

Assembly instructions

Rév.1008 ENG

8500 SF 24V belt driven Garage door opener



UK HELP-LINE:
0845 136 2012

Mo-Fri: 0900-1900
Sat: 0900-1700
Sun:1000-1600



**Max traction
force: 70 kg
max. 8 m²**



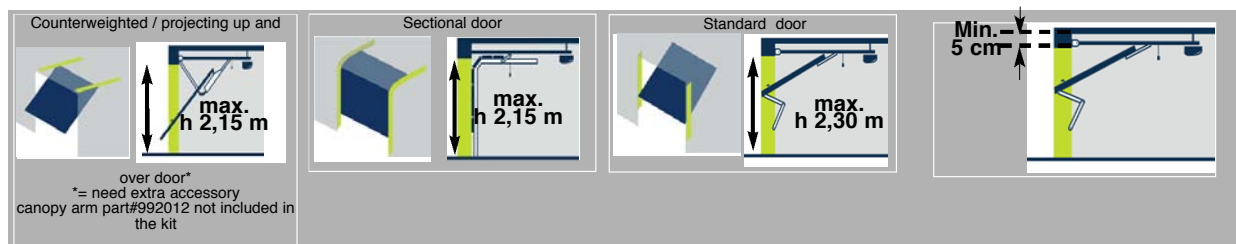
**Power;
230 V/ 50 Hz**



**Gear
8-24 V dc**



**Opening time
11-18 sec.**



WARNING:

Only to be installed on well balanced doors.

WARNING:

Carefully read this mounting instruction before installation.

In case you should require further informations, contact the manufacturer :

Allducks or UK Assistance & after sale service on
UK HELP-LINE: 08451362012

Allducks srl

via Alessandro Volta, 1
20060 Ornago (MI) Italy
Ph. +39/039/6010654
Fax +39/039/6011243
service@allducks.it
www.allducks.it

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Very Important Safety WARNINGS



This garage door opener has been designed and tested to offer safe service provided it is installed, operated, maintained and tested in strict accordance with the instructions and warnings contained in this manual.

Please, carefully read this instruction manual before to proceed with installation of your garage door opener, and make sure that weight, dimension and type of your garage door are within the limits of your garage door opener model.

The structure of the door and the wall/pillars must be safe and stable.

Install garage door opener only on properly balanced and lubricated garage door.

All repairs to cables, spring assemblies and other hardware must be made by a trained and professional door systems technician BEFORE installing the garage opener

To prevent possible serious injury or death: always call a trained and certified door systems technician if garage door binds, sticks or is out of balance.

An unbalanced garage door may not reverse when required and could result in serious injury or death !

Never try to loosen, move or adjust garage door, door springs, cables pulleys, brackets or their hardware, all of which are under EXTREME tension.

Disable all locks and remove all ropes connected to garage door before installing and operating garage door opener to avoid entanglement.

To prevent damage to garage door and opener: Always disable locks before installing and operating the opener.

Never wear watches, rings, or loose clothing while installing or servicing opener. They could be caught in garage door opener mechanisms.

Place entrapment warning labels on wall next to garage door control.

Place manual release/safety reverse label in plain view on inside of garage door.

Upon completion of installation, test that your garage door opener is correctly working and test safety reversal system. door must reverse on contact with an object on the floor.

In order to prevent injuries:

Never leave children without parental control in proximity of a garage door opener in motion open, closed or stopped.

Never permit children to play with remote control push buttons or transmitters of garage door opener and prevent children to operate the garage door opener by control push buttons or transmitters. Always keep remote controls out of reach of children.

Install wall-mounted garage door controls (optional) out of reach of children and away of moving parts of the door.

Activate door only when it can be seen clearly, is properly adjusted and there are no obstructions to door travel.

Always keep garage door in sight until completely closed.

Never permit anyone to cross path of closing garage door.

No one should go under a stopped, partially opened garage door.

Always make sure to have connected the unlocking cable in order to permit to manually unlock (from inside and outside) the garage door and operate it manually in case of power failure or other problem.

To prevent any damage, never leave objects, cars ,motorcycles or similar under the garage door.

Without a properly working safety reversal system, person (particularly small children) could be SERIOUSLY INJURED or KILLED by a closing garage door.

Safety reversal system could fail if garage door opener is not correctly installed and if limit switches are not adjusted in correct position.

Please check well instructions on this manual and make a test after installation to verify power adjustment and limit switches settings. Incorrect adjustment of garage door travel limits will interfere with proper operation of safety reversal system.

Too much force on garage door will interfere with proper operation of safety reversal system.

Never increase force beyond minimum amount required to close garage door.

Never use force adjustment to compensate for a binding or stricking garage door.

After any adjustment are made, safety reversal system must be tested.

To prevent possible serious injury or death:

Head bracket must be rigidly fastened to a structural support on header wall or ceiling.

To avoid possible serious injury from a falling garage door opener, fasten it securely to structural supports of the garage.

Concrete anchors must be used if installing any brackets into masonry

To prevent possible serious injury or death from electrocution :

Be sure power is not connected BEFORE installing door control.

NEVER connect garage door opener to power source until instructed to do so.

Garage door installation and wiring MUST be in compliance with all local electrical and building codes.

SAVE THESE INSTRUCTIONS

1. kit contents

kit 8500SF

Complete gear 24V d.c with electronic board CTR29S, receiver and transformer

One rolling code , 2 channels radio transmittent 433,92 Mhz

Belt drive

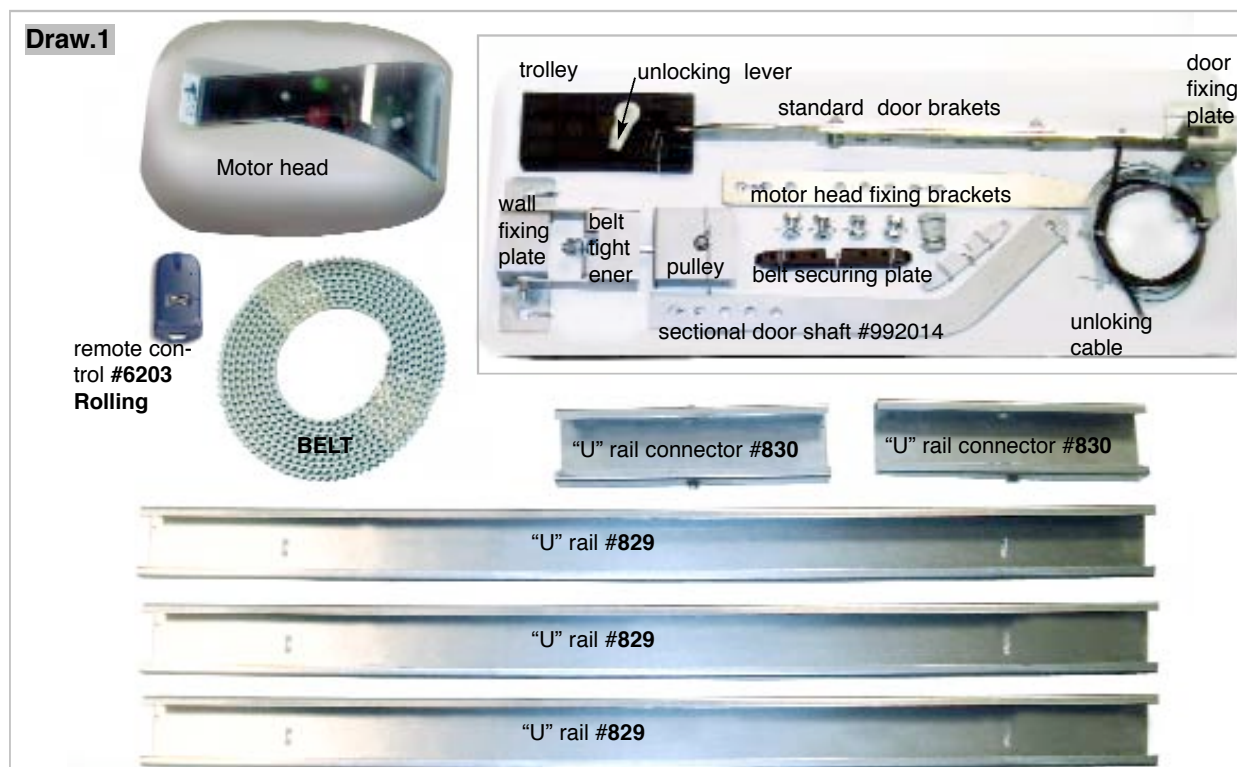
270 cm "U" iron rail (3 x. 90cm) with 2 connectors

Manual unlocking device from inside/outside

Mounting hardware (pre-assembled)

Mounting instructions

Draw.1



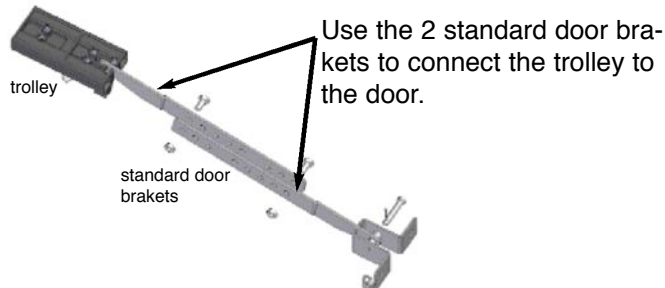
2. Technical specifications

Power (Vac 50/60 Hz)	230V
Traction (N)	100
Power absorbed (W)	80
Toroidal transformer	105W
Protection Fuse	0,8A T
Radio frequency & coding	433,92 Mhz rolling code
Speed (m/sec.)	0,15
Working temperature(°C min/max)	-10/+50
Courtesy light	Yes, automatic
Amperometrical safety system	Yes
Power adjustment	by trimmer
Travel limits	double limit switch
Automatic closing	Yes
Soft stop	Yes

