

Tubular motor products, installation instruction

1. Warning :

For your and others safety, please comply with the instructions.

Please keep this manual in a safe place.

This manual includes important safety precautions; the wrong installation may cause very dangerous consequences.

Our S, M, R, C type motors are the driving force of device for shutter, screens, doors and awnings. Our rated operating time is 4 mins. The appliance can not be restarted until temperature of motor reach to ambient.

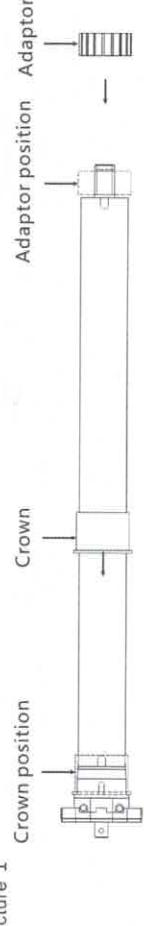
Please choose the right ones according with Nominal Torque and Max Running time of the motor.

Before installing the drive, remove any unnecessary cords and disable any equipment not needed powered operation.

Any mechanical devices that not for running are prohibited for using.

4. Installation

- 1). Firstly, ensure the two ends bracket have been installed flatly, firmly.
- 2). put the crown ring and adaptor in the motor, decrypted as below picture1.



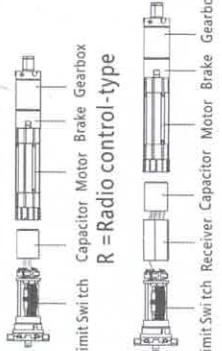
Picture 1

Our S, M, R, C type motors are all controlled by Mechanical Limit, M series with a manual device, R series with built-in (external) receiver, C series with a clutch device. When the motor receive the signal it reach to the location as be programmed , then the mechanical limit switch is triggered and motor will stopped automatically.

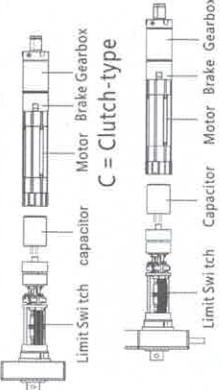
2. Product Description

3. Structural Analysis and Model Interpretations

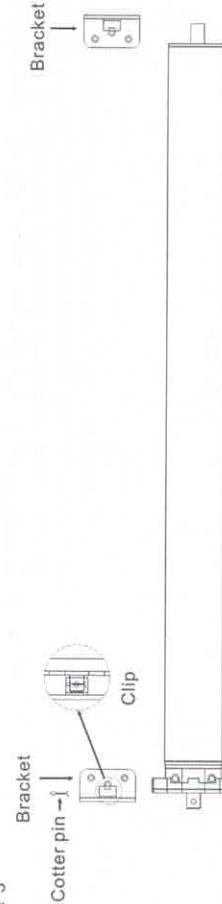
S = Standard type



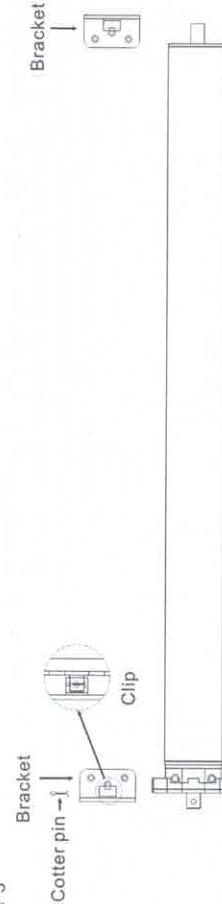
M = Manual type



Picture 3



- 3).Insert the motor with the crown ring and adaptor into the aluminum tube ,ensure the crown ring and adaptor fitting the tube perfectly, expressed as picture 2(When the tube is round, the adaptor must be settled with the tube by the screw. Checking the correct position before screwing, no damaging the motor's out steel tube.
- 4).Install the aluminum tube with the tube and accessories on the brackets,check the whether they are flatly,then fasten with the clip,expressed as picture 3.



