

SEA®

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di Apertura Porte e Cancelli
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CE

Italiano

English

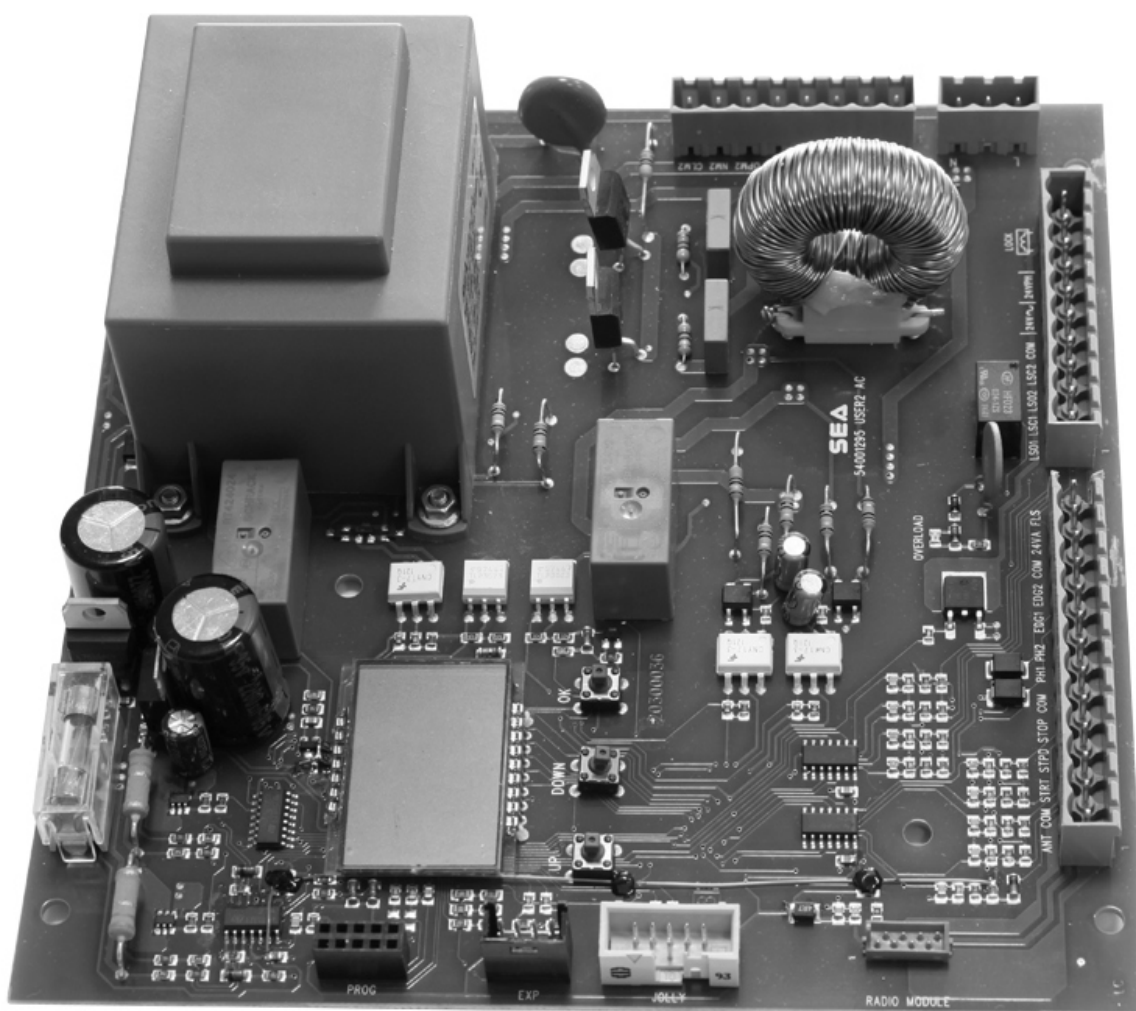
Français

Español

GATE 2 DG R1B

(Cod. 23023025)

CENTRALE ELETTRONICA PER 1 O 2 MOTORI A 230V/115V
ELECTRONIC CONTROL UNIT FOR 1 OR 2 230V/115V MOTORS
ARMOIRE DE COMMANDE POUR 1 OU 2 MOTEURS EN 230V/115V
CENTRAL ELECTRÓNICA PARA 1 O 2 MOTORES A 230V/115V



