RD-M580

Rear derailleur

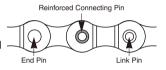
General Safety Information

A WARNING

- Use neutral detergent to clean the chain. Do not use alkali-based or acid based detergent such as rust cleaners as it may result in damage and/or failure of the
- Use the reinforced connecting pin only for connecting the narrow type of chain.
- There are two different types of reinforced connecting pins available. Be sure to check the table below before selecting which pin to use. If connecting pins other than reinforced connecting pins are used, or if a reinforced connecting pin or tool which is not suitable for the type of chain is used, sufficient connection force may not be obtained, which could cause the chain to break or fall off.

Chain	Reinforced connecting pin	Chain tool
9-speed super narrow chain such as CN-7701 / CN-HG93	Silver	TL-CN31/TL-CN22
8-/7-/6-speed narrow chain such as CN-HG50 / CN-IG51	Black	TL-CN31/TL-CN22 and TL-CN30/TL-CN21

• If it is necessary to adjust the length of the chain due to a change in the number of sprocket teeth. make the cut at some other place than the place where the chain has been joined using a reinforced connecting pin or an end pin. The chain will be damaged if it is cut at a place where it has been ioined with a reinforced connecting pin or an end pin.



- Check that the tension of the chain is correct and that the chain is not damaged. If the tension is too weak or the chain is damaged, the chain should be replaced. If this is not done, the chain may break and cause serious injury.
- Obtain and read the service instructions carefully prior to installing the parts. Loose, worn, or damaged parts may cause injury to the rider. We strongly recommend only using genuine Shimano replacement parts.
- Read these Technical Service Instructions carefully, and keep them in a safe place for later reference.

Note

- If gear shifting operations do not feel smooth, wash the derailleur and lubricate all moving parts.
- If the amount of looseness in the links is so great that adjustment is not possible, you should replace the derailleur.
- You should periodically clean the derailleur and lubricate all moving parts (mechanism and pulleys).
- If gear shifting adjustment cannot be carried out, check the degree of parallelism at the rear end of the bicycle. Also check if the cable is lubricated and if the outer casing is too long or too short.
- If you hear abnormal noise as a result of looseness in a pulley, you should replace the pulley.
- If the chain keeps coming off the sprockets during use, replace the sprockets and
- Adjust the RD-M580 reverse spring type rear derailleur from the low side.
- Use a frame with internal cable routing is strongly discouraged as it has tendencies to impair the SIS shifting function due to its high cable resistance.
- · Always be sure to use the sprocket set bearing the same group marks. Never use in combination with a sprocket bearing a different group mark.
- · Use an outer casing which still has some length to spare even when the handlebars are turned all the way to both sides. Furthermore, check that the shifting lever does not touch the bicycle frame when the handlebars are turned all the way.
- · Make sure that the gear shifting cable and the brake cable do not obstruct each other during braking operations. If they do obstruct, it may interfere with braking.
- Install the cables so that they still have some slack in them even when the handlebars are turned fully in either direction.
- · A special grease is used for the gear shifting cable (SIS-SP41). Do not use DURA-ACE grease or other types of grease, otherwise they may cause deterioration in gear shifting performance.
- · Grease the inner cable and the inside of the outer casing before use to ensure that they slide properly.

- For smooth operation, use the specified outer casing and the bottom bracket cable
- Operation of the levers related to gear shifting should be made only when the front chainwheel is turning.
- Parts are not guaranteed against natural wear or deterioration resulting from normal use.
- For maximum performance we highly recommend Shimano lubricants and maintenance products
- For any questions regarding methods of installation, adjustment, maintenance or operation, please contact a professional bicycle dealer.

In order to realize the best performance, we recommend that the following combination be used.

•	
Series	LX
DUAL CONTROL lever	ST-M580 / ST-M585
Outer casing	SIS-SP41
Rear derailleur	RD-M580
Туре	SGS / GS
Freehub	FH-M580 / FH-M585
Gears	9
Cassette sprocket	CS-M580
Chain	CN-HG73
Bottom bracket guide	SM-SP17 / SM-BT17
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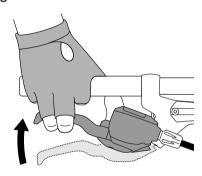
ı	Specifications

Model number	RD-M580	
Туре	SGS	GS
Gears	9	
Total capacity	45T	33T
Largest sprocket	34T	34T
Smallest sprocket	11T	11T
Front chainwheel tooth difference	22T	22T

These Service Instructions describe the operation method when using the ST-M580 / M585 DUAL CONTROL lever in combination with the RD-M580 reverse spring-type rear derailleur. If using in combination with a top normal-type derailleur, the operations and indicator displays will be reversed.

Operating the levers

■ Operating the brake lever

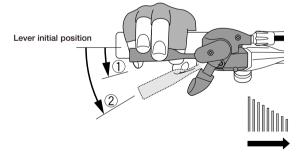


■ Gear shifting operation

The lever always returns to the initial position when it is released after shifting. When operating the lever, always be sure to turn the crank arm at the same time.

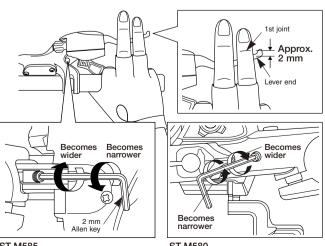
To shift from a large sprocket to a smaller sprocket

To shift one step only, press lever to the (1) position. To shift two steps at one time, press to the (2) position. A maximum two-step shift can be made in this manner.

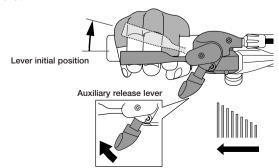


Adjusting the grip width

It is recommended that you adjust the grip widths of the levers to the most comfortable widths for gear shifting and braking.