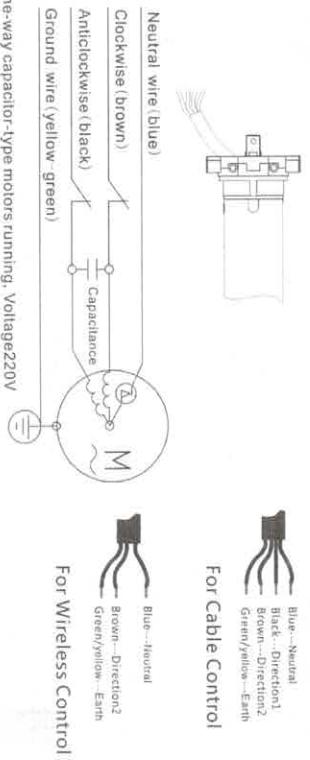
Notes:

- 1).For installation for awnings, a horizontal distance of at least 0,4m is to be maintained between the fully unrolled driven part and any permanent object.
- 2).If the motor is used for driving awnings. Do not operate the awning when maintenance, such as window cleaning, is being carried out in the vicinity.
- 3).If the motor is used for shutter. During the operating, people need to watch the moving shutter and keep person away until the shutter is completely closed.
- 4).If a manual release is provided, the actuating member is to be installed at a height less than 1,8m.
- 5).How to use the manual release.
 - a).When install, fix the connector of the hand crank tie-in with forelock on the transmission shaft
 - b).when the power off or no current, hook up the hand crank on hand crank tie-in
 - c).clasp the hand grip and rotate, then the motor can start running with loaded article.

Model Interpretation

Isolation Class	Rated Current	Tube diameter (mm)	Protection Class	Running Time	Input Power	Rated Voltage	Nominal Torque	Output Speed(rpm)	Rated Frequency
XX	45	M - 40 / 15							XK5B-40/15
S									
R									
M									
C									

5.Wire Connection



7.Notes

The power supply cable should not be exposed to sunlight or rain directly during installation.
 Frequently examine the installation for imbalance and signs of wear or damage to cables and springs. Do not use if repair or adjustment is necessary.
 Moving parts of the drive must be installed higher than 2.5 m above the floor or other level that could provide access to it.

Fixed controls have to be installed visibly
 Persons (including children) with reduced physical, sensory or mental capabilities, or lack experience and knowledge are not allowed to use this product.

8.Trouble Analysis

No.	Trouble	Cause of reason	Solution
1	Tubular motor can not run or start too slowly and with big noise.	A. The voltage is too low B. Overload C. Incorrect wire connection D. Wrong installation	A. Adjust to nominal voltage B. Adjust to max load torque C. Check wire connection and correct D. Re-installed the motor
2	The motor stopping running during working	A. Over the max working time --4mins B. Limit is not set as the designated position	A. Cool the motor for 15mins B. Adjust the limit switch to the designated position
3	The shutter or awning running with noisy	The out tube is too long, the shutter will be tight with both side bracket	Save a little bit of out tube off/keep a distance between shutter and bracket
4	After connecting with power, only one direction can work, the other direction can not work	The other direction's switch is closed	Turn the crown ring on the direction opposite of the current working direction

6.Limit adjustment

Tubular motor with a limit switch, when the shutter or awning reach to the designated position, it will be switched off automatically.

Adjust the limit, just drive two adjustment screws on the limit switch that control the "Up"(stop at the top) and "down"(stopped at the low-end). According to motor is installed on the left(pic.1) or right side(pic.2), as well as shutter is installed in side or outside to determine how to adjust screws.

6.1)"Up" adjustment

- 1) Run the motor "up" direction (remote control button).
- 2) Wait until the motor stops (limit switch triggered automatically).
- 3) Comply with Tube running direction and using the adjust piolet to adjust at "+,-" direction until reach the position you need (After adjusting, the motor will stop in the new position).

6.2)"Down" adjustment

- 1) Run the motor "down" direction (remote control button).
- 2) Wait until the motor stops (limit switch triggered automatically).
- 3) Comply with Tube running direction and using the adjust piolet to adjust at "+,-" direction until reach the position you need (After adjusting, the motor will stop in the new position).