3. Garage door types

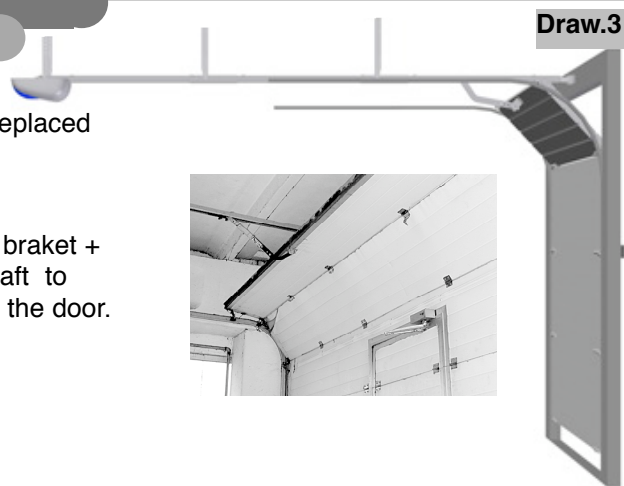
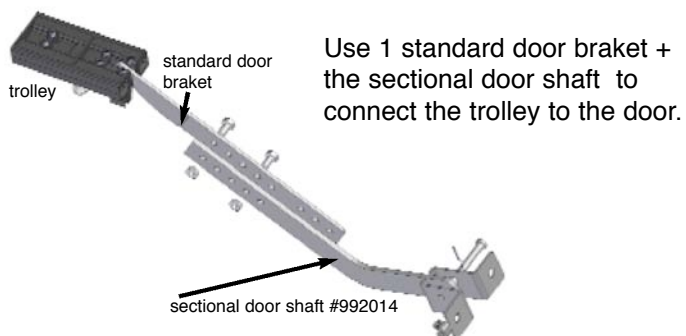
3.1 Non projecting up-and-over door

For the installation on a non projecting up-and-over door, no extra accessories are needed.



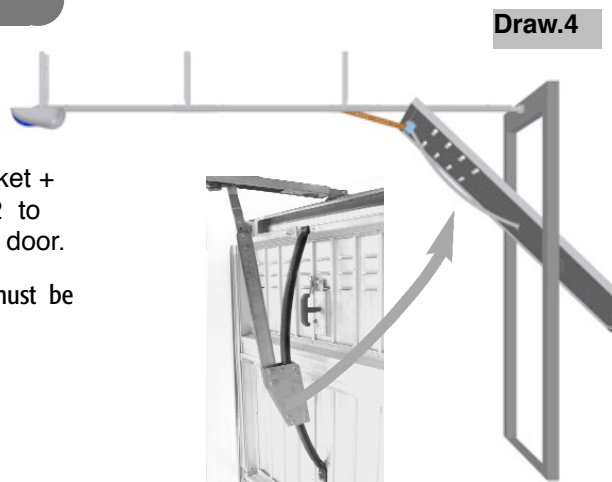
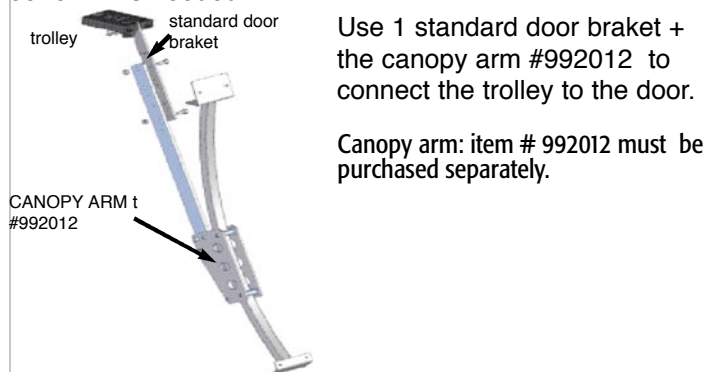
3.2 Sectional door

For the installation on a sectional door, 1 of the 2 supplied standard brackets must be replaced by the supplied sectional door shaft #992014



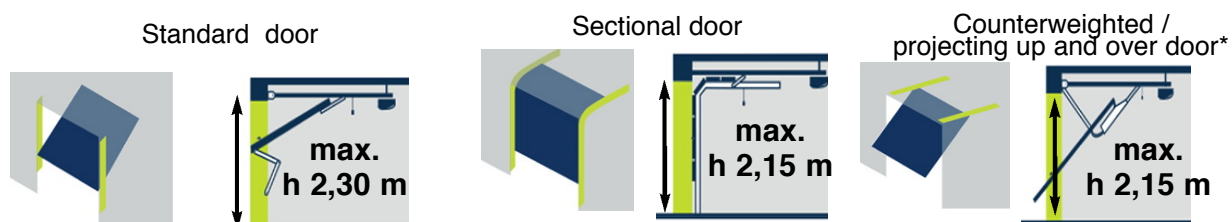
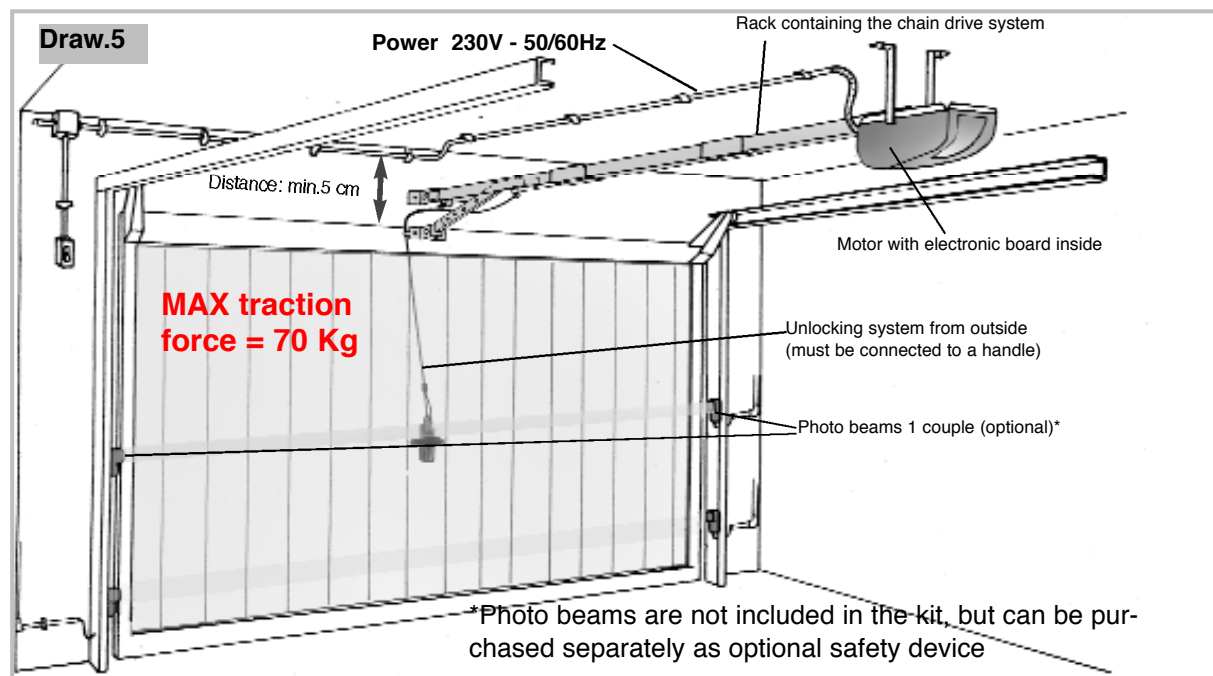
3.3 Projecting up-and-over door

For the installation on a projecting up-and-over door, extra accessory "canopy arm" item # 992012* is needed.

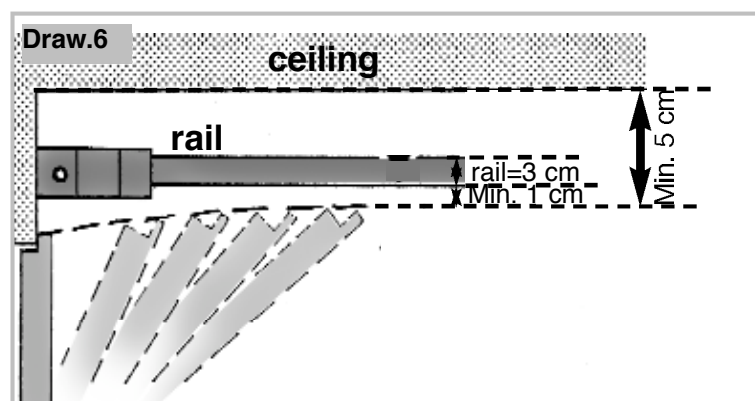


4. Operating limits & Installation scheme

To fix the rail of the garage door opener, a minimal distance of 5 cm is needed between ceiling and door. And a minimal distance of 1cm is needed between rail and door (see draw.6)

