General Safety Information

⚠ WARNING – To avoid serious injuries:

- Obtain and read the service instructions carefully prior to installing the parts. Loose, worn, or damaged parts may cause serious injury to the rider.
  We strongly recommend only using genuine Shimano replacement parts.
- Check that the wheels are fastened securely before riding the bicycle. If the wheels are loose in any way, they may come off the bicycle and serious injury may result.
- Check that the lamp illuminates normally when riding at nighttime.
- Read these Technical Service Instructions carefully, and keep them in a safe place for later reference.

⚠ CAUTION – To avoid serious injuries:

The hub dynamo generates an extremely high voltage. Never touch the connection terminal of the hub dynamo directly while riding the bicycle or while the wheel is spinning. Touching the dynamo terminal may cause an electric shock.

NOTE:

- Check the degree of parallel of the front fork end. If the front fork end is severely out of parallel, deformation of the hub axle may cause noise from an obstruction inside the hub dynamo to be generated.
- Install the hub dynamo to the front fork so that the side with the connection terminal is on the right when facing toward the front of the bicycle. If the side with the connection terminal is facing toward the left, the hub dynamo may not turn properly while riding.
- Check that the hub dynamo connection terminal is securely connected before using the hub dynamo.
- Compatible bulbs

Model No.	Front lamp	Taillamp
DH-3N70	6 V/2.4 W	6 V/0.6 W
	6 V/3.0 W	————
DH-2N70	6 V/2.4 W	————

- If the bulb of either the front lamp or taillamp blows, excessive voltage will be applied to the remaining lamp and shorten the operating life of the bulb, so any blown bulbs should be replaced as soon as possible.
- Lamps with electrical circuits such as automatic lamps may become damaged if the bicycle is ridden at high speeds.
- If the lamp is frequently turned on when riding at high speed ranges, it will shorten the operating life of the bulbs.
- Do not disassemble the internal hub mechanism.
- Do not apply any lubricant to the inside of the hub, otherwise the grease will come out and it may cause problems with conductivity.
- The hub dynamo will cause the turning of the wheel to become slightly heavier because of the magnet inside the hub.
- Parts are not guaranteed against natural wear or deterioration resulting from normal use.

CE SI-20D0A

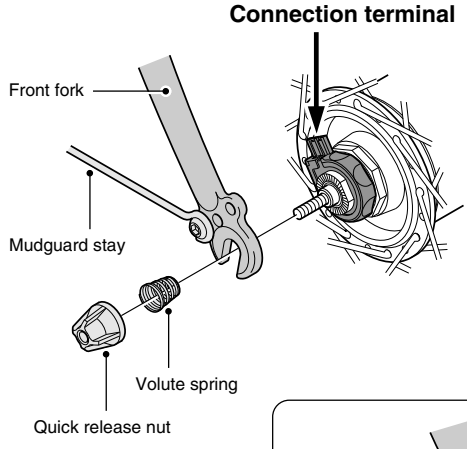
DH-3N70
DH-2N70

Hub Dynamo

Technical Service Instructions

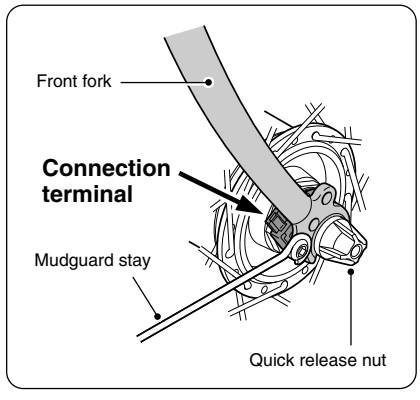
Installation of the front wheel

Install the wheel so that the side with the hub dynamo connection terminal is on the right side when looking toward the front of the bicycle, and so that the hub connection terminal is aligned with the front fork or with the basket stay.
Then install by following the procedure shown in the illustration below so that the connection terminal is facing upward. Do not force the connection terminal to turn after the quick release lever has been secured.



Note:
- The toothed axle washer is not necessary for a quick release type.