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COMPONENTS

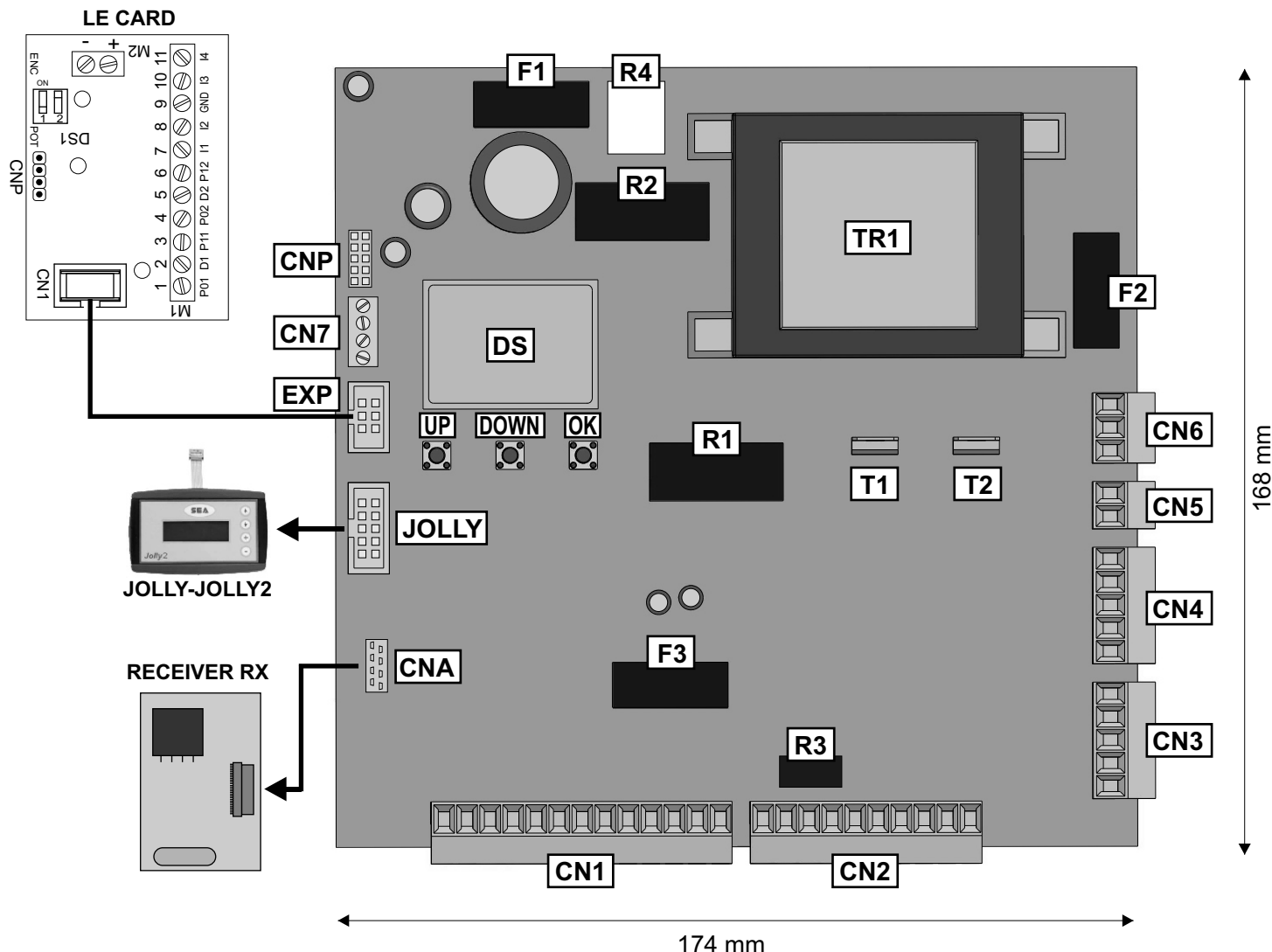
TECHNICAL SPECIFICATIONS

Control unit power supply: 230 Vac 50/60 Hz - 115Vac 50/60 Hz

Absorption in stand by: 30 mA

Environment temperature : -20°C / +50°C

Specifications of external enclosure: 325,7 X 246 X 140



CN1 = Input/output connectors

CN2 = Limit switch, 24V~, Electrolock connector

CN3 = M1 Motors and capacitors connector

CN4 = M2 motors and capacitors connector