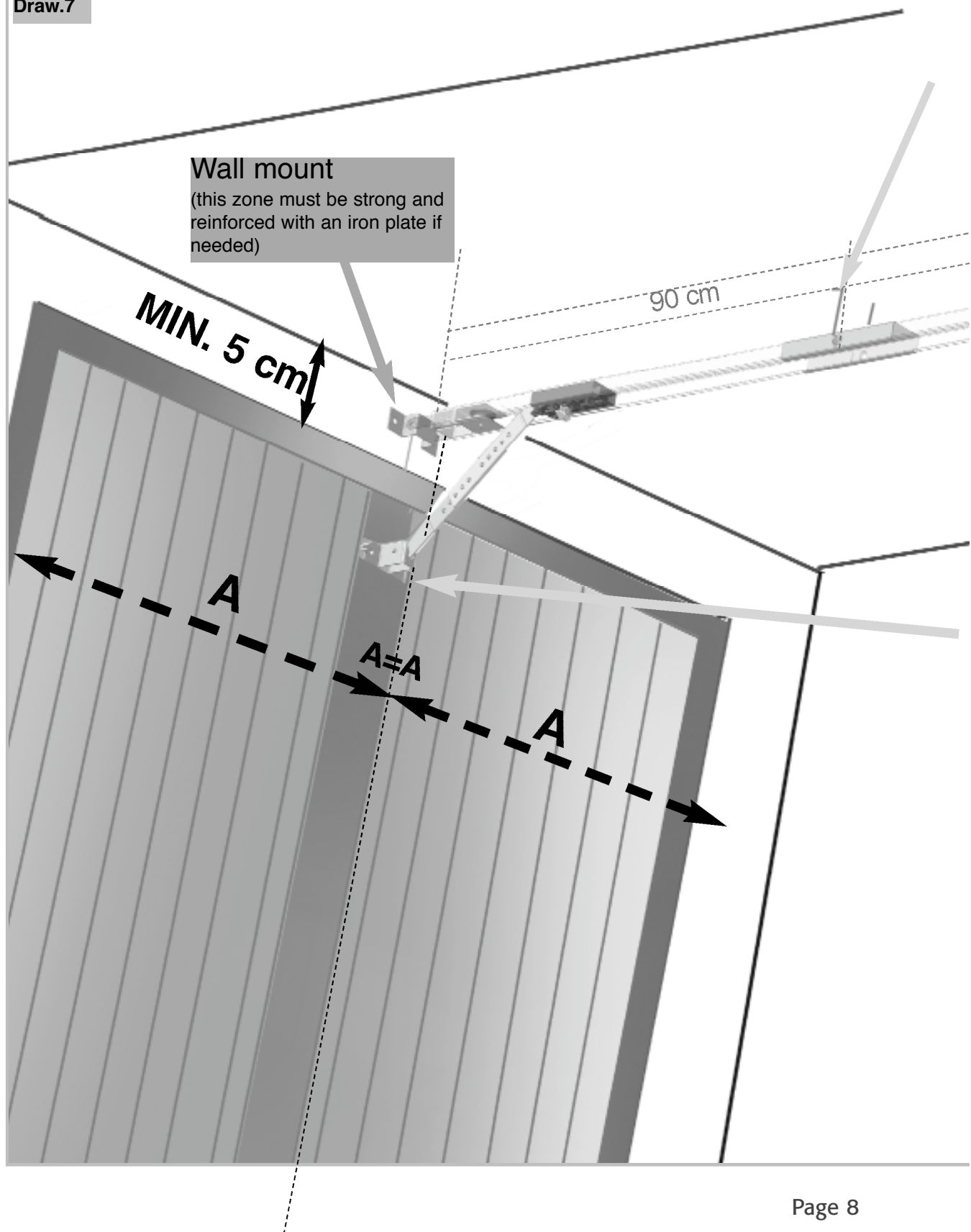


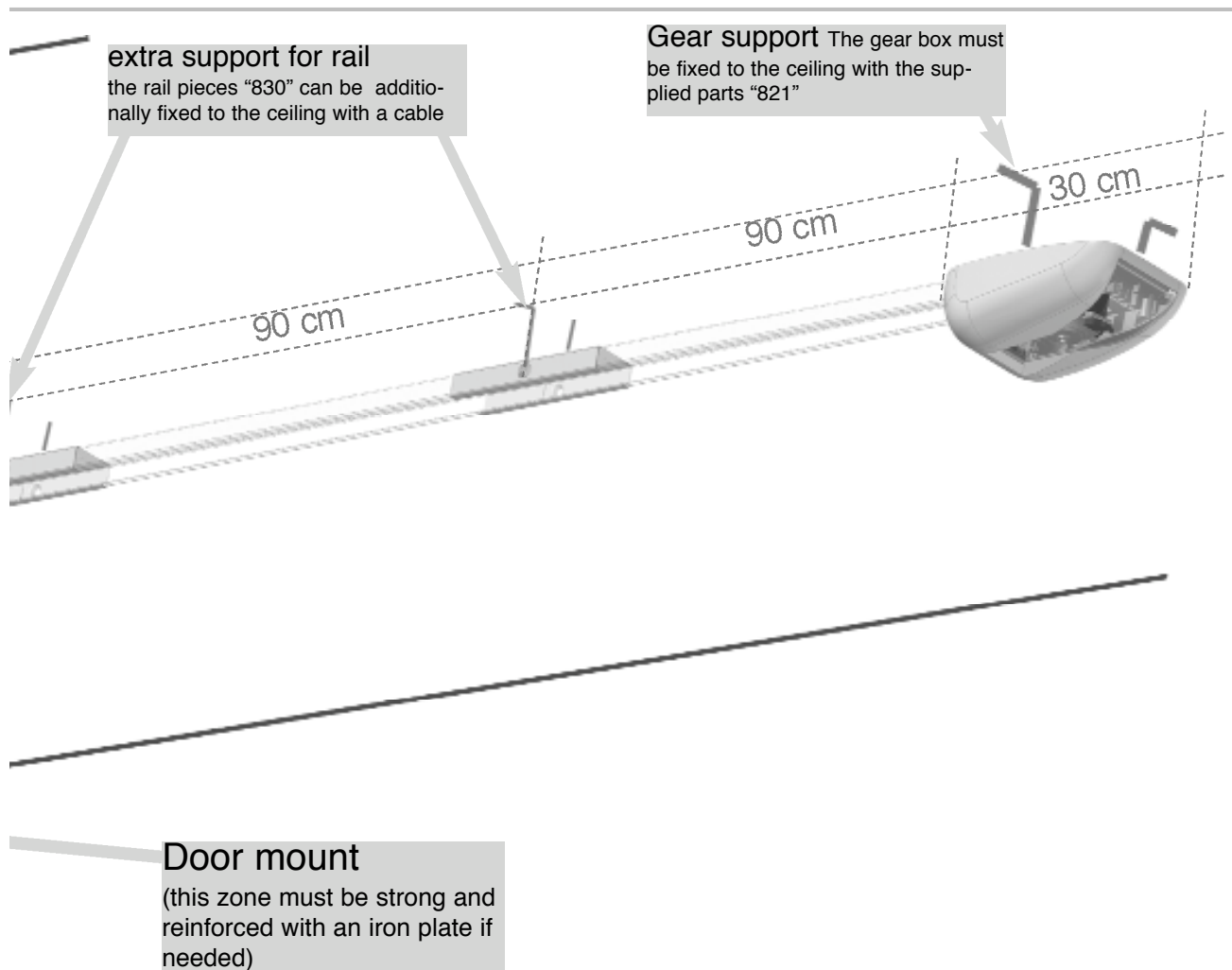
*= need extra accessory canopy arm part#992012 not included in the kit



Installation scheme

Draw.7





CAUTION:

to prevent injury from pinching, keep hands and fingers away from the joints while assembling the rail.

to avoid serious injury to fingers from moving garage door opener:

always keep hand clear of spocket while operating opener.

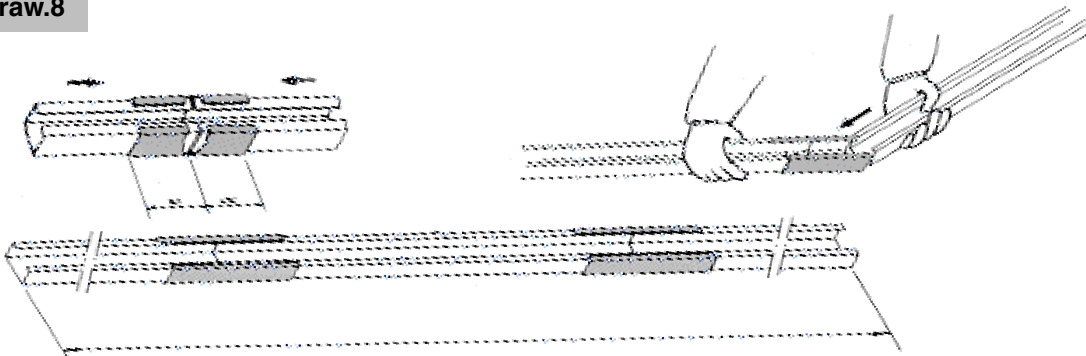
Securely attach spocket before operating

5. Assembly instructions

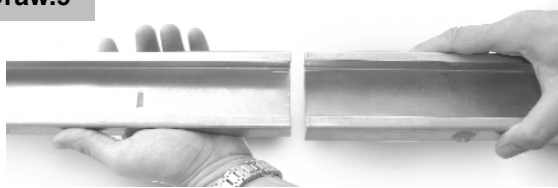
1° step: "U" Rail assembly

Assemble the 3 elements of the rail (part # 829) by fitting them into the 2 rail braces (part # 830).
See draw.8-10.

