



GARAGE DOOR



OWNER'S MANUAL

Warning: Read all instructions and warnings before use.

Failure to follow all instructions may result in serious personal injury or product damage.

Save these instructions for future use.

Contents

OWNER'S MANUAL GARAGE DOOR WITH TORSION SPRING

GARAGE DOOR WITH TORSION SPRING

- P2 THINGS TO KNOW BEFORE YOU BEGIN
- P3 DRAWINGS
SPARE PARTS LIST
- P5 TOOLS
- P7 STEP 1
- P8 STEP 2
- P9 STEP 3
- P10 STEP 4
- P11 STEP 5
- P13 STEP 6
- P14 STEP 7
- P16 STEP 8
- P17 STEP 9
- P18 STEP 10

GARAGE DOOR

OWNER'S MANUAL GARAGE DOOR WITH TORSION SPRING



Things to know before you begin

*Keep in mind, when planning the installation, that the garage will be open and unsecured when assembling the new door.

*If the garage door is the only opening in the structure, make sure everything you need is inside. You will have no way of leaving the garage until the track is assembled and installed. This should take about 5 hours.

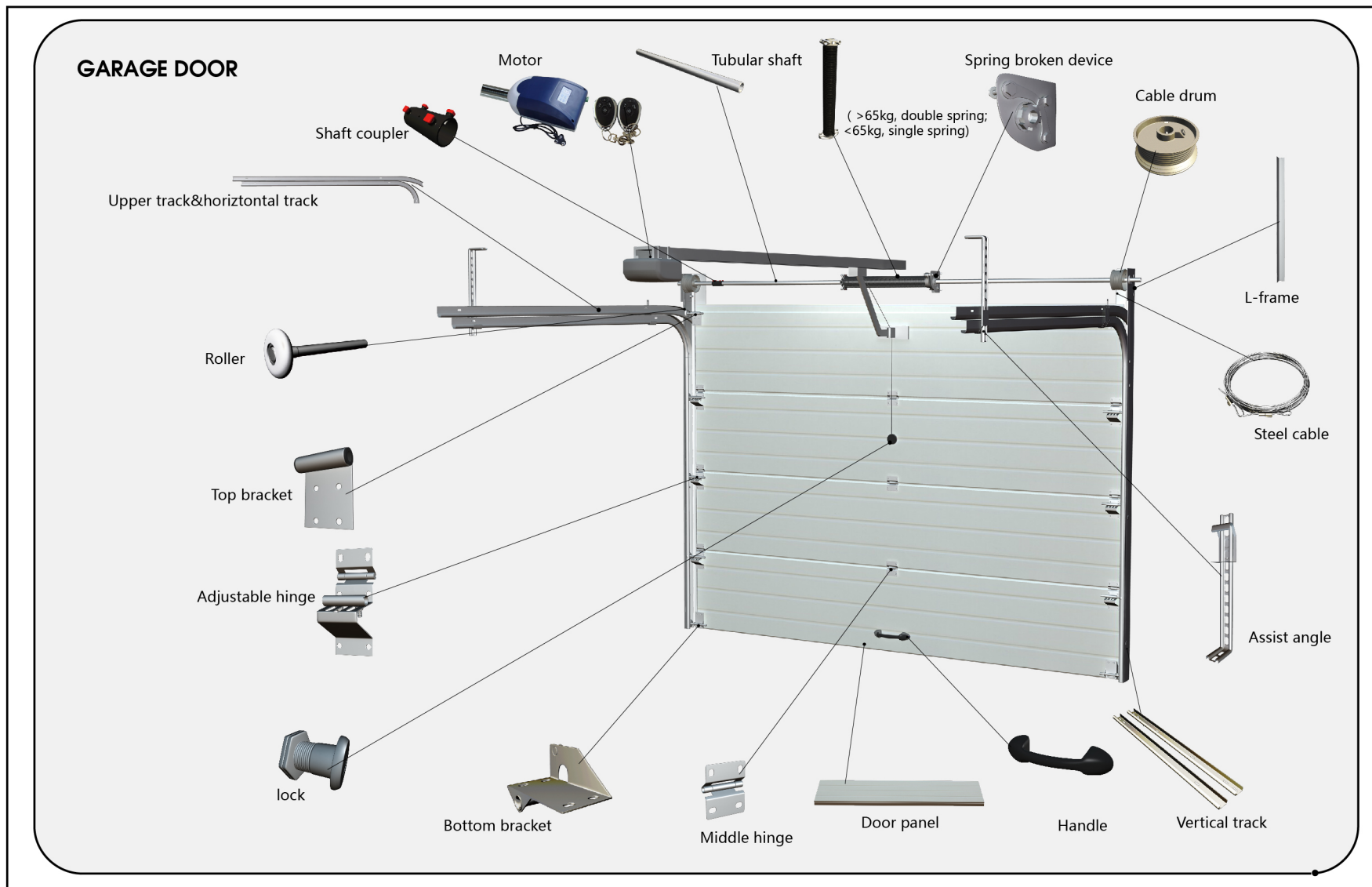
*You may need help to lift the door: without the springs, it weighs between 66 - 220 lbs (30 - 100 kg).

