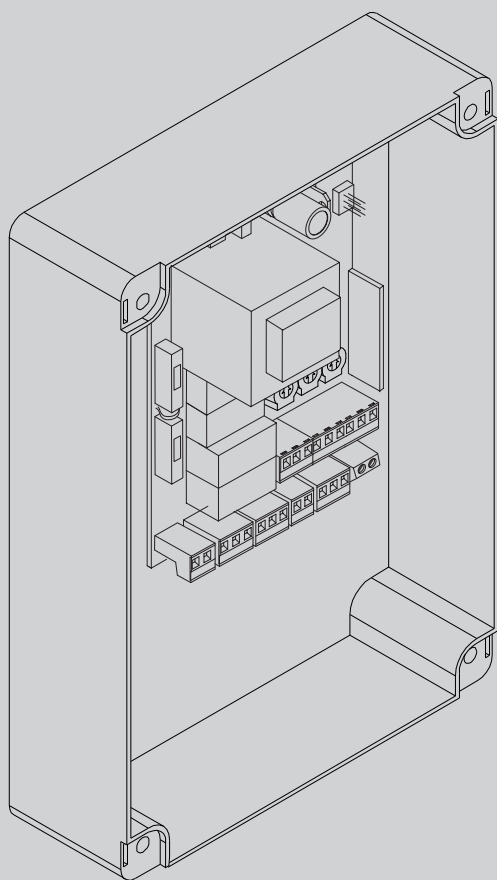




D814011 00100_02 04-12-18

QUADRO COMANDO
CONTROL PANEL
CENTRALE DE COMMANDE
SELBSTÜBERWACHENDE STEUERUNG
CUADRO DE MANDOS
BEDIENINGSPANEEL



ISTRUZIONI DI INSTALLAZIONE
INSTALLATION MANUAL
INSTRUCTIONS D'INSTALLATION
MONTAGEANLEITUNG
INSTRUCCIONES DE INSTALACION
INSTALLATIEVOORSCHRIFTEN

ALCOR ACA

Bft

((ER-Ready))



AZIENDA CON
SISTEMA DI GESTIONE
CERTIFICATO DA DNV GL
= ISO 9001 =
= ISO 14001 =

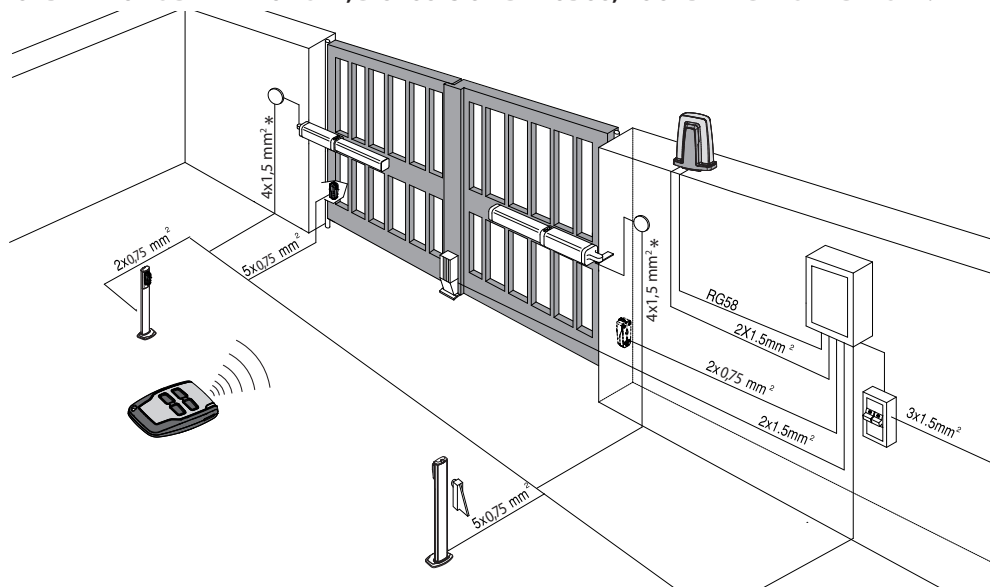
Attenzione! Leggere attentamente le "Avvertenze" all'interno! **Caution!** Read "Warnings" inside carefully! **Attention!** Veuillez lire attentivement les Avertissements qui se trouvent à l'intérieur! **Achtung!** Bitte lesen Sie aufmerksam die „Hinweise“ im Inneren! **¡Atención!** Leer atentamente las "Advertencias" en el interior! **Let op!** Lees de "Waarschuwingen" aan de binnenkant zorgvuldig!