To shift from a small sprocket to a larger sprocket Press lever once to shift one step from a smaller to a larger sprocket.



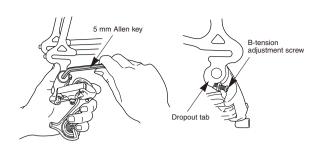
ST-M585

ST-M580

Installation of the rear derailleur

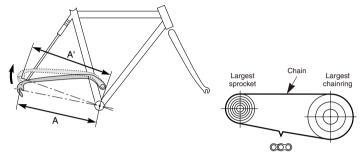
When installing, be careful not to let the B-tension adjustment screw come into contact with the dropout tab, otherwise deformation may result. Do not remove the Pro-Set alignment block at this time.

Bracket spindle Tightening torque : 8 - 10 N⋅m {70 - 86 in. lbs.}



Chain length on bicycles with rear suspension

The length of A will vary depending on the movement of the rear suspension. Because of this, an excessive load may be placed on the drive system if the chain length is too short. Set the length of the chain by adding two links to the chain when the rear suspension is at a position where dimension "A" is longest and the chain is on the largest sprocket and the largest chainring. If the amount of movement of the rear suspension is large, the slack in the chain may not be taken up properly when the chain is on the smallest chainring and smallest sprocket.



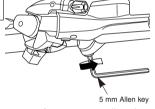
Add 2 links (with the chain on both the largest sprocket and the largest chainring)

Installation of the lever

Use a handlebar grip with a maximum outer diameter of 32 mm.

Tightening torque : 6 - 8 N⋅m {53 - 69 in. lbs.}

In the case of carbon handlebars, it may be necessary to lower the tightening torque in order to prevent damage to the handlebar.



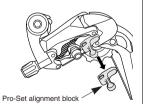
Please consult the bicycle or handlebar manufacturer regarding the appropriate level of tightening torque for carbon handlebars.

SIS Adjustment

Installation of the chain

Install the chain with the Pro-Set alignment block still attached. After installing, remove the Pro-Set alignment block.

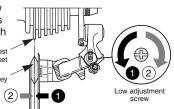
Turn the crank arm to set the derailleur to the low position.



1. Low adjustment

Turn the low adjustment screw so that the guide pulley moves to a position directly in line with the largest sprocket.

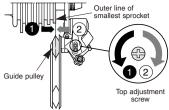
Largest sprocket
Guide pulley



2. Top adjustment

Turn the crank arm while pulling the derailleur with your hand to move the derailleur to the top position, and then turn the top adjustment screw to adjust so that the guide pulley is in line with the outer line of the smallest sprocket when looking from the rear.

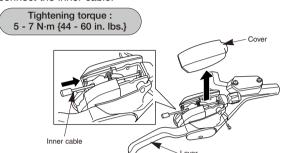
Turn the crank arm to set the



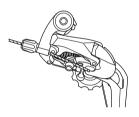
derailleur to the low position.

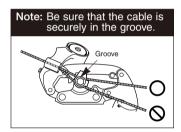
3. Connecting and securing the inner cable

Operate lever eight times or more, and check on the indicator that the lever is at the lowest position. Then remove the cover and connect the inner cable.

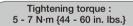


Connect the inner cable to the derailleur as shown in the illustration.

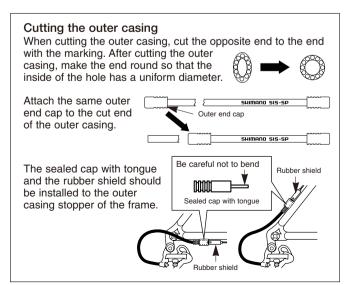




Connect the cable to the rear derailleur and, after taking up the initial slack in the cable, re-secure to the rear derailleur as shown in the illustration.



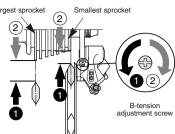




4. How to use the B-tension adjustment screw

Mount the chain on the smallest chainring and the largest sprocket, and turn the crank arm backward. Then turn the

sprocket, and turn the crank
B-tension adjustment
screw to adjust the guide
pulley as close to the
sprocket as possible but not
so close that it touches.
Next, set the chain to the
smallest sprocket and
repeat the above to make
sure that the pulley does
not touch the sprocket.



5. SIS Adjustment

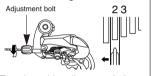
Push lever while turning the crank arm to move the derailleur to the largest sprocket. Then operate lever once to move the derailleur to the 2nd-gear sprocket. After this, operate lever just as far as the extent of play, and then turn the crank arm.





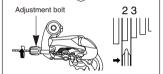






Turn the cable adjustment bolt clockwise to tighten it until the chain returns to the 2nd sprocket.

* Turn the adjustment bolt together with the outer casing adjustment barrel cover.



Turn the cable adjustment bolt counterclockwise to loosen it until the chain touches a sprocket and generates noise.

 * Turn the adjustment bolt together with the outer casing adjustment barrel cover.

Best setting

The best setting is when the cable adjustment bolt is tightened (turned clockwise) until noise occurs without lever being operated, and then loosened (turned counterclockwise) 90 - 180 degrees from that point.

Operate lever to change gears, and check that no noise occurs in any of the gear positions.

For the best SIS performance, periodically lubricate all power-transmission parts.

This service instruction explains 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.

SHIMANO

SHIMANO AMERICAN CORPORATION

One Holland, Irvine, California 92618, U.S.A. Phone: +1-949-951-5003

SHIMANO EUROPE HOLDING B.V.

Industrieweg 24, 8071 CT Nunspeet, The Netherlands Phone: +31-341-272222

SHIMANO INC.

3-77 Oimatsu-cho, Sakai, Osaka 590-8577, Japan

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