Draw.8



Draw.9



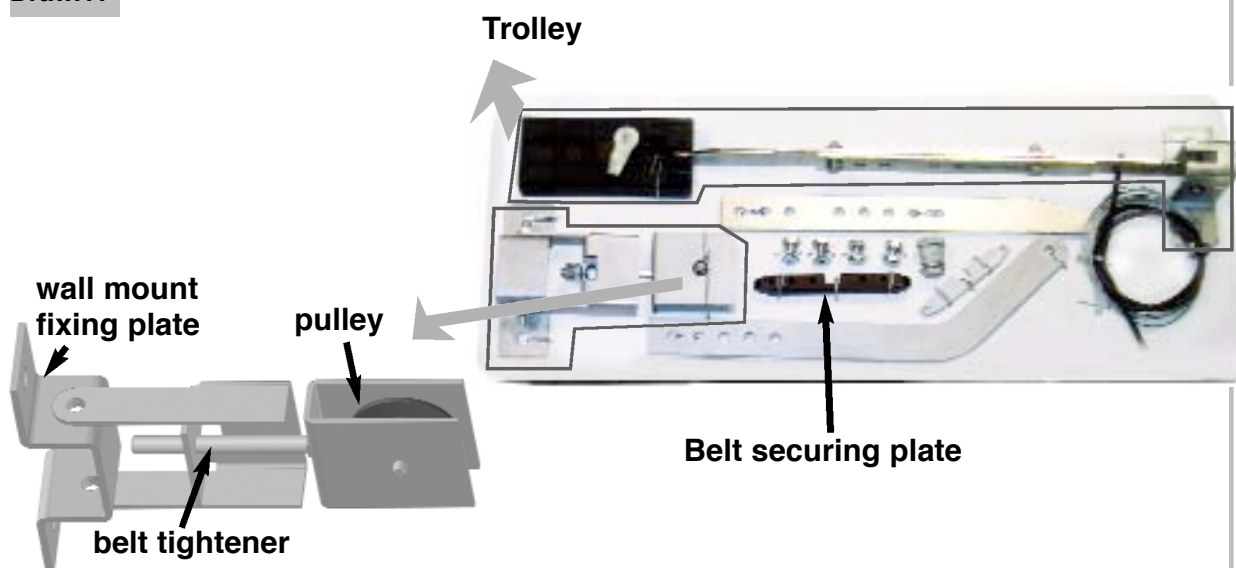
Draw.10



2° step: fixing the belt into the trolley and around the pulley

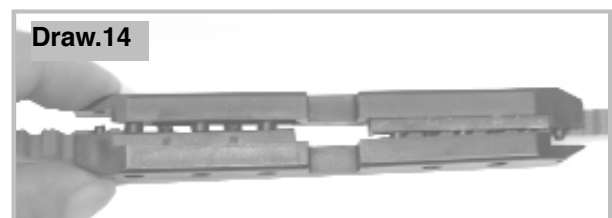
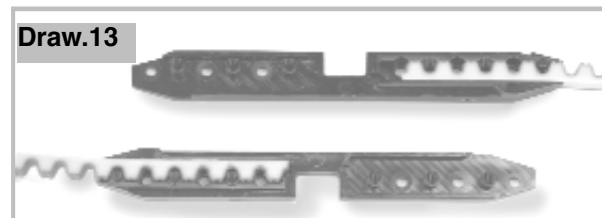
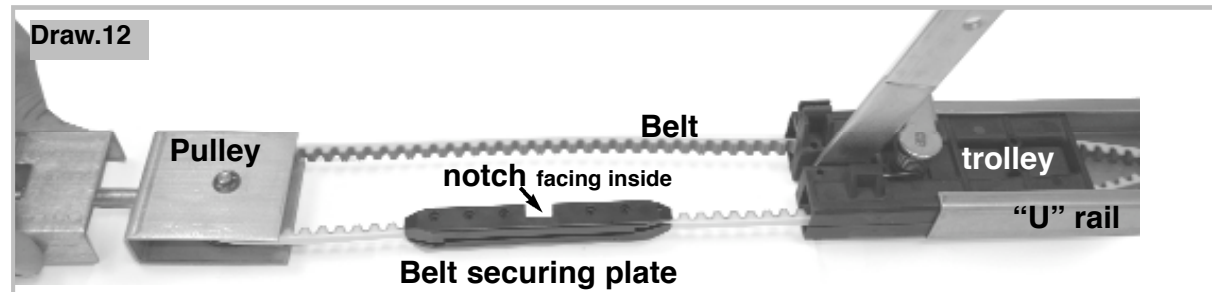
The pulley and the trolley are supplied pre-assembled:

Draw.11



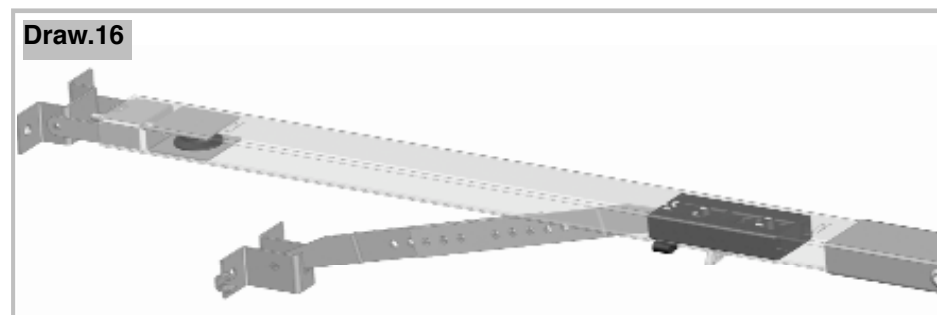
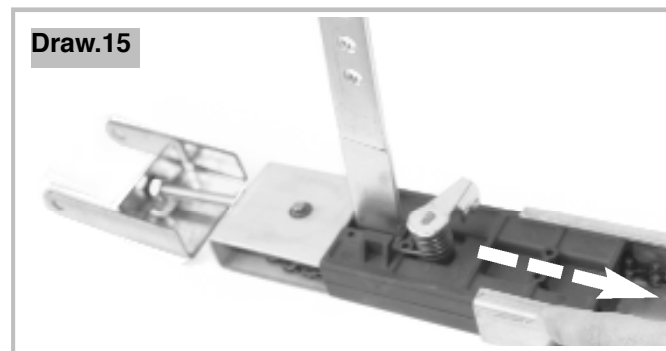
Slide the belt through the trolley as shown on draw.12 and then pass it around the pulley. Lock the belt with the securing plate as shown on draw.13-14

WARNING: The securing plate must connect the belt in a specific position: on the side opposite to the unlocking plug fixed on the trolley, and between the trolley and the pulley. The notch must face inside.(draw.12)



3° step: sliding the trolley with belt and pulley into the "U" rail

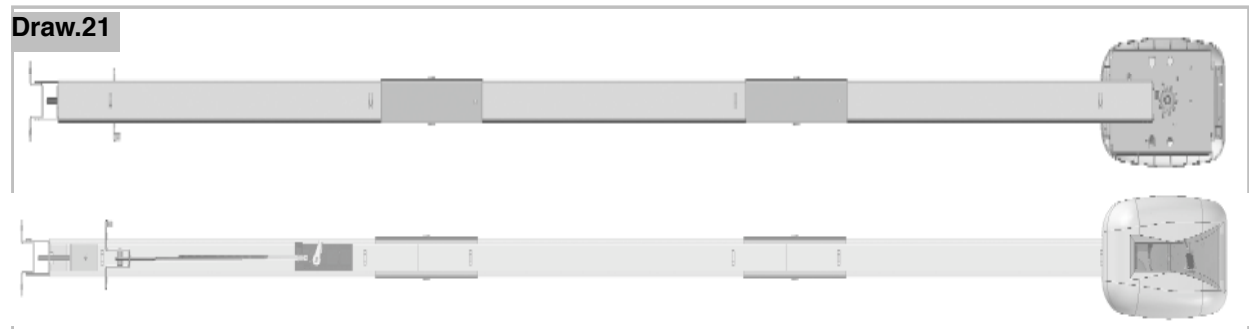
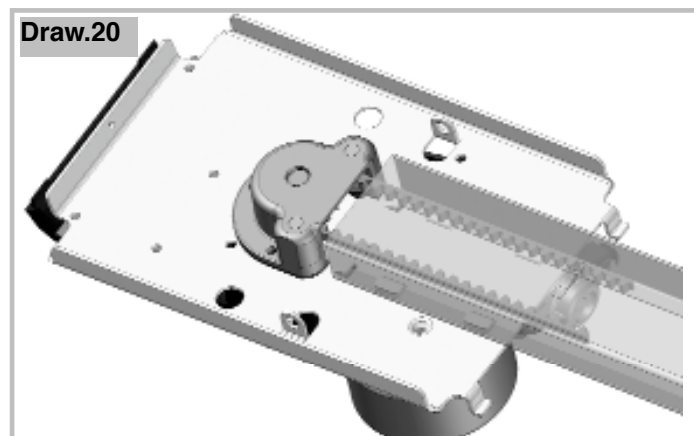
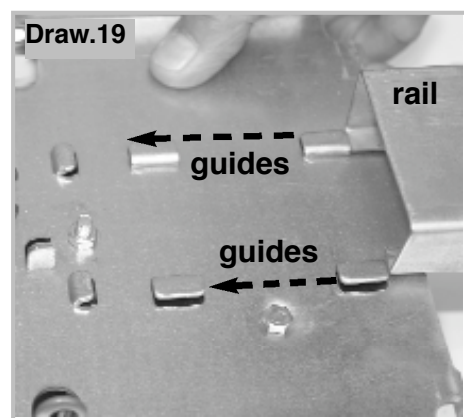
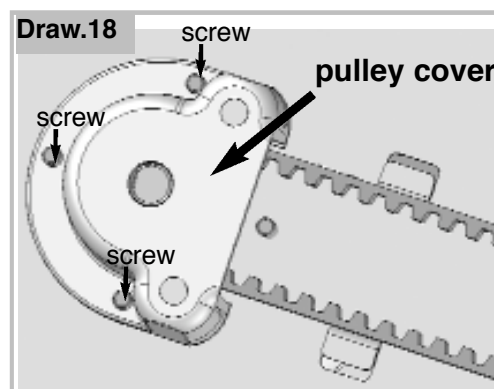
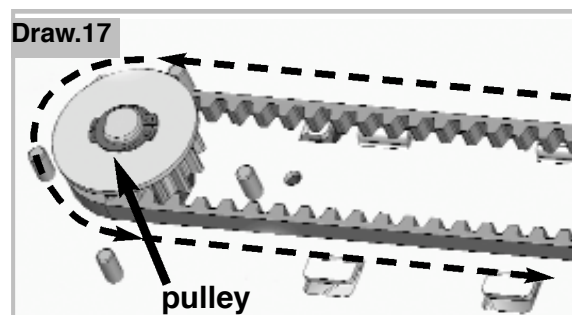
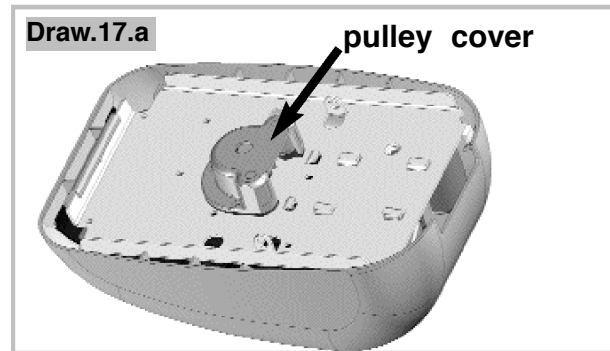
Slide the assembled belt, trolley and pulley into the assembled "U" rail .