*Make sure you have the necessary tools and good mechanical skills or reasonable experience.

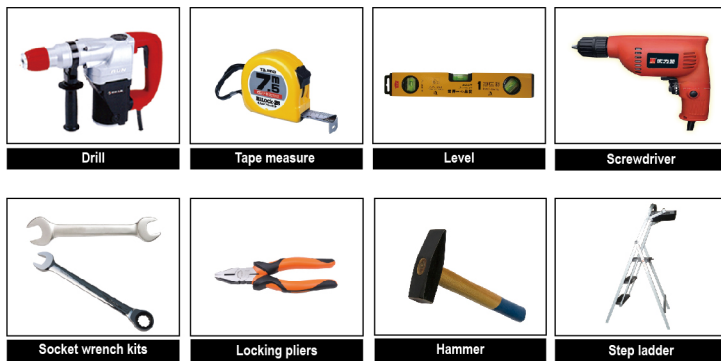
*Make sure your walls are properly aligned and the plaster and bricks are solid enough to withstand a concrete bit at the time of drilling the necessary holes to fit tracks and brackets. The manufacturer will not be held responsible for any defective or inadequate construction.

GARAGE DOOR

Drawing

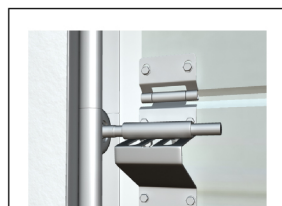


Required Tools

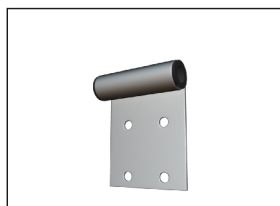


Additional tools required (if necessary):
Hacksaw, Saw horse, T-square

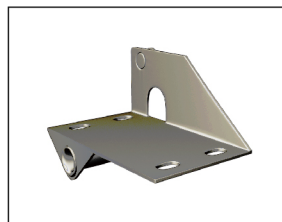
Spare Parts List



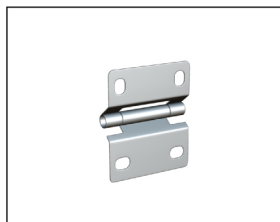
Adjustable hinge



Top bracket