INSTALLAZIONE VELOCE-QUICK INSTALLATION-INSTALLATION RAPIDE SCHNELLINSTALLATION-INSTALACIÓN RÁPIDA - SNELLE INSTALLATIE

D814011 00100_02

**PREDISPOSIZIONE TUBI, TUBE ARRANGEMENT, PRÉDISPOSITION DES TUYAUX,
VORBEREITUNG DER LEITUNGEN, DISPOSICIÓN DE TUBOS, VOORBEREIDING LEIDINGEN.**

A



B

Collegamento di 1 coppia di fotocellule non verificate,
per fotocellule verificate vedere pagine seguenti.

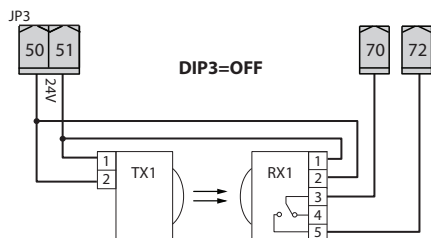
Connection of 1 couple of untested photocells,
for tested photocells see the following pages.

Connexion d'une paire de photocellules non vérifiées,
pour les photocellules vérifiées consultez les pages suivantes.

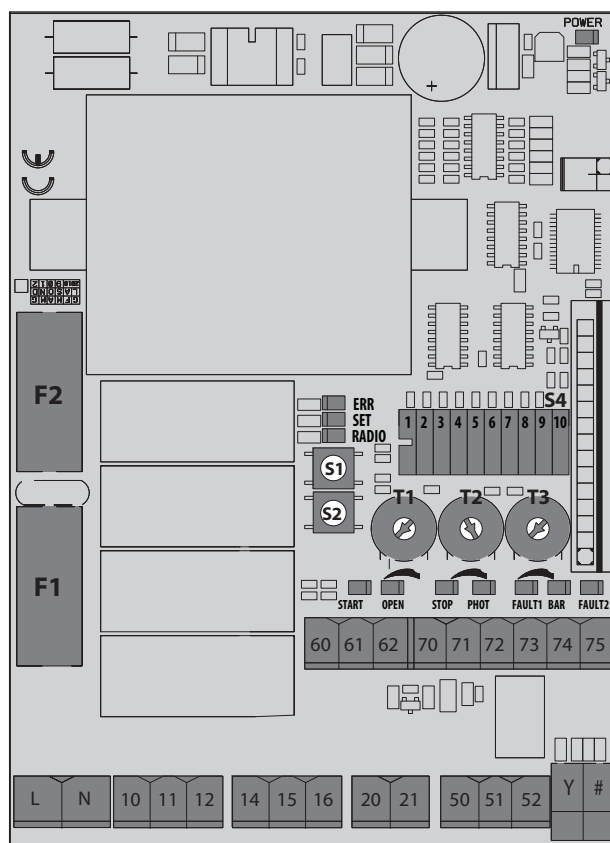
Anschluss von einem Paar nicht überprüfter Fotozellen,
für überprüfte Fotozelle siehe die folgenden Seiten.

Conexión de 1 par de fotocélulas no comprobadas,
para fotocélulas comprobadas véanse las siguientes páginas.