4° step: connect the belt to the pulley on the motor plate

turn the motor head, and take off the pulley cover. Slide the belt around the pulley (draw.17).
Put the pulley cover on and fix it with the screws (draw.18).

Insert the “U” rail into the plate through the guides until it stops (draw.19-20)



NOW your garage door opener is full mounted and ready to be fixed to the door

6. Fixing instructions

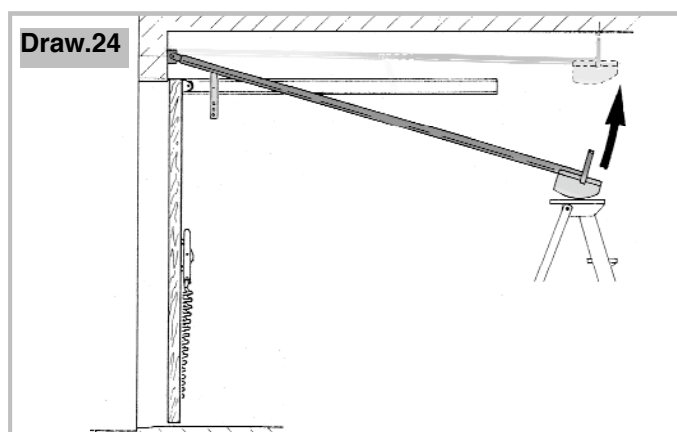
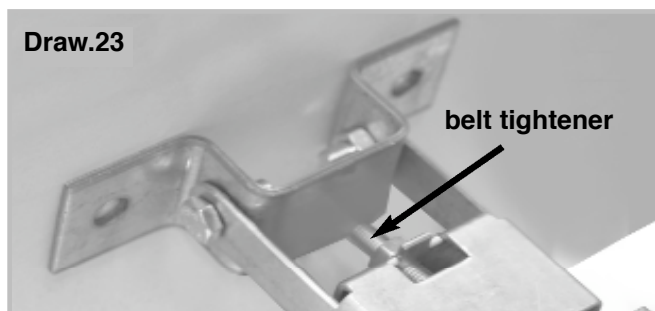
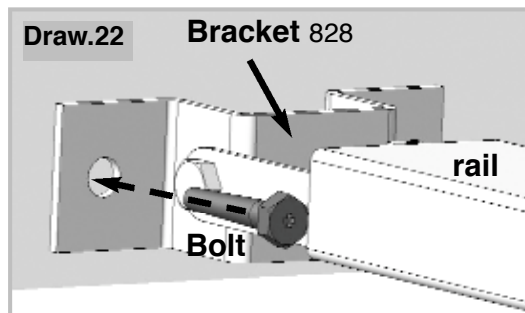
5° step: Door Jamb Mount:

Position the pilot holes horizontally on the vertical centre line of the door.

Fasten the bracket 828 to the door jamb or wall by means of 2 bolts (not supplied) of the right size and type of the structure.

Take and hold the opener to a horizontal position, until it can be attached to the ceiling. (draw.24).

Warning: the fastening area must be reinforced and structurally resistant.

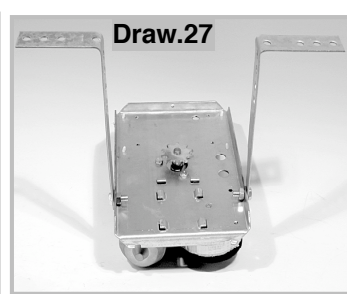
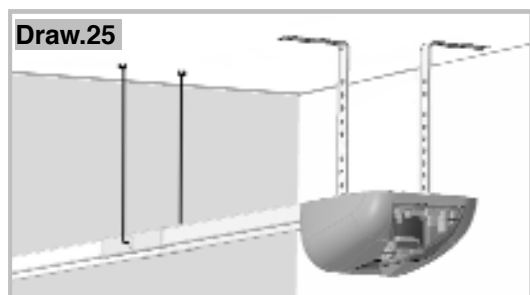


6° step: Motor Head Mount:

Hang the motor head.

The hanging brackets must be attached to the motor plate and angled at 90° at the ends, as is showed in draw 25-27. Then fasten the brackets to the ceiling.

The rail can be fastened to the ceiling through the holes in the rail braces, in order to prevent the rail from warping. This is a useful solution expecially when utilising accessory 992012 (up-and-over doors).



7° step: Door fixing

Close the garage door.

The fixing plate 809 is supplied pre-assembled to the trolley by 2 brackets. These brackets are supplied for installation on a **STANDARD NON PROJECTING-UP-AND-OVER DOOR**

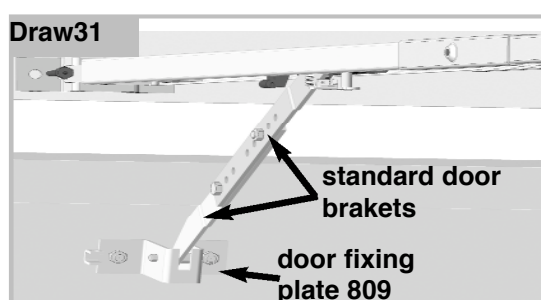
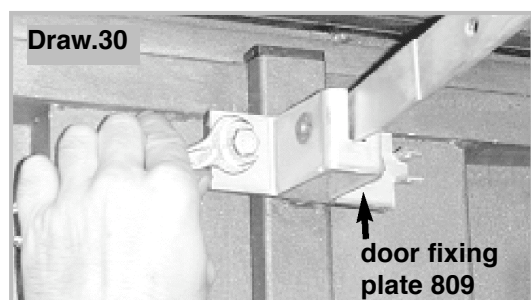
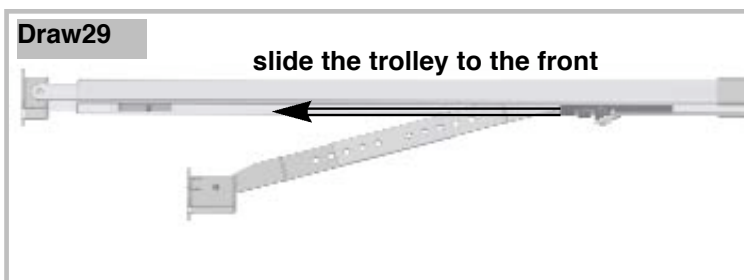
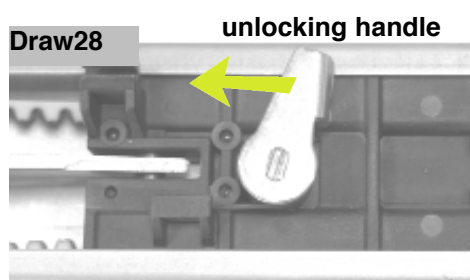
1°) Push left the unlocking handle to release and manually move the trolley (draw.28)

2°) Slide the trolley to the front and advance the brackets to find the right fixing position of the plate 809.

3°) If necessary, adjust the length of the brackets, by sliding them one on another and fix the appropriate holes.

4°) Fasten the plate 809 to the door by means of 2 bolts (not supplied) of the right size and type accordingly to your door. (draw.30)

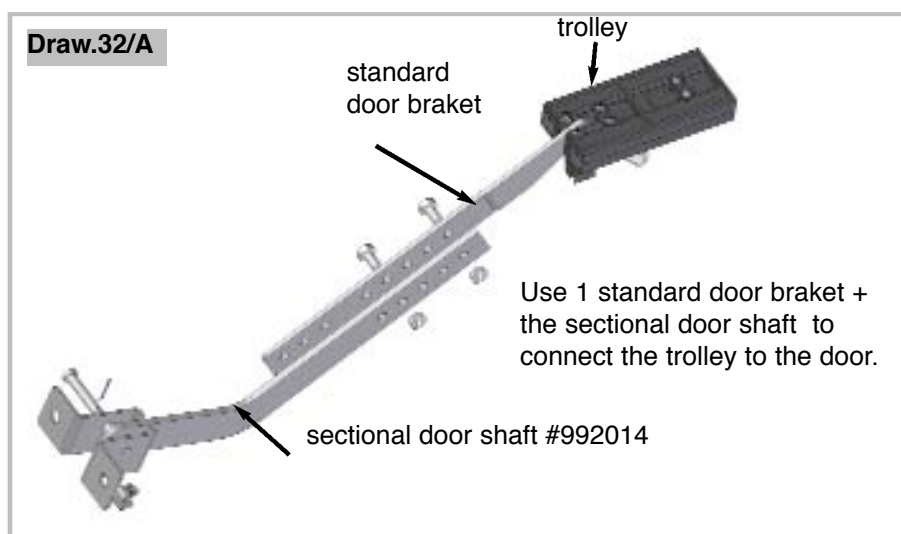
Warning: the fastening area must be reinforced and structurally resistant.