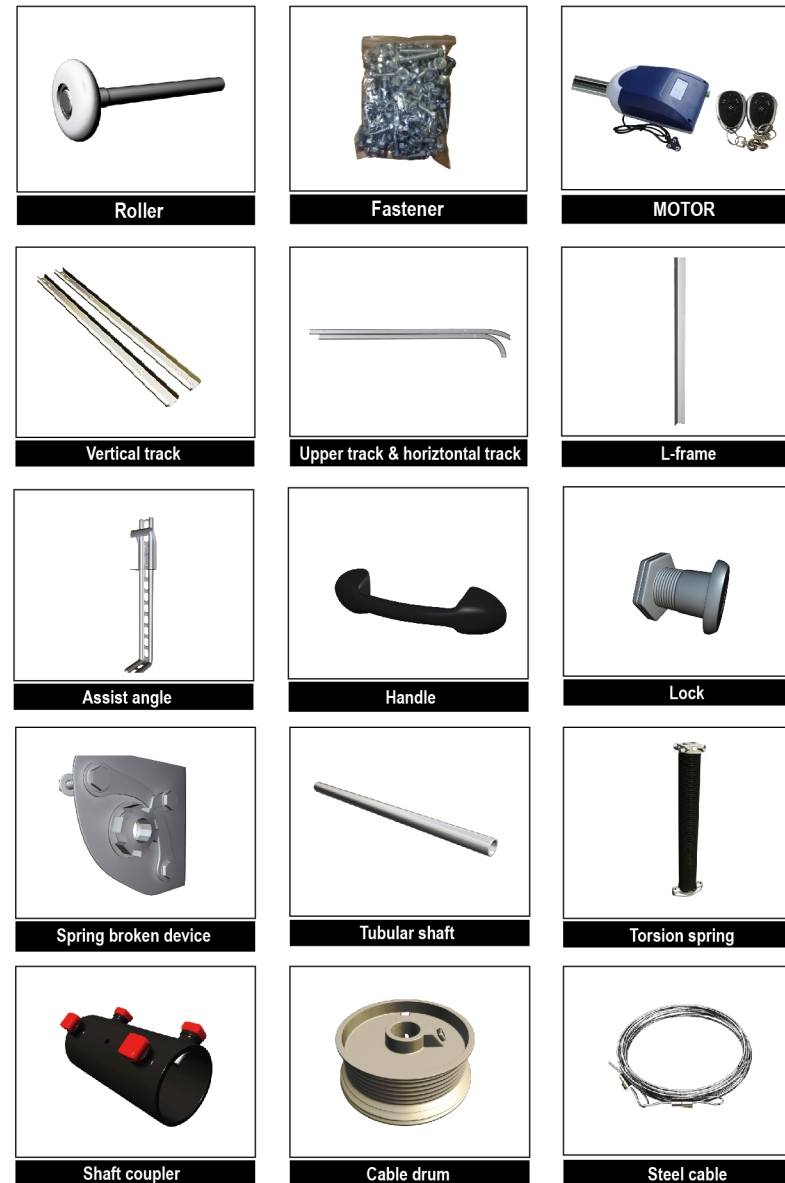


Bottom bracket



Middle hinge

GARAGE DOOR



GARAGE DOOR

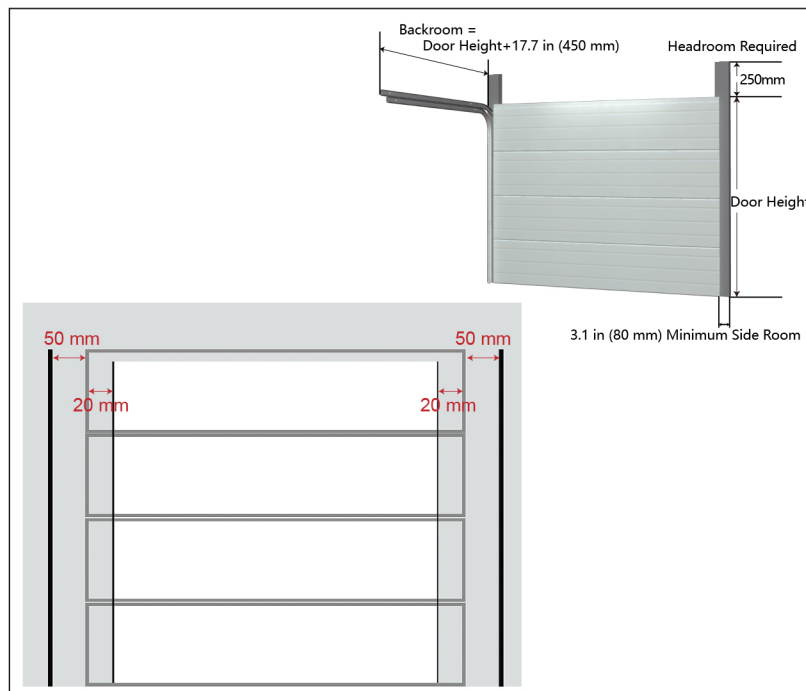
ASSEMBLY INSTRUCTIONS

STEP 1 PREPARE THE OPENING SPACE

Preparing the opening space, check headroom, backroom and sideroom needed.

Headroom is the space needed above the top of the door for the door, the overhead tracks, and the springs. Measure to check that there are no obstructions in your garage within that space. The normal headroom space requirement as shown is 200mm. The backroom distance is measured from the backside of the door into garage, and should be at least 9.8" (250mm) more than the height of the garage door. The minimum sideroom is 3.1" (80 mm) to allow for the track assembly.