Aansluiting van 1 paar niet-geverifieerde fotocellen.
Raadpleeg de volgende pagina's voor geverifieerde fotocellen.

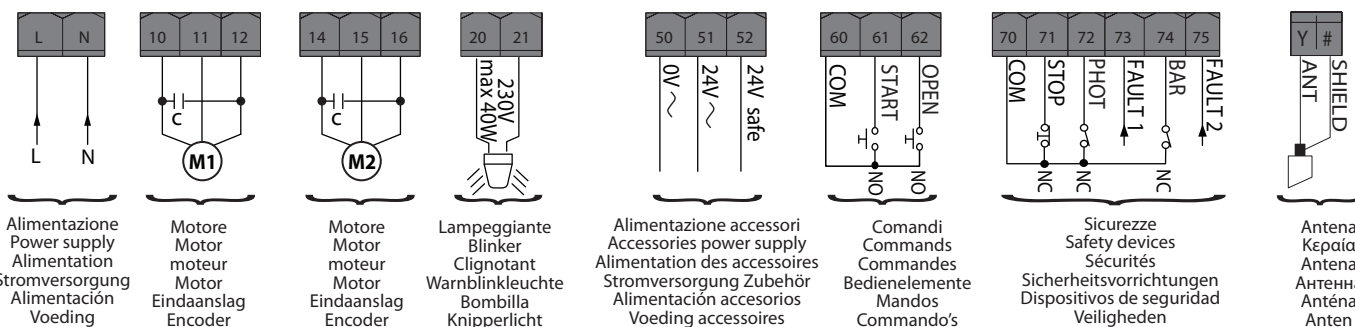


C



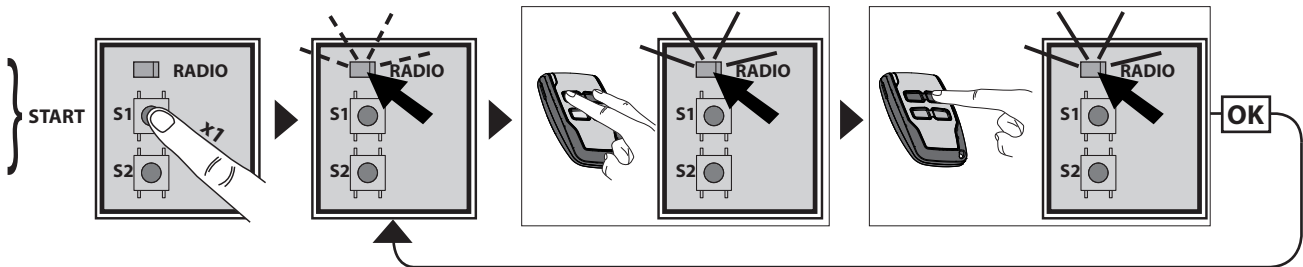
F2 100mAT (~ 230V)
200mAT (~ 120V)

F1 5 AF (~ 230V)
10 AF (~ 120V)



MEMORIZZAZIONE RADIOCOMANDO/MEMORIZING REMOTE CONTROLS/MÉMOIRISATION RADIOCOMMANDE
ABSPEICHERUNG DER FERNBEDIENUNG /MEMORIZACIÓN DEL RADIOMANDO/MEMORIZAÇÃO DO RADIOCOMANDO