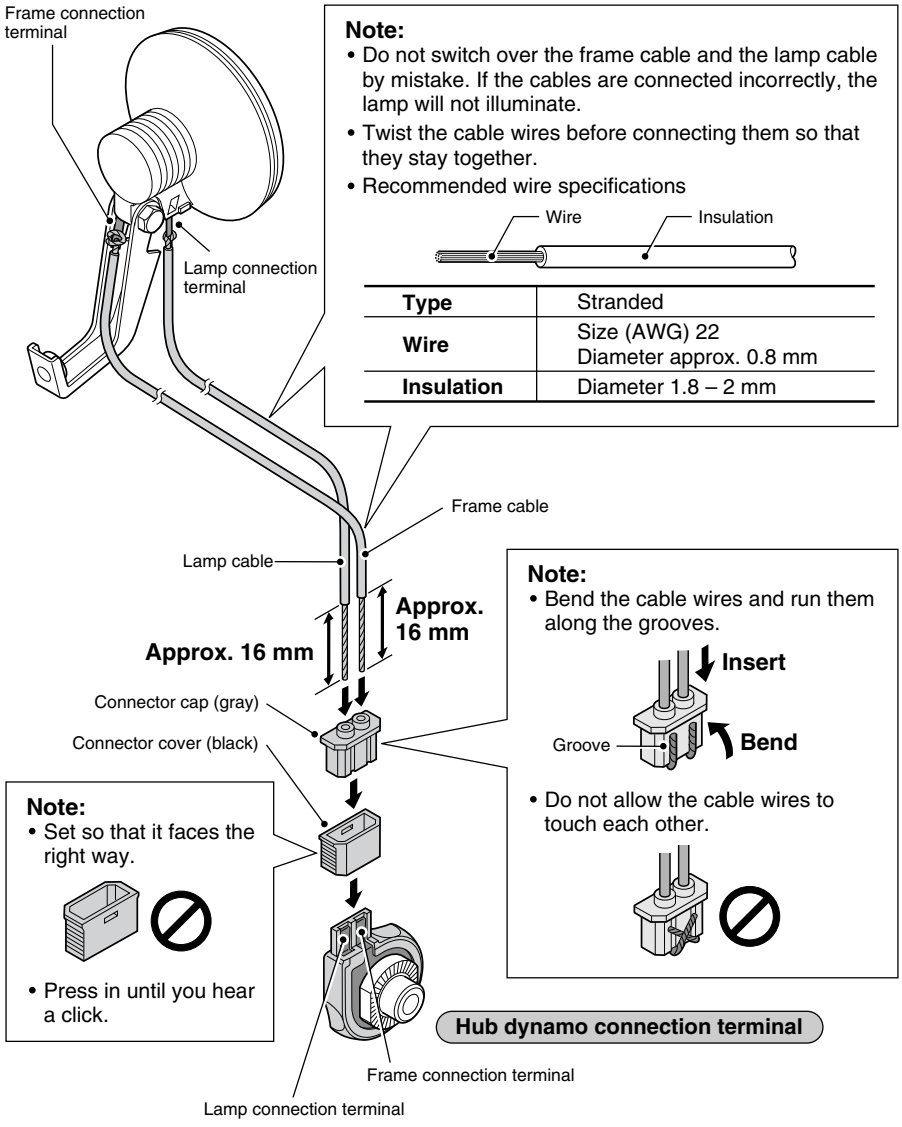
- Connect the two wires to ensure that the current flows smoothly.



Connection of the cables

Connect the cables as shown in the illustration below.

Note:
Scrape away the paint from the lamp's frame connection terminal and the lamp connection terminal when connecting the cables.



Note:
- Do not switch over the frame cable and the lamp cable by mistake. If the cables are connected incorrectly, the lamp will not illuminate.
- Twist the cable wires before connecting them so that they stay together.
- Recommended wire specifications

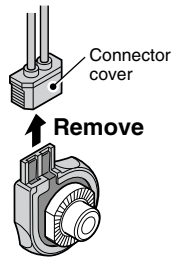
Type	Stranded
Wire	Size (AWG) 22 Diameter approx. 0.8 mm
Insulation	Diameter 1.8 – 2 mm

Note:
- Bend the cable wires and run them along the grooves.
- Do not allow the cable wires to touch each other.

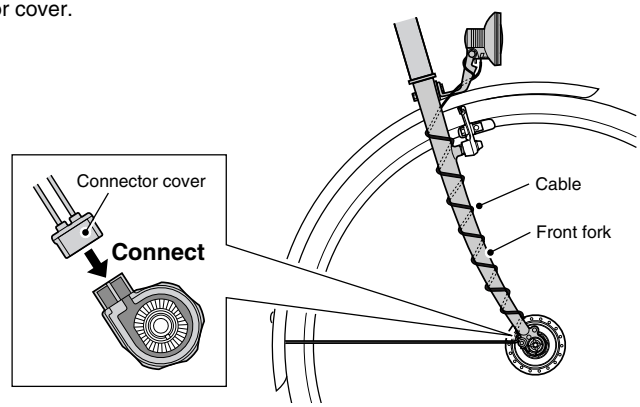
Note:
- Set so that it faces the right way.
- Press in until you hear a click.

Note:

- Secure the cable to the front fork or the basket stay so that it will not get caught in the spokes or any other parts while riding. If the position of the hub dynamo may change with respect to the lamp while riding, for example when using a suspension fork, make sure that the cable is connected so that it will not be too loose or too tight at any point within the range of movement.
- Connect so that the current from the hub dynamo flows through the cable from the lamp connection terminal of the hub dynamo to the frame connection terminal.
- To disconnect the lamp from the hub dynamo, remove the connector cover.

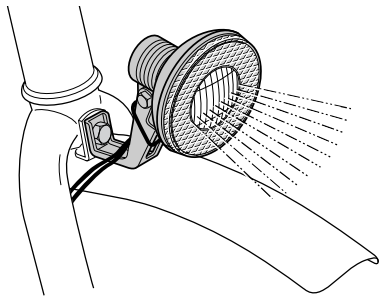


- Do not ride the bicycle while the connector cover is removed, otherwise the cable might get caught in the bicycle wheel.
- When removing the bicycle wheel, first remove the connector cover. If the cables are pulled strongly, it may break the cable wires or cause poor contacts. Furthermore, when installing the wheel, first secure the wheel to the front forks and then connect the connector cover.



Checking the lamp illumination

Rotate the front wheel and check that the lamp illuminates.



These service instructions explain how to use and maintain the Shimano bicycle parts which have been used on your new bicycle. For any questions regarding your bicycle or other matters which are not related to Shimano parts, please contact the place of purchase or the bicycle manufacturer.

Please note: Specifications are subject to change for improvement without notice. (English)

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