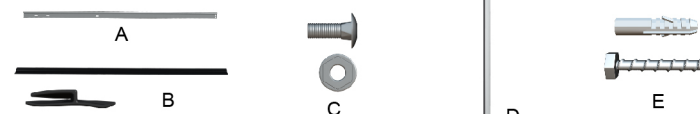
- (a) First use level to measure the flatness of the floor; if uneven, it will need to be adjusted to ensure that both sides of the track are the same height;
- (b) Measure the panel size, measure the opening sizes. Usually, the panel size = openings size + 40 mm;
- (c) Follow the door width + 50 mm to mark track installation lines on both sides of the wall; mark sure that the plumb pencil line is perpendicular to the lintel.



GARAGE DOOR

STEP 2 ASSEMBLE THE VERTICAL TRACKS

PARTS REQUIRED FOR THIS STEP:



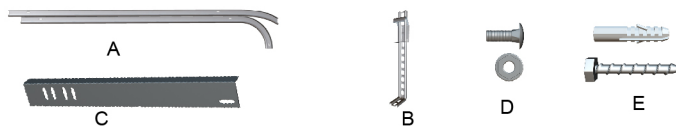
- (a). Using drill to drill holes in the wall, Use the expansion screw to fix the L-frame
- (b). Assemble the vertical track to the L-frame. (the bottom of the vertical track from the wall is 35mm, the top of the vertical track from the wall is 60mm) .
- (c). Fix the side seal with L-frame
- (d). Fix the top steel sheet by screw, and insert the top seal



GARAGE DOOR

STEP 3 ASSEMBLE THE HORIZONTAL TRACKS

PARTS REQUIRED FOR THIS STEP:

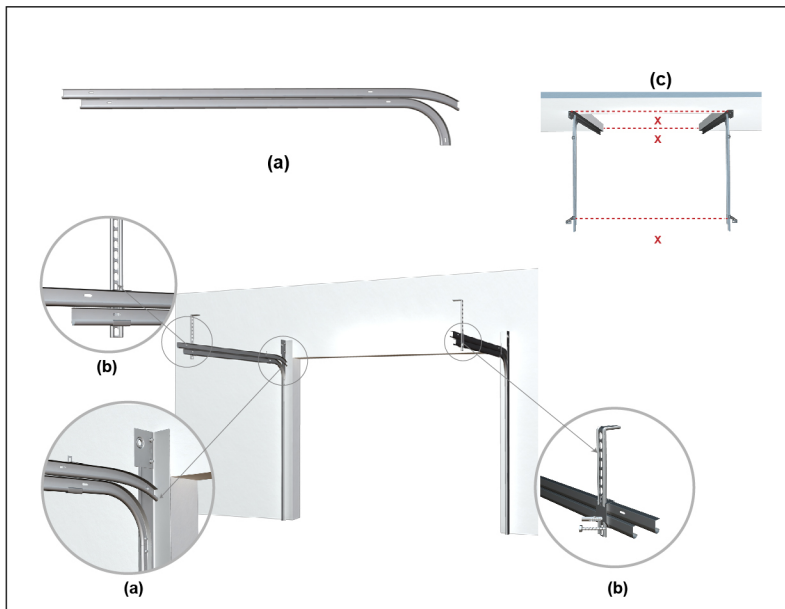


Step 3:

- Assemble the bottom of horizontal track and upper track to L-frame, and connect to the vertical track.
- According to the site, use the assist angle and hook hang the horizontal track and upper track to the ceiling or side wall; (Use a rope or steel wire as temporary support of the back of the horizontal track, attaching it to a overhead structure will help you a lot);
- Measure the distance between the horizontal track. Make sure distance is consistent throughout;

Notes:

Do not tighten the screws completely, loosen up a bit to adjust at each step. Tighten all screws firmly at the end of this step. The left and right track mounting should be perpendicular to the ground, and the diagonal control is within 3mm.