D



LEGENDA - KEY - LÉGENDE - LEGENDE - LEYENDA - LEGENDA

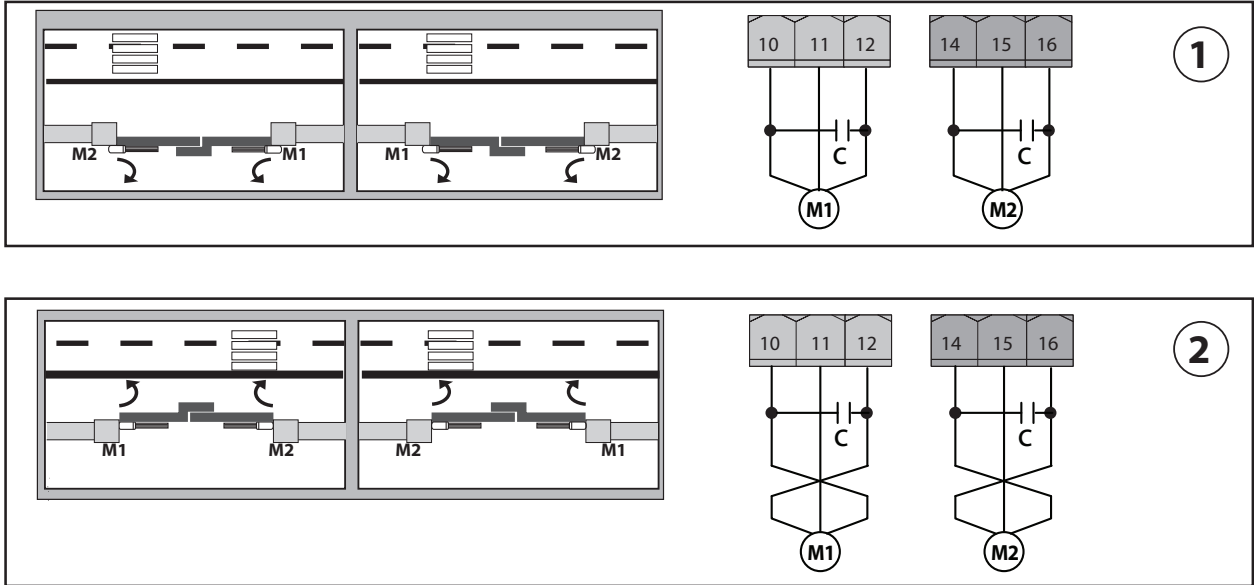


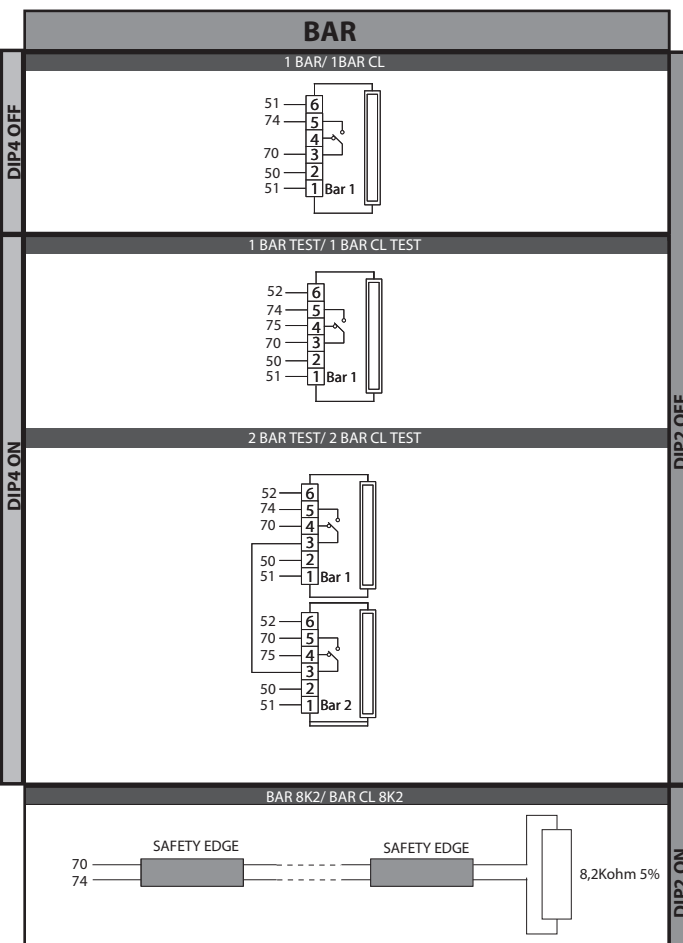
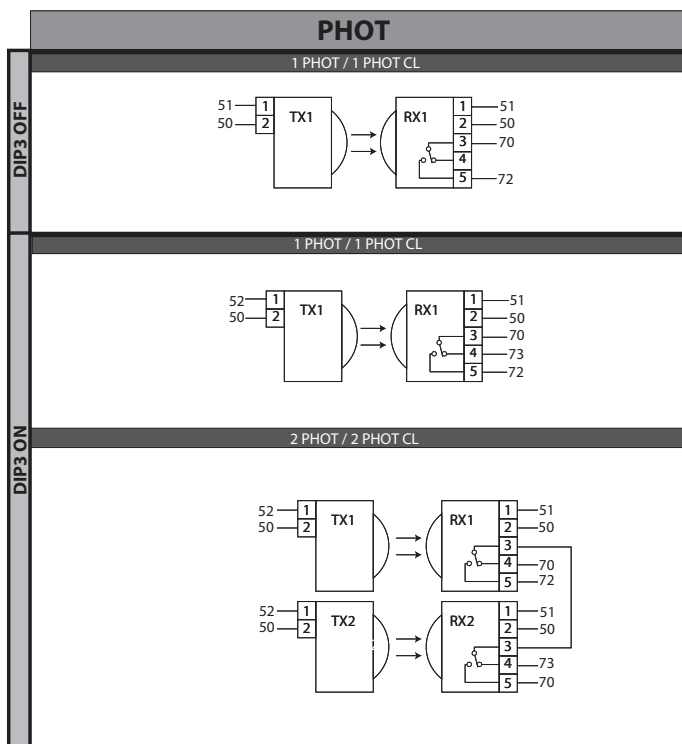
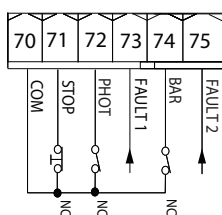
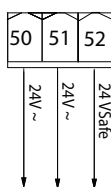
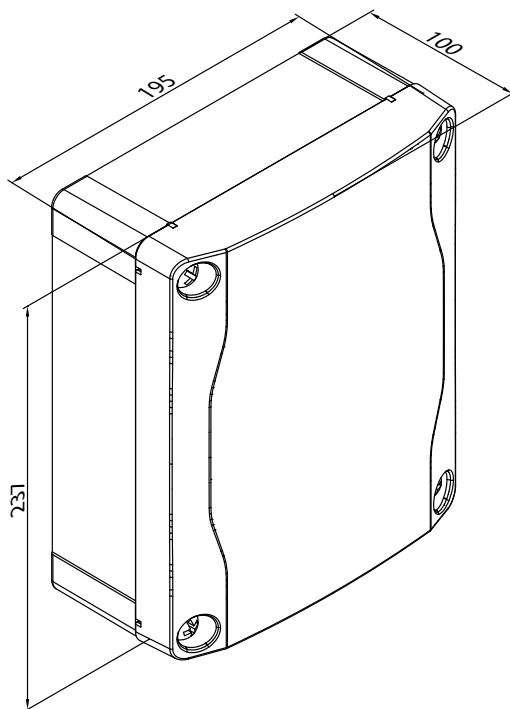
Fisso
Steadily lit
Fixe
Ununterbrochen an
Fijo
Continu



Lampeggio continuo
Continuous flashing
Clignotement continu
Kontinuierliches Blinken
Parpadeo continuo
Continu knippen

E





1) GENERAL INFORMATION

The **ALCOR AC A** control panel comes with standard factory settings. Any change must be set by means of the TRIMMER and DIP SWITCH settings. Its main features are:

- Checking of 2 single phase motors
- Separate inputs for safeties
- Rolling-code in-built radio receiver.