WARNING : for installation on a sectional door,

For the installation on a sectional door, 1 of the 2 supplied standard brackets must be replaced by the supplied sectional door shaft #992014 as in draw. 32/A

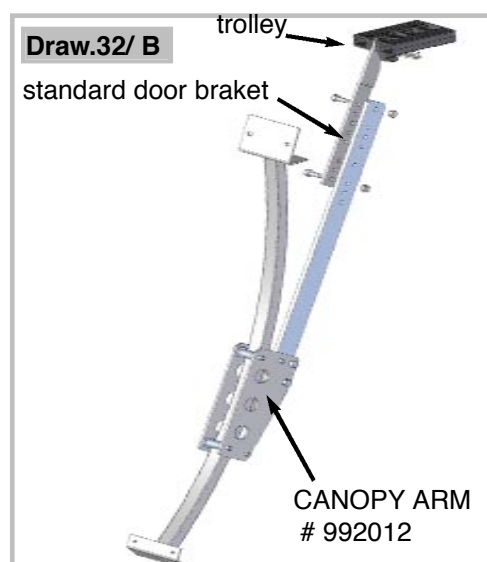
(see also page 6 point 3.2)



WARNING:
for installation on a projecting up-and-over door,
 an extra canopy arm (not supplied inside the kit) is needed to connect the trolley to the door as in draw. 32/B.

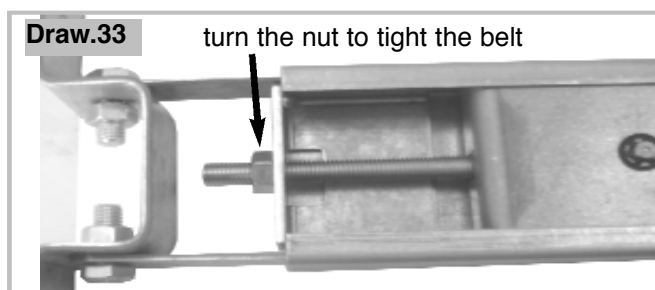
Please see also page 6 point 3.3.

Please refer to the specific instruction manuals supplied with the canopy arm to be separately purchased.



8° step: belt tightener

Once the opener has been installed, tighten the belt by means of the belt tightener as is shown in draw.33 so that the belt does not swing excessively during movement. Do not over tighten the belt.



7. Manual release system

An unlocking system is provided to unlock the trolley and move the door manually. Composed by an iron wrap with his sheath, it must be connected to the unlocking undle positioned on the trolley.

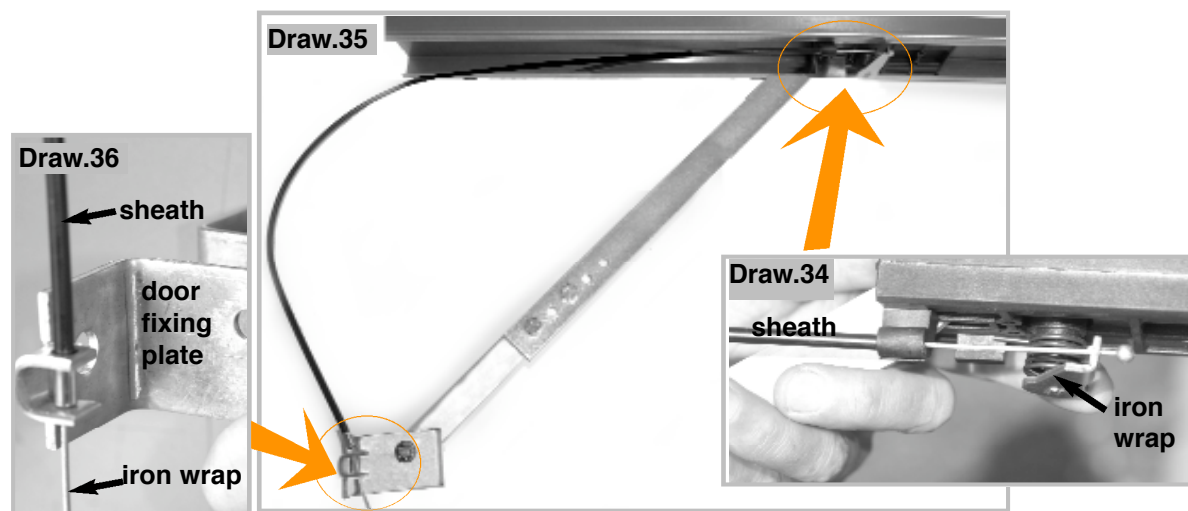
Pass the iron wrap inside the hole of the handle and slide it into the sheath (Draw.34) then pass the iron wrap and sheath into the door fixing plate (Draw.36)

Fix the iron wrap on the handle of your door using the supplied wrap-compressor (Draw.37-38).

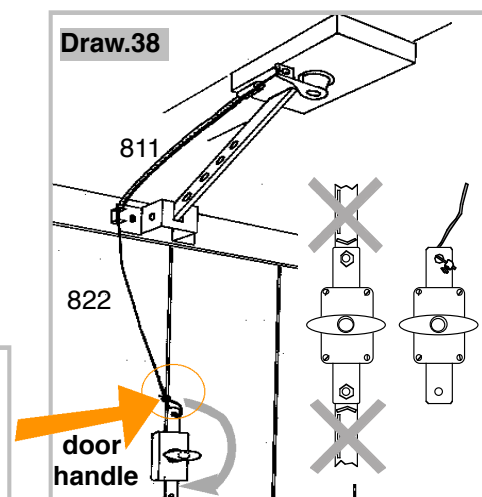
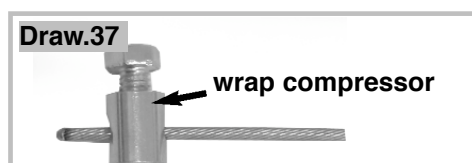
To unlock the gate from inside or outside rotate the door handle anti-clockwise (Draw.38).

To lock the trolley, move manually the door until the belt securing plate fits again in the trolley (it will happen automatically while moving the door.

WARNING: to control the door with your radio remote control, the trolley must be locked!



Wrap connection to manually unlock from inside and outside the door.
Connect the cable to the handle. Turn the handle to unlock.



8. 230V power supply wiring



Lift the motor cover (draw.39-40)

Connect the 230 V 50/60 Hz input cable to the transformer terminal board (draw.41-42-43).

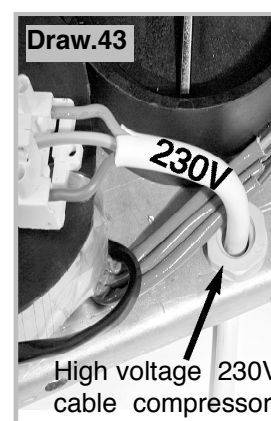
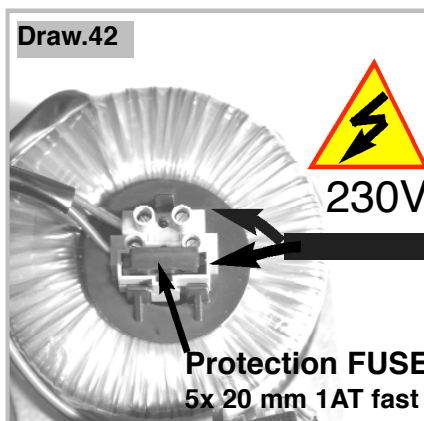
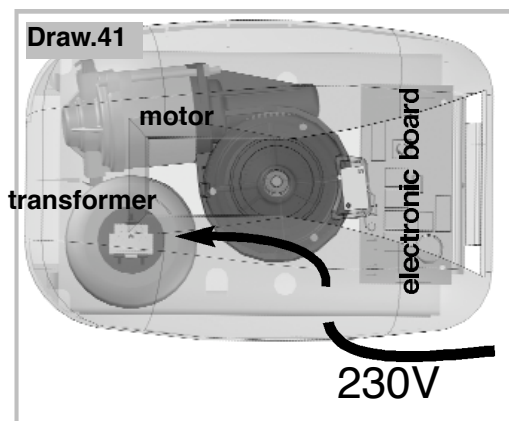
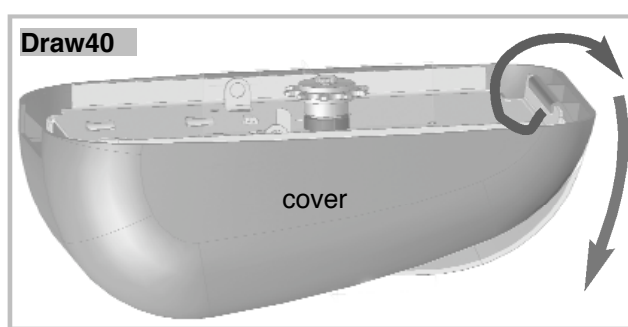
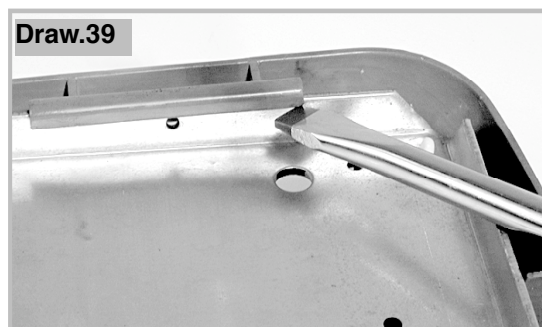
A fuse is mounted on the transformer to protect low voltage system (draw.42).

We recommend to use a cable compressor (not supplied) to fix the cable when passing it through the motor plate (draw.43)

Remember to verify the protector fuse is not broken, and in case, replace it by a new one.