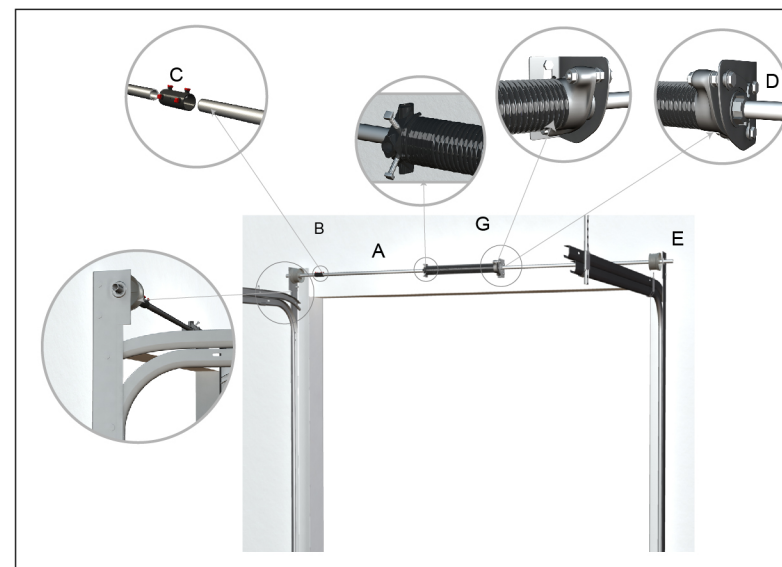
GARAGE DOOR

STEP 4 ASSEMBLE THE TORSION SPRING SYSTEM

PARTS REQUIRED FOR THIS STEP:



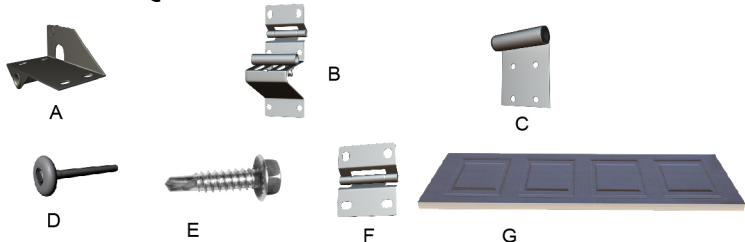
- Splice the tubular shaft, the shaft coupler, the torsion spring, etc, from left to right, respectively, is:
left cable drum, shaft coupler, torsion spring, spring broken device, right cable drum. Fixed shaft (double spring should be left cable drum, torsion spring, left spring broken device, shaft coupler, right spring broken device, right cable drum)coupler with M10 Socket wrench kits to connect the shafts. Please Notice that the outlet direction of the torsion spring should face to the wall
 - Put tubular shaft into the bearing on side brackets, and keep the balance;
 - Fix the torsion spring on the spring broken device with M8*45 screw nut. (as drawing)
 - Fix spring broken device on the wall with M8*55 expansion screws (as drawing);
- Pay attention to keep middle bracket to the side, the torsion spring (running) need space;



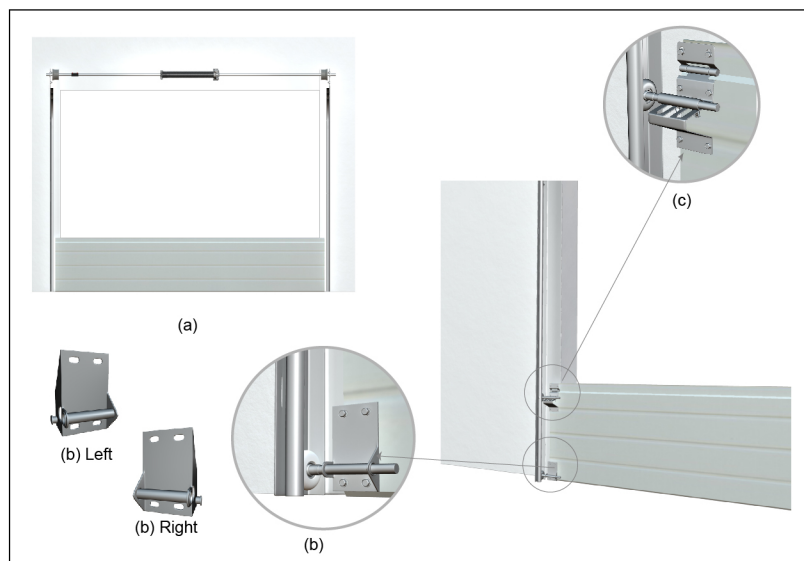
GARAGE DOOR

STEP 5 INSTALL DOOR PANEL

PARTS REQUIRED FOR THIS STEP:



- Take the panel with seal; this is your bottom panel. Put it in the middle of the opening;
- Place the roller into the bottom bracket, and insert the roller end into the vertical track. Install the bottom bracket at the bottom of panel with the screws. Please note that the bottom bracket should be distinguished left or right;
- Place the roller into adjustable hinge, and install the hinge on the top of panel as drawing C. The bottom part should be screwed on the bottom panel, the top part of the hinge will be screwed on the next panel;
- Place objects as supports at the bottom of the door panels, lift up the door about 2CM.