The board has a terminal strip of the removable kind to make maintenance or replacement easier. It comes with a series of prewired jumpers to make the installer's job on site easier. **The jumpers concern terminals: 70-71, 70-72, 70-74. If the above-mentioned terminals are being used, remove the relevant jumpers.**

TESTING

The **ALCOR AC A** panel controls (checks) the start relays and safety devices (photocells) before performing each opening and closing cycle.

If there is a malfunction, make sure that the connected devices are working properly and check the wiring.

2) TECHNICAL SPECIFICATIONS

Power supply	110-120V 50/60Hz 220-230V 50/60 Hz
Panel dimensions	Fig. F
Low voltage/mains insulation	> 2MOhm 500V ---
Operating temperature range	-20 / +50°C
Dielectric rigidity	mains/LV 3750V~ for 1 minute
Accessories power supply	4V~ (demand max. 0,2A)
AUX 0 - Flashing Contact powered	120V~ 40W max 230V~ 40W max
Fuses	Fig. C
Built-in Rolling-Code radio-receiver	frequency 433.92MHz
Setting of parameters and logics	TRIMMER + DIP SWITCH
Max. n° of remotes that can be memorized	63
Maximum power	750W
Maximum work time	90s

Usable transmitter versions:

ALL ROLLING CODE transmitters compatible with ((ER-Ready)).

3) TUBE ARRANGEMENT Fig. A

Install the electrical system referring to the standards in force for electrical systems CEI 64-8, IEC 364, harmonization document HD 384 and other national standards.

4) TERMINAL BOARD WIRING Fig. C

For the electric diagram and the cross section of the cables refer to the manual of the actuator.

Once suitable electric cables have been run through the raceways and the automated device's various components have been fastened at the predetermined points, the next step is to connect them as directed and illustrated in the diagrams contained in the relevant instruction manuals. Connect the live, neutral and earth wire (compulsory).

WARNINGS - When performing wiring and installation, refer to the standards in force and, whatever the case, apply good practice principles. Wires carrying different voltages must be kept physically separate from each other, or they must be suitably insulated with at least 1mm of additional insulation.

Wires must be secured with additional fastening near the terminals, using devices such as cable clamps. All connecting cables must be kept far enough away from dissipaters.

WARNING! For connection to the mains power supply, use a multicore cable with a cross-sectional area of at least 3x1.5mm² of the kind provided for by the regulations in force.

To connect the motors, use a cable with a cross-sectional area of at least 1.5mm² of the kind provided for by the regulations in force.

The cable must be type H05RN-F at least.

5) SAFETY DEVICES

Note: only use receiving safety devices with free changeover contact.

5.1) TESTED DEVICES Fig. G

5.2) CONNECTION OF 1 PAIR OF NON-TESTED PHOTOCELLS FIG. B



WARNING!

The values of the impact force according to EN 12453 are only observed with the use of safety edges (active) connected to the board.

6) MEMORIZING TRANSMITTERS FIG. D

7) REVERSING THE OPENING DIRECTION (Fig.E)

8) ADJUSTMENT PROCEDURE

- Before turning the unit on, check electrical connections.
- Set the following parameters:
Automatic Closing Time,
Phase shift timing while closing
- Set the logics.

WARNING! Incorrect settings can result in damage to property and injury to people and animals.

WARNING! Check that the force of impact measured at the points provided for by standard EN 12445 is lower than the value laid down by

standard EN 12453.

KEYS

KEYS	Description
S1	Add Start Key associates the desired key with the Start command.
S2	Add Pedestrian Key associates the desired key with the pedestrian command.
S2 >5s	Confirms the changes made to parameter settings and operating
S1+S2 >10s	Erase List WARNING! Erases all memorized transmitters from the receiver's memory.