When the operation is completed, close the cover.

CAUTION: high voltage supply must be connected by a certified installer only ! operations with 230V power are very dangerous.
Risk of serious injury or death !



9. Remote control coding (6203 rolling code)

Rolling code remote ref. 6203/ rolling transmits a unique "rolling code" (billions of continuously changing combinations) on a frequency of 433 MHz. With 2 buttons, has 3 channels of transmission.

1° channel = pushing on "ON " button

2° channel = pushing on "OFF " button

3° channel= pushing on "ON" + "OFF " buttons together

To operate your garage door you must memorize the remote control code on the electronic board.

WARNING: Operate adjustments and settings only with garage door in closed position.

To memorize the remote control code inside the electronic pnel of the opener:

The door must be closed and idle.

- Press button P1 on the electronic board. The red LED is on.
- Release button P1 and immediately press on the buttons of the remote control that you wish to use to operate the opener. Hold the remote button pressed for about 4 sec.
- the red LED on the electronic board will quickly blink then it stays switched on for about 6 seconds before to switch off.
- Press again the memorized remote control button, the opener will start an operation.

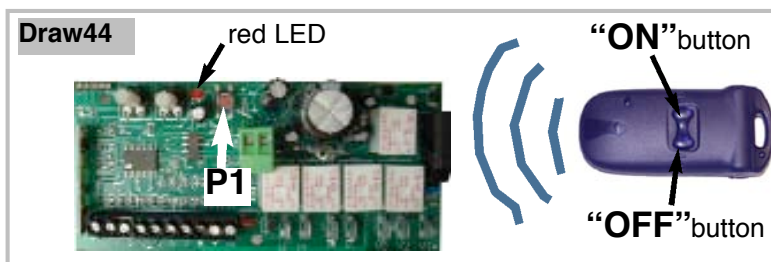
Max. 10 remote control codes can be stored by each electronic board of the gate opener.

To erase the codes from the control board:

To deactivate any unwanted remote, first erase its memory from the electronic board of your garage opener as following (all remote control codes memorized will be deleted):

- The door must be closed and idle.
- Press button P1 for about 20 sec. until the red LED blinks.
- Then release P1.
- All remote control codes have been deleted.- Reprogram each remote you wish to use.

Maintenance: To change the battery unscrew the screw on the back of the remote and open the covers. Use a Battery 12V type A23-5mA.



10. Power adjustment

The force can be adjusted by turning the Force setting trimmer "POWER".

It regulates the amount of power required to open and close the door.

Set the right power properly according to your door weight and frictions.

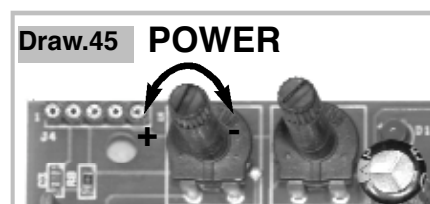
Push on your remote control to operate the door in the down and in the up position to check if power is set properly.

Turn RV1 anticlockwise to improve power.

Turn RV1 clockwise to reduce power.

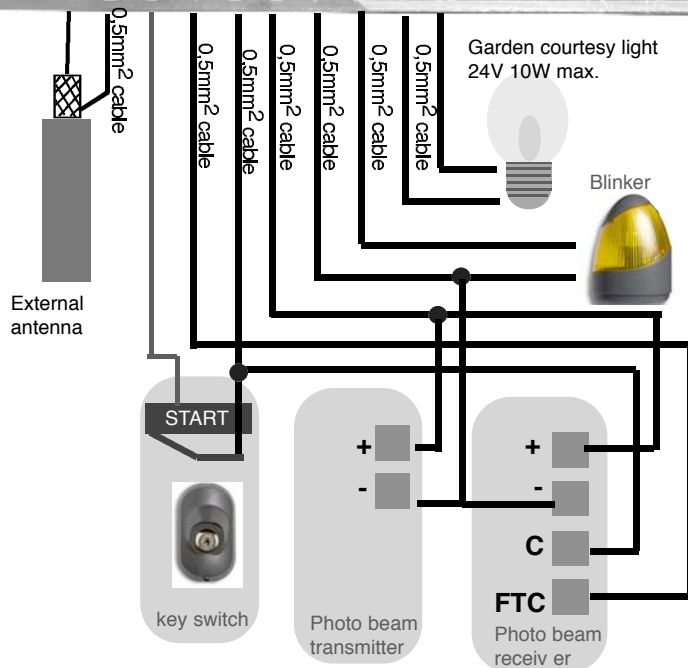
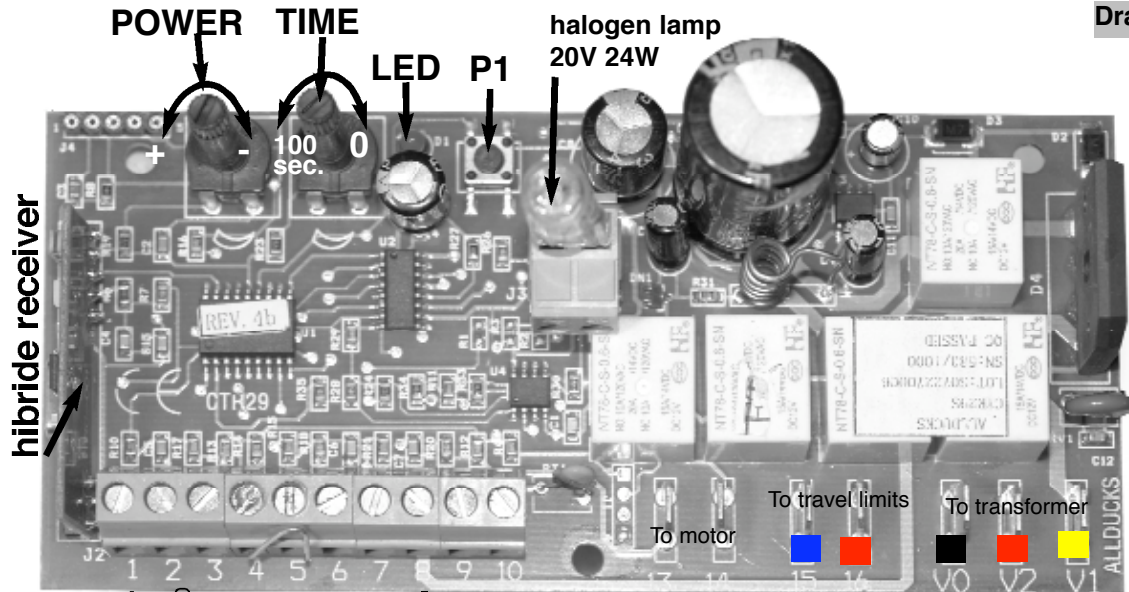
WARNING:

If power is set at a too low level, the door will stop before reaching the open or closed position.



11. Electronic Board CTH29S

Draw.46



P1= push button to memorize or delete remote controls code

LED= red light LED as indications for memorizing or delating remote control codes

POWER= force setting trimmer:turn anticlockwise to improve power.Turn clockwise to reduce power.

TIME= trimmer to set the automatic closing timer adjustment 0-100 sec.Turn fully clockwise to set the step by step function.Turn anticlockwise to set automatic closing function to a max.pause time of 100 sec

1= ANTENNA CABLE

2 = GROUND Antenna

3/5= START

4/5 = Photo beam contact

6= PHOTO BEAM POSITIVE

7 = PHOTO BEAM NEGATIVE

7/8 = blinking light 24V 10W max

9/10 = extra courtesy light

13/14 = limit switch connector

15(+) = motor blue cable connection

16(-) = motor red cable connection

From tranformer:

V0 black(=0V);

V2 red(=24V);

V1 yellow (=12V)

WARNING:
if no photo beam connected the bridge between outlets 4 and 5 must remain connected.

12. Setting the travel limits

Warning: to operate setting of travel limits you must check that:
the electronic panel must be on **step-by step operating function =**
“TIME” Trimmer must be completely rotated clockwise. See page 20;

Travel limits regulates the points at which the door will stop each operation when moving up or down. The 2 limits flags red and green will stop the door movement when they get in correspondance of the limit switch .

Red Flag = closed door

Green Flag = open door

- 1) your door closed: Position the red flag in correspondance of the limit switch (draw.47)
- 2) your door open: Position the green flag in correspondance of the limit switch (draw.48)

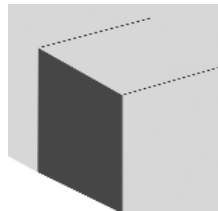
To set the travel limits:

- Unlock the trolley (see page 15).
- manually close your door.
- With the door in closed position unscrew a little bit the red flag, moove it and position it in correspondance to the limit switch (the limit switch must be pressed by the red flag).
- push on your remote control to activate the opener.It will automatically re-lock the trolley while mooving.
- While the door starts to open, unscrew a little bit the green flag, moove it and when the door is in the desired open position, tightly screw the green flag in correspondance to the limit switch (the limit switch must be pressed by thegreen flag).