GARAGE DOOR

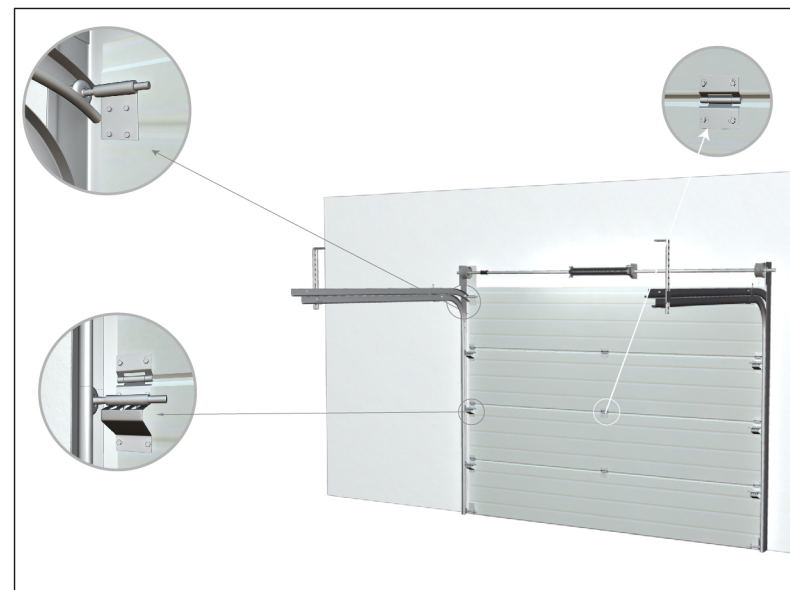
- Stack the second panel on top of bottom panel, and align both sides to the previous panel. Fix the top part of adjustable hinge on 2nd panel, place the roller into adjustable hinge, insert roller end into vertical track, and then install the adjustable hinge on the panel with screws.

The bottom part should be screwed on the 2nd panel, the top part of the hinge will be screwed on the next panel.

- Stack the third panel, steps copy (e)

- Stack the fourth panel, and align both sides to the previous ones.

Fix the top part of adjustable hinge on the 4th panel. Place the roller into top hinge. insert roller end into track; then install top bracket on the upper end of the door.