LED INDICATORS:

POWER	Steadily lit: - Mains power on - Board powered - Fuses intact
START	Lit: START input activated
OPEN	Lit: OPEN pedestrian input activated
STOP	Unlit: STOP input activated
PHOT	Unlit: PHOT photocell input activated
FAULT 1	PHOT input safety device test input diagnostics
BAR	Unlit: BAR safety edge input activated
FAULT 2	BAR input safety device test input diagnostics
ERR	Unlit: no error LIT: see error diagnostics table
RADIO (GREEN)	Unlit: remote programming not active Radio LED only flashing: Remote programming active, waiting for hidden key. Flashing in sync with Set LED: Transmitter deletion in progress Lit: remote programming active, waiting for desired key. Lit 1s: Radio receiver channel activated
SET	Lit: see error diagnostics table Flashing in sync with Radio LED: Transmitter deletion in progress

TABLE ERR

		Led ERR		
		Lit	slow flashing	fast flashing
Led SET	Unlit		Photocell test, Costa o Costa 8k2 failed - Check photocell connection and/or logic settings	
	Lit	Reverse due to obstacle - Amperostop - Check for obstacles in path		
	slow flashing	Test hardware card error - Check the connection to the motor - Hardware problems to the card (contact technical assistance)		Changed settings and/or Operating logics press S2 for 5s to confirm.

INSTALLATION MANUAL

	Terminal	Definition	Description			
Power supply	L	LINE	Single-phase power supply			
	N	NEUTRAL				
Motor	10	START + CONDENSER	Motor and condenser connection			
	11	COM				
	12	START + CONDENSER				
	14	START + CONDENSER	Connection between motor and capacitor 2. ⚠ Note: if T3=0 do not connect any cable to clamps 14-15-16			
	15	COM				
	16	START + CONDENSER				
Aux	20	AUX 0 – POWERED CONTACT 230V (N.O.) (40W MAX)	Exit due to FLASHING LIGHT			
	21		Contact stays closed while leaves are operating.			
Accessories power supply	50	0V-	Accessories power supply output.			
	51	24V+				
	52	24 Vsafe+	Tested safety device power supply output (photo cell transmitter and safety edge transmitter). Output active only during operating cycle.			
Commands	60	Common	START and OPEN inputs common			
	61	START	START command button (N.O.). Operation according to “Residential / apartment building operation” logic			
	62	OPEN	OPEN command button (N.O.). Gate opened with this command. If the input stays closed, the leaves stay open until the contact is opened. When the contact is open, the automated device closes following the TCA time, where activated.			
Safety devices	70	Common	STOP, PHOT and BAR inputs common			
	71	STOP	The command stops movement. (N.C.) If not used, leave jumper inserted.			
	72	PHOT (*)	PHOTOCELL input (N.C.). Operation according to “PHOTOCELL/PHOTOCELL DURING CLOSING” logic. If not used, leave jumper inserted.			
	73	FAULT 1	Test input for safety devices connected to PHOT.			
	74	BAR / BAR CL / BAR TEST / BAR CL TEST / BAR 8K2 / BAR CL 8K2 (*)	Safety edge input (N.C.). If not used, leave jumper inserted			
			BAR/8K2 dip	Safety edge check dip	Safety edge operation dip	
			OFF	OFF	OFF	NC input, no verification, reversal while opening and closing (BAR)
			OFF	OFF	ON	NC input, no verification, reversal only when closing, stop when opening (BAR CL)
			OFF	ON	OFF	NC input, with verification, reversal while opening and closing (BAR TEST)
			OFF	ON	ON	NC input, with verification, reversal only when closing, stop when opening (BAR CL TEST)
ON			OFF	OFF	8K2 input, reversal when opening and closing (BAR 8K2)	
ON	OFF	ON	8K2 input, reversal only when closing, stop when opening (BAR CL 8K2)			
75	FAULT 2	Test input for safety devices connected to BAR / BAR CL				
Antenna	Y	ANTENNA	Antenna input.			
	#	SHIELD	Use an antenna tuned to 433MHz. Use RG58 coax cable to connect the Antenna and Receiver. Metal bodies close to the antenna can interfere with radio reception. If the transmitter's range is limited, move the antenna to a more suitable position.			