CN5 = Courtesy light output connector

CN6 = Power supply connector

CN7 = Encoder connector

CNA = RX Receiver connector

CNP = Porgramming connector

EXP = Expansion module connector / LE Card

JOLLY = Jolly and Jolly 2 connector

DS = Programming display

OK = Programming button

DOWN = Programming button

UP = Programming button

T1 = Motors piloting Triac

T2 = Motors piloting Triac

R1 = Motors comand relay

R2 = Courtesy light comand relay

R3 = Photocell autotest relay

R4 = Electrolock relay

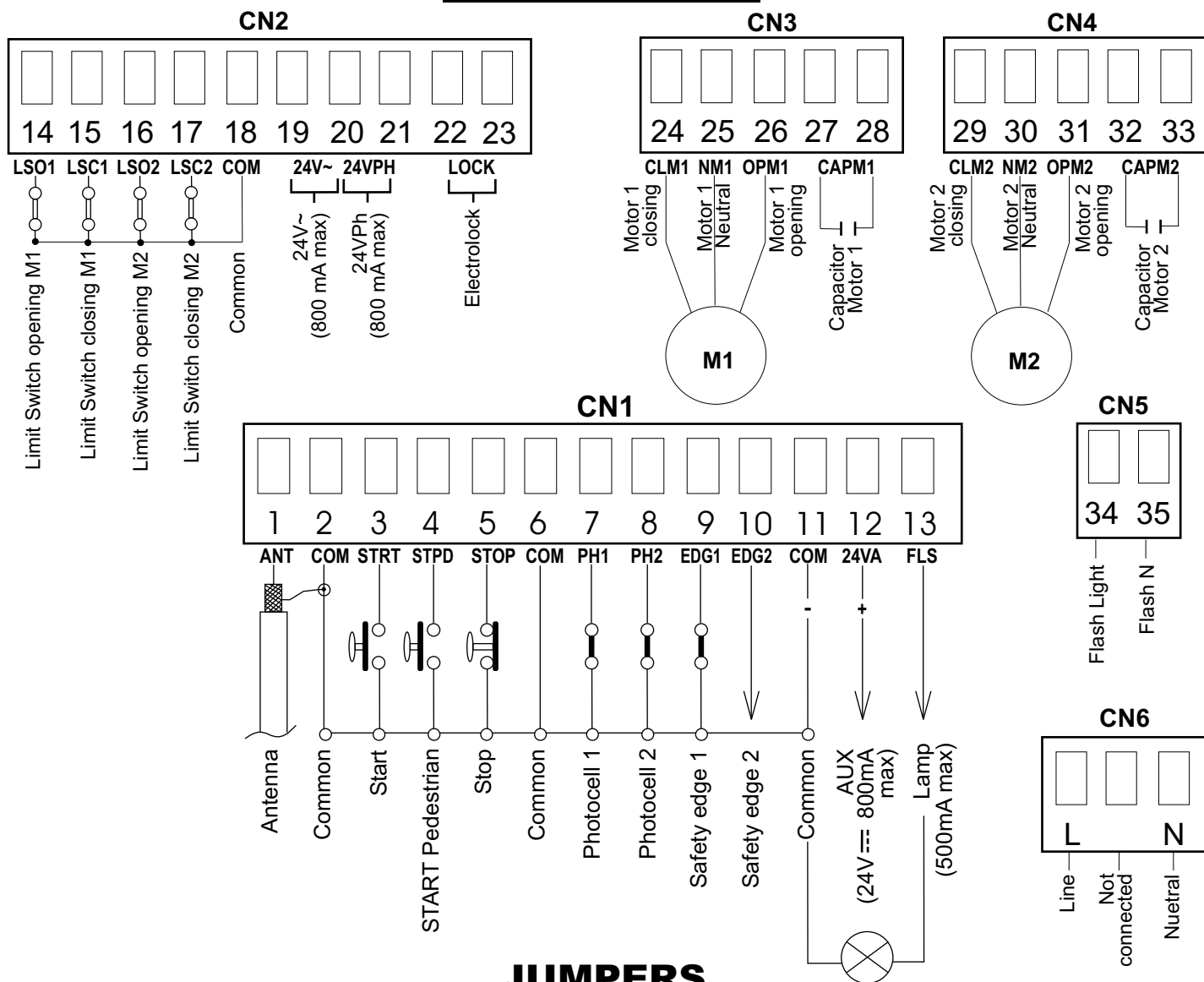
F1 = Accessories 1A fuse

F2 = 6.3AT fuse on 230V/10AT on 115V

F3 = 6.3A Electrolock fuse

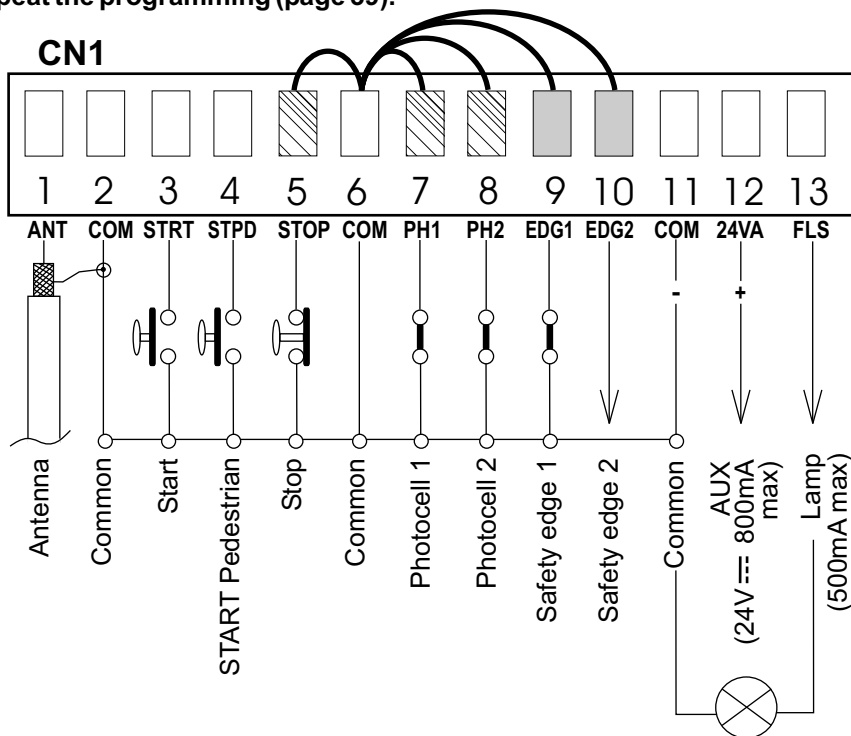
TR1 = Power transformer

CONNECTIONS



JUMPERS

WARNING: The control unit is designed with the automatic detection of not used N.C. inputs (Photocells, Stop and Limit switch) except the SAFETY EDGE input. The exclude inputs in self-programming can be restored in the "Check inputs" menu without need to repeat the programming (page 39).