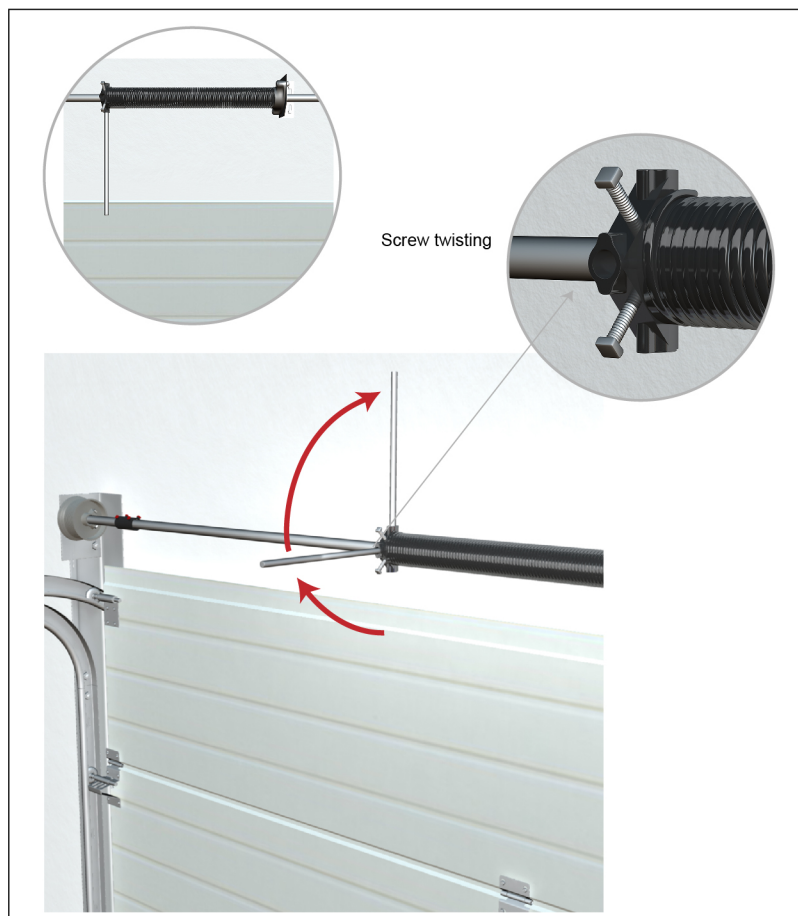
Notes

- You need to adjust the level of the door, the gap between the door and the vertical track should be within 15mm~20mm;
- The connection between bottom panel and top panel is adjustable hinge.
- You need to install the top bracket at the top panel, and the middle of garage door panel is connected with the middle hinge;

GARAGE DOOR

STEP 6 TIGHTEN THE TORSION SPRING

Tighten the torsion spring, by turning the winding cone toward the ceiling;
For each 1 meter of door height you need to tight 3 turns. Each hole on the winding cone is one quarter of a turn. You may mark a line to count the number of turns while winding spring;
After tightening, make the bars brace to the door panel, use any cardboard to protect the panel temporarily. Tighten the screws on spring with M10 Socket wrench kits, make sure that the torsion spring is fixed to the Tubular shaft.



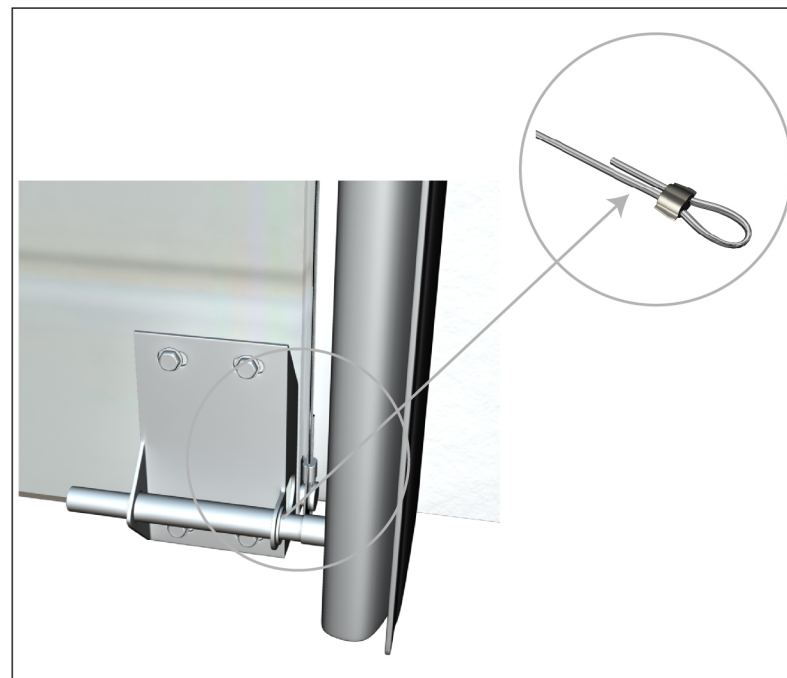
GARAGE DOOR

STEP 7 FIX THE STEEL CABLES

PARTS REQUIRED FOR THIS STEP:



(a) Hang the steel cable on the bottom bracket, and then pull behind the side hinges up to the cable drum. The length of the steel cable on each side should be the same. Fix the steel cable on the cable drum.



