EYE Customer Service Section
Phone: 81-6-6719-7781 Fax: 81-6-6719-2362

Service & Research Address for United States Consumers:

CAT EYE Service & Research Center

1705 14th St. #115 Boulder, CO 80302
Phone: 303-443-4595 Toll Free: 800-5CATEYE(800-522-8393)
Fax: 303-473-0006 e-mail: CatEyeUSA@aol.com

INSTRUCTION MANUAL

READ ALL INSTRUCTIONS BEFORE FIRST USE

Thank you for purchasing the CAT EYE TWIN / SOLO Model HL-NC250/260. Designed for high performance night cycling, this rechargeable lighting system adopts powerful halogen bulb technology. This is a unique high power 12 volt system. Before operating, thoroughly familiarize yourself with this manual so that you understand the light's safe and correct operation. Please keep this manual, along with the warranty card, for future reference.

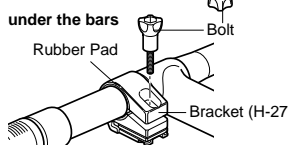
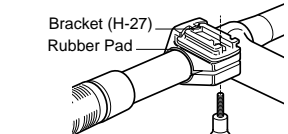
FOR SAFE OPERATIONS (IMPORTANT)

- Warning!!!**
- The lamp body becomes extremely hot when turned on. Never touch the lamp body or lens until thoroughly cooled. Injury may result.
- Stop using the light at once if the lamp unit, cord or bottle battery is broken.
- Use only the included battery charger for charging.
- Never short-circuit the terminal of the bottle battery and the plug of the battery charger. It may cause the battery to over heat, resulting in fire or damage of the components.
- When the battery comes to the end of its useful life, turn the bottom of the bottle battery counterclockwise and take out the inside battery. Safely and properly dispose of the old battery.
- Never place it within children's reach.

- Important Note**
- When using this light on public roads, be sure to adjust the angle of the beam downward so as not to blind oncoming traffic.
- Never disassemble the lamp body or bottle battery for the purpose of modification.
- Never use the bottle battery with other equipment.
- Although the lamp body and the battery are water-resistant (normal weather conditions of rain, etc.), never intentionally submerge them under water.
- Never touch the halogen bulb with bare-fingers; natural skin oils can cause the bulb to over heat and break.
- Never touch or wipe the inside of the reflective mirror. This may degrade the quality of the light output.
- Ni-Cad batteries have unique characteristics. The light output will remain high until just the batteries run out, and then drop suddenly. Take precautions against such a situation by preparing a spare light or spare bottle battery.
- Use only the included battery charger for charging. Never charge the battery for more than 24 hours. After charging, be sure to unplug the charger from the outlet.
- A long period of non-use will lower the voltage of the battery due to natural self discharge. Always charge the battery before using.
- The operation time and charging time may vary with the environment.
- Overdischarge (leaving the light on after the power is completely gone) shortens the performance life of the battery.
- If the lamp body or parts become dirty with mud, etc., gently wipe it away with a dish towel which is moistened with mild soap. Never apply paint thinner, benzene or alcohol; damage will result.

BEFORE FIRST USE: The factory-loaded battery is not fully charged; the charge is useful only for a short period of time. Before first use, charge the battery fully following the instructions on [HOW TO CHARGE].

on top of the bars

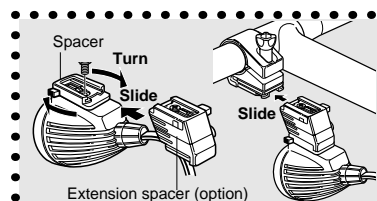


HOW TO ATTACH THE BRACKET

Lamp Bracket (Use both of the two brackets for NC250)

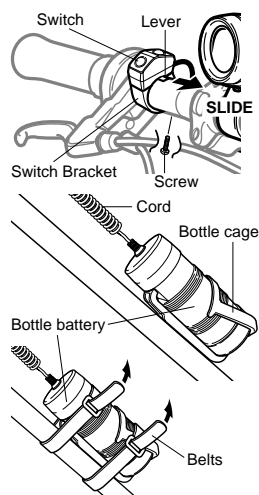
There are two ways of mounting the lamp unit to bicycle; on top of the bars or under the bars. Make sure no cables touch the lamp body. (If brake wire hinders the installation of the "mounting under the bars", use the optional extension spacer.)