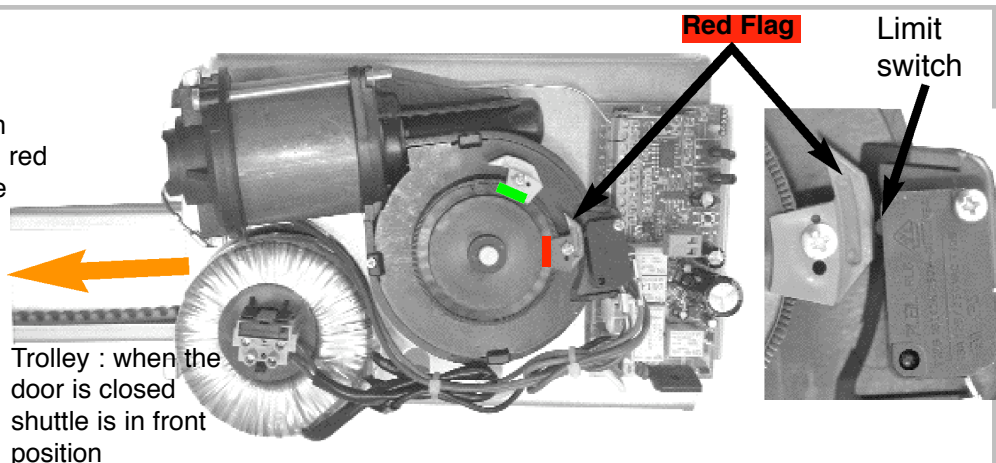
Draw.47

DOOR CLOSED:

when the door is in the closed position, red flag must touch the limit switch



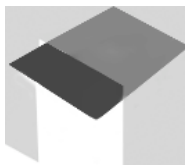
Trolley : when the door is closed shuttle is in front position



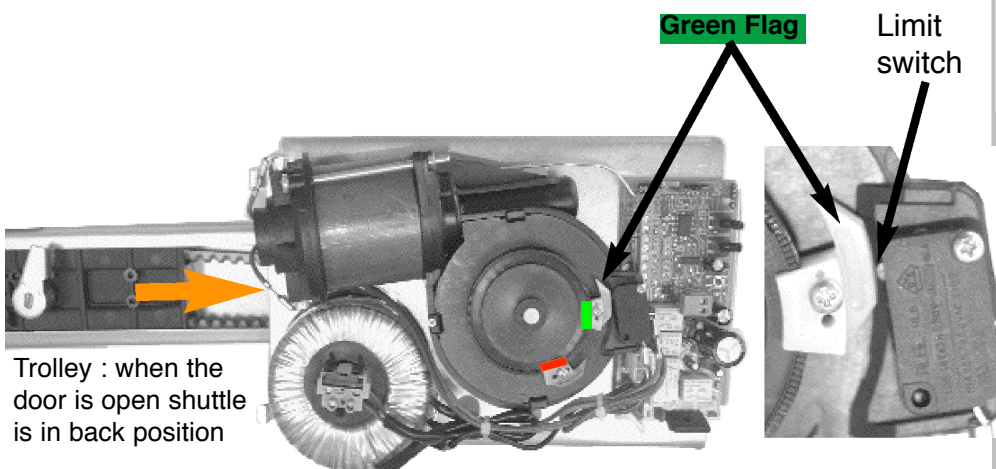
Draw.48

DOOR OPEN:

when the door is in the desired open position, green flag must touch the limit switch.



Trolley : when the door is open shuttle is in back position



13. Automatic closing

Operate adjustments and settings only with garage door in closed position, and make sure any object child or person will be in the operating zone

To activate the door automatic closing programme, rotate the "TIME" trimmer anti-clockwise from 0 position, until the desired time pause interval is reached. The adjustment range is 0-100 sec. Your door will automatically close after the programmed temporized pause.

Position= 0 (trimmer completely rotated clockwise) will activate the step-by-step function = opens - stop - closes.

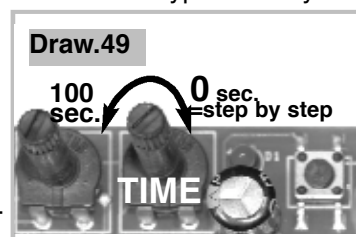
The garage opener set in automatic closing function will not accept remote control/ keypad or key switch impulse while in pause time.

WARNING:

If you set the automatic close operating function, the risk of injury of people or damage to objects increases !



In order to prevent injuries: never leave or permit to leave any object or car in the operating zone of your door moving zone. Never leave children without parental control or adults nearby the door if you set the automatic closing function. All ducks recommends to use step by step function.



14. Maintenance

Courtesy light:

The courtesy light on the electronic board can be replaced with the following model:

Halogen lamp 20V 24W

Remote control batteries:

The duration of remote control batteries is approx. 2 years.

Batteries can be replaced with the following model:

12V type A23 - 5mA

Protection fuse:

In the event of short circuit, the protection fuse can be replaced with the following type:

Fuse 5x20mm 1A T fast (see on draw.40, page 14)

15. Quick Help to Problem solving

1) Opener does not operate:

- check electric power supply.
- check the protection fuse and, should it be necessary, replace it
- check motor function by triggering it through the start contact (see drawing)
- check that the remote control code is stored in the opener board (erase all memories first and then store the code)
- The batteries could be discharged. Replace them.

2) The opener opens but does not close:

- If the photo beams are not connected, check that the bridge between outlets 4 and 5 is appropriately connected.
- if photo beams are connected, check their alignment and that they are clean both inside and outside
- also check that no automatic closing function has been programmed. Should this be the case, the system will not accept closing commands.

3) The system does not operate from remote beyond a certain range

- there may be interferences in the air. The use of an external aerial antenna is recommended.

4) The door does not close in the desired position

- check that there is no excessive friction at a specific door position
- check the power level, and eventually increase it
- check limit switch settings

16. Warranty & After sale service

Allducks products are guaranteed for 12 months from purchase date, for manufacture or material defects. In case of repair, the product shall be returned to the to one of our authorised after-sale centres. The authorised technical assistance centres are the only acknowledged suitable to carry out repairs under guarantee. In case of difficulties, or to get the after sale offices of your country please address to: **Allducks Srl Via Alessandro Volta, 1 - 20060 Ornago (MI) ITALY Tel. +39/039/6010654**

Fax +39/039/6011243 service@allducks.it / info@allducks.it www.allducks.it

Guarantee conditions

1. The guarantee is accepted only the demands presented with the invoice or coupon proving the purchase; no alteration or cancellation shall be on the certificate.

2. Allducks obligations are limited to the repair or, at its own discretion, to the defective parts replacement.

3. The product guarantee shall immediately decay if the product is modified and adapted to technical and safety norms different from the ones in force in the country the product was conceived and manufactured for.

No refund is foreseen for damages deriving from the above-mentioned modifications.

4. The guarantee does not cover:

a) Periodical checks, maintenance, repairs or replacement of worn out parts.

b) Transport, handling or installation costs relating to this product.

c) Improper use, mistakes in the operation and incorrect installation.

d) Damages caused by fire, water, natural phenomena, storms, incorrect power supply, or any other cause not depending on the manufacturer.

5. This guarantee neither influence the rights of the customers envisaged by law, according to the national applicable laws, nor the rights of the customer towards the reseller deriving from the purchase contract.

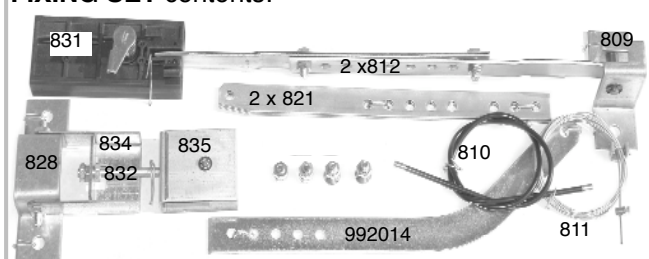
In case there were no national applicable laws, this guarantee shall be the only safeguard for the customer and neither the manufacturer nor his distributor will be responsible for accidental or indirect damage to their own products deriving from the infringement guarantee conditions.

UK HELP-LINE: 0845 136 2012

Mo-Fri: 0900-1900 Sat: 0900-1700 Sun: 1000-1600

17. Spare parts

FIXING SET contents:



RAIL SET contents:

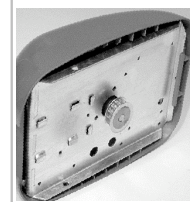


BELT SET contents:



8500T/ belt/ roll

Complete garage motor head with electronic panel, motor and transformer



R403 UE
transformer 230V



826
belt pulley



CTH29S



825/R117
complete motor



18. Extra Optional accessories

Remote control
6203 rolling



key switch
SW5000



radio key pad
SW6500



wide angle
mirror
SW7950



photo beam
SW7012



external antenna
with 5 m cable
6025/5



Blinker
SW7500



Canopy arm
992012



How to order spare parts or optional accessories:

Please address to your local store or Allducks national after sale service center, or to Allducks to get more informations on the services provided in your country. Warning: not all extra accessories or spare parts are availables in the local stores.

If your distributor do not have availability of some accessories, please contact www.allducks.it

19. CE declaration

DECLARATION OF CONFORMITY

WE

Alducks srl
Via Alessandro Volta,1
20060 Ornago (MB) ITALY

declare under our sole responsabilità that the products listed below to witch this declaration relates:

8500SF Garage Door Opener

when installed, used and mantained according to all the manufacturer instructions on a garage door witch have also been installed correctly accordino to all security and safety norms indicated by the Manufacturer, , are in conformity to the applicables sections of standards:

EMC: EN61000-6-2,EN61000-6-3,EN301489-3,

EMF: EN50366,EN50371

SAFETY: EN60335-1 4° ed., EN60335-1:2002, EN60335-2-103:200i3

En60335-2-103,

EN60529;

EN60950-1;EN60947-5-1, EN60598-2-1

ETS300683 ,

EN55014-1, EN55014-2:2001

EN60555,

EN13241,

EN 6100-3-2; EN6100-3-3

EN12453:2000

EN12445

Following the provisions of EU Directivesand all ammendments:

89/392/EEC, 99/05/CE ,73/23/CEE,89/336/EEC, ENC300 220-3

and all its amendments.

Remote control 6203 rolling,

Certificate n°: CE 0681

FCC ID OLS137925764

The mentioned items are in compliance with RoHS rules

july 2008

The Chairman

A.Toutberidze