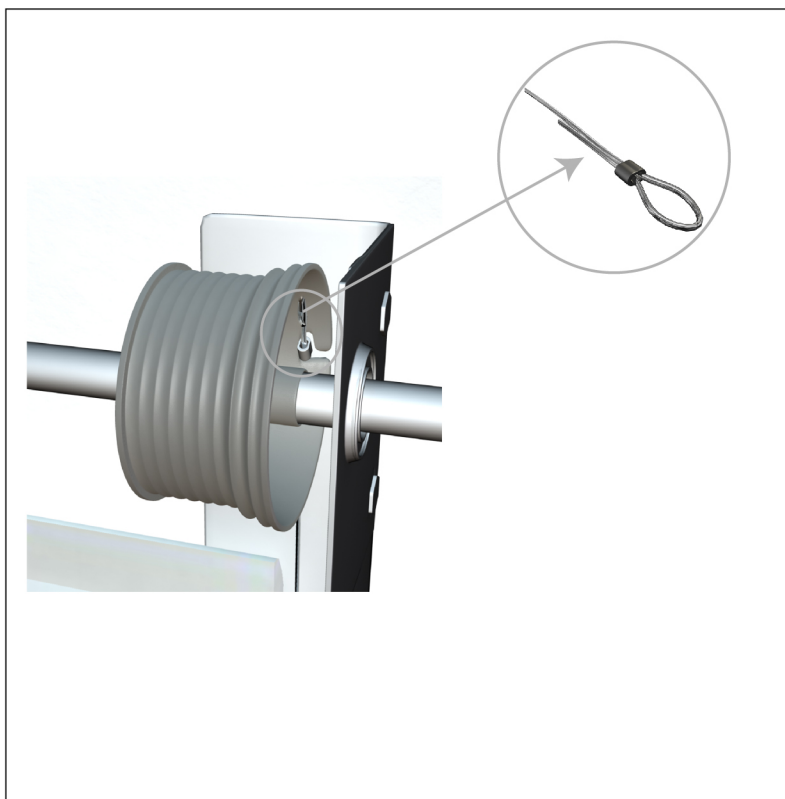
GARAGE DOOR

STEP 7

(b) Turn the cable drum round and keep the cables tight. (about 1.5 turns). Fix the cable drum on the tubular shaft with M10 socket wrench kit Remove the bars, release the torsion spring. Then lift the door and check the cables tension. Make sure the cables are tight when door is lifted. If not, adjust the spring.

Warning

Be very cautious from this step onward, the torsion spring being under tension is very dangerous.



GARAGE DOOR

STEP 8

PARTS REQUIRED FOR THIS STEP:



A



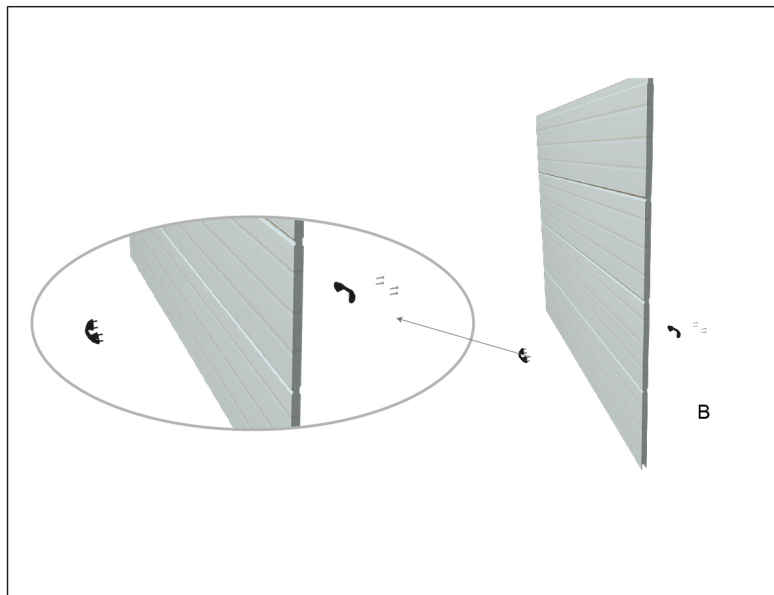
B



C

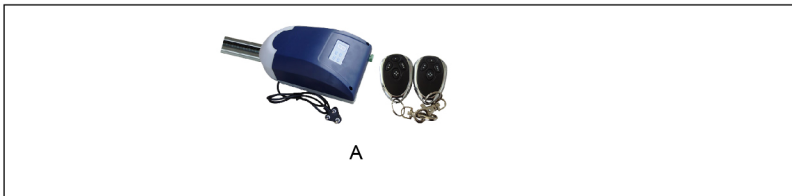
Install the handle;

Drill holes in center of bottom panel, install the handles on the panel.



GARAGE DOOR

STEP 9 INSTALL OPERATOR



Refer to the manual book for operator.

Install the emergency lock:

Drill holes in center of middle panel (e.g. 3rd panel), install the emergency lock on the panel.

Joint the cable line of emergency lock to the emergency handle of operator.



GARAGE DOOR

STEP 10 CONGRATULATIONS

Now that you have completed the door assembly, you can tear off the protective plastic films.
Congratulations!

GARAGE DOOR