- Attach the bracket (H-27) to the handlebar using the appropriate rubber pads provided. Hand-tighten the bolt.
- Before tightening the bolt, adjust the angle of the beam and the position of the lamp body. (Before using, readjust the angle according to the instruction of "Angle of Beam" in "HOW TO USE" section.)
- Tighten the bolt securely. (For a more secure fit, use a screwdriver.)



Using the Extension spacer H-27 LS (Option)

- Loosen the screw of the spacer and turn the spacer 180°. Tighten the screw securely again.
- Insert the extension spacer to the lamp body from the rear.
- When removing the lamp body from the bracket, remove it together with the extension spacer.



Switch Bracket:

Attach the switch bracket (with the switch on it) on the handlebar. Be careful not to hinder the braking or shifting operation.

- Use the appropriate rubber pad provided. Tighten the bolt.
 - To remove the switch from the switch bracket, slide it sideways while pushing the lever (as shown in the figure).
- * When removing the switch, remove the lamp body together.

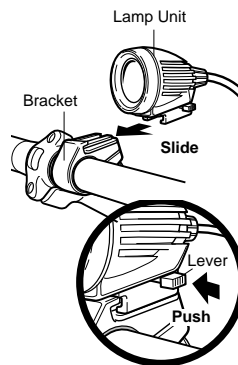
HOW TO MOUNT

Mount the bottle battery into your bottle cage, the lamp body to the lamp bracket and the switch to the switch bracket. Connect the jack to the plug.

Bottle Battery

Insert the battery into your bottle cage and fix it tightly with the battery belts.

Note: While riding, the bottle battery may jump out of the bottle cage by a strong impact. Be sure to fasten it securely with the belts.



Lamp Body

Warning!!! Never touch the lamp body until thoroughly cooled. You may get burnt.

- To install, slide the lamp body forward onto the lamp bracket until it clicks into position. Do the same thing with the switch.
- To remove the lamp body, slide it backward while pushing the lever. Be sure to remove the switch together.

Connecting the Jack

After connecting the jack to the plug, wind the cord round the frame so that it will not hinder riding.

Note: Securely connect the jack to the plug.

HOW TO USE

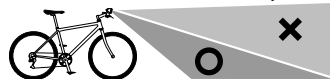
How to Switch on/off

- To switch on/off, press the switch button.
- With the HL-NC250 TWIN, the two buttons operate as follows:
Yellow Button: 20W Grey Button: 12W

Note: In case the light does not turn on, charge the battery.

Angle of Beam

Switch on the light at night in flat place, and adjust the angle vertically. (It is also adjusted 10° horizontally.) To adjust, loosen the screw of the bracket a little.



Warning!!! In addition to its high brightness, the beam is widely diffused. When using this light on public roads, be sure to adjust the angle downward so as not to blind oncoming traffic.

REPLACING BOTTLE BATTERY

By preparing a spare bottle battery, you can continue to use the light and the time for night riding will be extended.

- Turn the battery cap counterclockwise and open it.
- Disconnect the inside jack and replace the bottle battery.

Note: After replacing, securely connect the jack again.

Note: When closing the battery cap, be careful not to catch dust around the rubber ring.

* The bottle battery can be charged without the battery cap. In this case, connect the plug of the charger directly to the jack inside of the bottle battery.