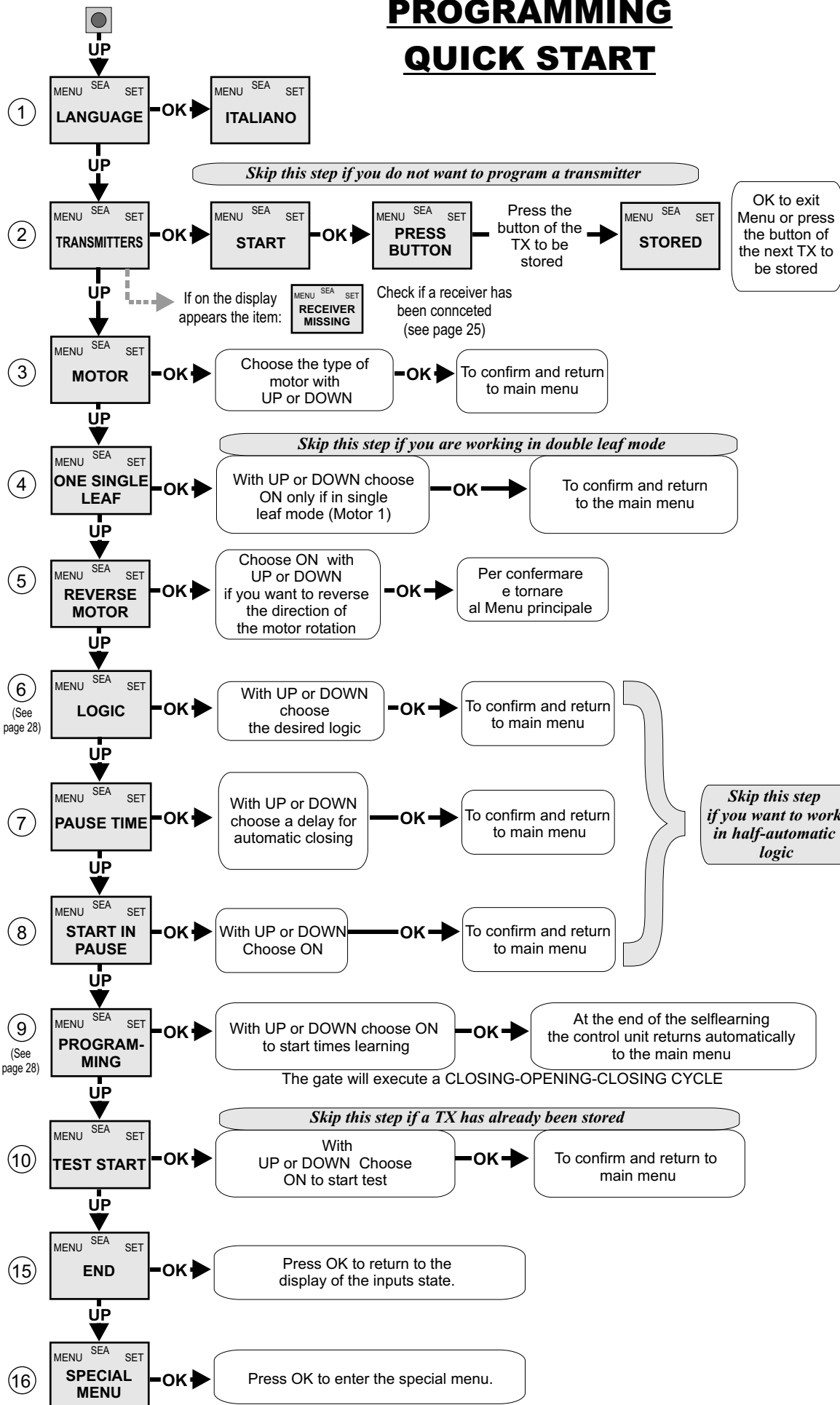
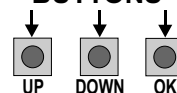
 Obligatory jumper without accessory connection.

 Optional

The herein reported functions are available starting from revision 37, on R1B versions only.

PROGRAMMING QUICK START

PROGRAMMING BUTTONS



ALL OTHER PARAMETERS HAVE DEFAULT SETTINGS WHICH ARE USEFUL FOR THE 90% OF THE APPLICATIONS BUT CAN BE HOWEVER SET THROUGH THE SPECIAL MENU. FOR ENTERING INTO THE SPECIAL MENU MOVE ON ONE OF THE MENU AND PRESS THE UP AND DOWN BUTTONS AT THE SAME TIME FOR 5 S.