(*) If "D" type devices are installed (as defined by EN12453), connect in unverified mode, foresee mandatory maintenance at least every six months.

(*) In the European Union, apply standard EN 12453 for force limitations, and standard EN 12445 for measuring method.

TABLE "A" - PARAMETERS

⚠ Any modification of parameters/logics must be confirmed by pressing S2 > 5s

TRIMMER	Parameter	 min.	 max.	 default	Description
T1	Automatic closing time [s]	0	120	0	Waiting time before automatic closing. NOTE: Set to 0 if not used.
T2	Work time [s]	5	90	50%	Adjusts the motors' work time, lapsing which they will stop.
T3	Motor 1 closing delay time [s]	0	25	25%	Motor 1 closing delay time with respect to motor 2. NOTE: set 0 for single motor operations (leaf 1).

TABLE "B" - LOGICS

 Any modification of parameters/logics must be confirmed by pressing S2 > 5s

DIP	Logic	Default	Cross out setting used	Description
1	Transmitter programming	ON	ON	Enables wireless memorizing of transmitters: 1- Press in sequence the hidden key and normal key (T1-T2-T3-T4) of a transmitter that has already been memorized in standard mode via the radio menu. 2- Press within 10 sec. the hidden key and normal key (T1-T2-T3-T4) of a transmitter to be memorized. The receiver exits programming mode after 10 sec.: you can use this time to enter other new transmitters. This mode does not require access to the control panel. IMPORTANT: Enables the automatic addition of new transmitters, clones and replays.
			OFF	Disables wireless memorizing of transmitters and automatic addition of clones. Transmitters are memorized only using the relevant Radio menu or automatically with replays. IMPORTANT: Disables the automatic addition of new transmitters and clones
2	BAR / 8K2	OFF	ON	Input configured as Bar 8k2 (Fig.G). Input for resistive edge 8K2. The command reverses movement for 1 sec.
			OFF	Input configured as Bar, safety edge (Fig.G). The command reverses movement for 1 sec..
3	Photocell input check	OFF	ON	Enable safety check on the PHOT input. (Fig.G)
			OFF	Safety check on PHOT input not enabled. (Fig.G)
4	Edge input check	OFF	ON	Enable safety check on the BAR input. (Fig.G)
			OFF	Safety check on BAR input not enabled. (Fig.G)
5	Photocells during closing	OFF	ON	In the event beam is broken, photocell operation is disabled during opening. During closing, movement is reversed immediately.
			OFF	When beam is broken, photocells are active during both opening and closing. When beam is broken during closing, movement is reversed only once the photocell is cleared.
6	Safety edge input operation	OFF	ON	Safety edge with active reversal only when closing, when opening the movement stops
			OFF	Safety edge with active reversal in both directions
7	Fast closing	OFF	ON	Closes 3 seconds after the photocells are cleared before waiting for the set TCA to elapse.
			OFF	Logic not enabled
8	Residential / apartment building operation	OFF	ON	Sets the automation type of operation: ON = Apartment building
			OFF	OFF = Residential
		OFF	ON	Reaction to the START input (wired or radio):
			OFF	Reaction to the OPEN input (wired):
9	Hammer during opening	OFF	ON	Before opening completely, the gate pushes for approx. 2 seconds as it closes. This allows the solenoid lock to be released more easily. IMPORTANT - Do not use this function if suitable mechanical stops are not in place.
			OFF	Logic not enabled
10	Stop maintenance	OFF	ON	If motors stay idle in fully open or fully closed position for more than one hour, they are switched on in the direction of the stop for approx. 3 seconds. This operation is performed every hour. NB: In hydraulic motors, this function serves to compensate a possible reduction in the volume of oil due to a drop in temperature during extended pauses, such as during the night, or due to internal leakage. IMPORTANT - Do not use this function if suitable mechanical stops are not in place.
			OFF	Logic not enabled

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