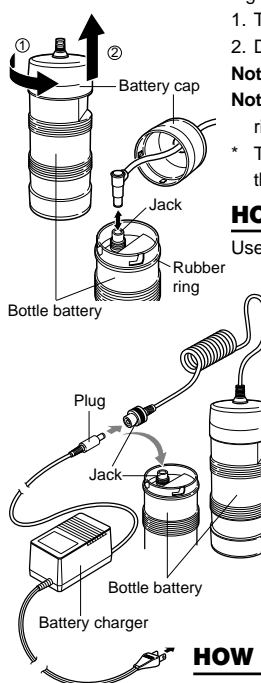
HOW TO CHARGE

Use only the included battery charger in an AC outlet for charging.

- Insert the plug of the battery charger into the jack of the bottle battery (or the jack inside of the battery cap).
 - Plug the battery charger into an AC outlet.
- * The standard charging time is 8 hours if no charge is left in the battery. Never charge the battery for more than 24 hours; battery damage will result.
- After charging, unplug the battery charger and pull out the plug.

Note: Be sure to unplug the battery charger after charging.

Note: To make full use of the bottle battery's capacity, recharge after the battery's whole capacity has been consumed. If the battery does not serve the proper run time even after it has a full charge it may be at the end of its useful life. Replace it with a new one. Recharge / Discharge Number of Times: at least 500 (until rated capacity drops to 50%)



HOW TO REPLACE THE BULB UNIT

When replacing the bulb unit, disconnect the jack from the plug. Be sure the lamp body and the bulb have cooled before replacing.

- Turn the socket holder counterclockwise and remove it.
- Turn the lock ring counterclockwise and remove it.
- Pull out the bulb unit from the lamp body and remove it from the unit holder.
- Insert a new bulb unit into the unit holder and fix it with two screws.

Note: Never touch the halogen bulb with bare-fingers; natural skin oils can cause the bulb to over heat and break. Never touch or wipe the inside of the reflective mirror. This may degrade the quality of the light output.

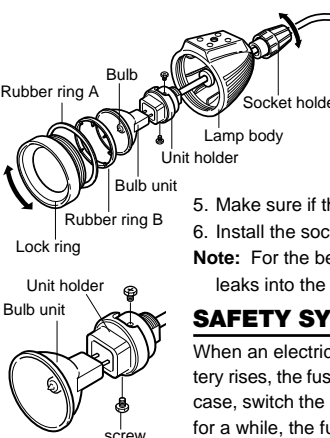
- Make sure if the rubber ring A/B is properly aligned. Install the lock ring, and tighten it.
- Install the socket holder and tighten it.

Note: For the best performance of waterproofing, securely tighten all the parts. If water leaks into the inside of the bulb unit, it might result in damage of the components.

SAFETY SYSTEM (AUTO-RESET FUSE)

When an electrical surge/malfunction occurs in the circuit or the temperature of the battery rises, the fuse blows because of its safety system and the circuit will be closed. In this case, switch the lamp off, find the cause of the malfunction and remove it. After leaving it for a while, the fuse will automatically recover.

Note: If the fuse blows even after the malfunction is removed, or if the fuse does not recover, call the appropriate service center for assistance.



SPECIFICATIONS

Bulb:	12W/20W Halogen Bulb (Only 12W Halogen Bulb with HL-NC260)	Charging Time:	approx. 8 hours (when the temperature is 20°C)
Battery:	Bottle battery /12V·2400mAh Ni-Cad Battery With thermal fuse for overcharge prevention	Operating Temperature	Charging: 0°C - 40°C (32°F - 104°F)
Charger:	CAT EYE Battery Charger (12V J6.5 type)	Range:	Operating: -10°C - 40°C (14°F - 104°F)
Operation Time: (when the temperature is 20°C)		Recharge/Discharge	at least 500 (until rated capacity drops to 50%)
12W:	approx. 140 minutes of continuous use	Number of Times:	
20W:	approx. 80 minutes of continuous use		
12W+20W:	approx. 50 minutes of continuous use		

* The specifications and design are subject to change without notice.