MENU FUNCTIONS TABLE GATE 2 DG R1B

MENU	SET	Description	Default	Set value
1 - LANGUAGE	<i>Italiano</i>	Italian	<i>Italiano</i>	
	<i>English</i>	English		
	<i>Français</i>	French		
	<i>Español</i>	Spanish		
	<i>Dutch</i>	Olandese		
2 - TRANSMITTERS	<i>Start</i>	Start	<i>Start</i> <i>Pedestrian Start</i>	
	<i>Pedestrian Start</i>	Pedestrian Start		
	<i>External module</i>	External module		
	<i>Stop</i>	Stop		
	<i>Unloch</i>	Storing of a command for unlocking an electric brake		
	<i>Delete a transmitter</i>	Delete single transmitter		
	<i>Clear memory</i>	Delete transmitter memory		
	<i>End</i>	"Transmitters" menu output		
3 - MOTOR	<i>Hydraulic</i>	Hydraulic	<i>Mechanic</i>	
	<i>Sliding</i>	Sliding		
	<i>Reversible sliding gate</i>	Reversible sliding gate		
	<i>Mechanic</i>	Mechanic		
4 - ONE SINGLE LEAF *	<i>Off</i>	Disabled	<i>Off</i>	
	<i>On</i>	In ON activates single leaf mode (Motor 1)		
5 - REVERSE MOTOR	<i>Off</i>	In On reverses the opening with the closing and / or vice versa.	<i>Off</i>	
	<i>On</i>			
6 - LOGIC (See page 30)	<i>Automatic</i>	Automatic	<i>Automatic</i>	
	<i>Open-stop-close-stop-open</i>	Step by step type 1		
	<i>Open-stop-close-open</i>	Step by step type 2		
	<i>2 buttons</i>	Two buttons		
	<i>Safety</i>	Safety		
	<i>Dead man</i>	Dead man		
7 - PAUSE TIME	<i>Off</i>	OFF (semi-automatic logics)	<i>Off</i>	
	<i>1 240</i>	Setting from 1s to 4min.		
8 - START IN PAUSE	<i>Off</i>	In pause start is not accepted	<i>Off</i>	
	<i>On</i>	In pause start is accepted		
9 - PROGRAMMING (See page 29)	<i>Off On</i>	Times learning start	<i>Off</i>	
10 - TEST START	<i>Off On</i>	Start command	<i>Off</i>	
15 - END	Press OK to return to the display of the firmware version and to the one of inputs state.			
16 - SPECIAL MENU	Press OK to enter the special menu.			

Note 1: The * indicates that the default value or the menu may change depending on the selected motor type.

WORKING TIMES SELF LEARNING

The control unit is pre-set with the default settings, to start the control unit with the DEFAULT settings just keep pressed the UP and DOWN buttons at the same time power supplying the control unit the display shows the message *In It.*
The DEFAULT settings are shown in the Menues table.

WORKING TIMES SELFLEARNING THROUGH IMPULSES

ATTENTION: This procedure is potentially dangerous and should only be performed by qualified people in safety conditions.

NOTE: The card is preset with the standard working times, therefore the automation can be started even without the times programming, simply by adjusting the timing on the display (see default times).

- 1) Turn off electricity, release the motors and manually position the leaves on halfway.
Reset the mechanical lock.
- 2) Connect the control board to the power supply
- 3) Select on the on-board display or JOLLY programmer, the type of motor that you are using as indicated in the display management ("*Mechanic*" - "*Electrohydraulic*", etc).
- 4) If necessary also set the operation logic and the other parameters. If you want to program with a transmitter, store a transmitter before programming.
- 5) Select 9-PROGRAMMING on the display, press OK and than one of the UP or DOWN buttons.
(If the motor starts in opening, remove and re-put power supply, select on the display 5-REVERSE MOTOR. And through the UP and DOWN button put it on ON, or if you have the Jolly programmer, activate the motor exchange function.)
- 6) At this point the gate will start the following cycle: CLOSING M2 - CLOSING M1 - OPENING M1 - OPENING M2 - CLOSING M2 - CLOSING M1. During cycle, to store the respective stops, press UP or DOWN or START at every point of stop of the leaf.
- 7) The self-learning is done.

SELFLEARNING OPERATION TIME WITH ENCODER / POTENTIOMETER

When an encoder is installed, it is necessary to select ON in the 32-ENCODER menu, when the potentiometer is installed, it is necessary to select "*Potentiometer*" in the 32-ENCODER menu. Start programming and make sure that leaf 2 starts as first in closing. The gate will automatically execute the following cycle: CLOSING M2 - CLOSING M1 - OPENING M1 - OPENING M2 - CLOSING M2 - CLOSING M1.

Note: For stop detection sensitivity setting refer to the special menu.

SELFLEARNING OPERATION TIME WITH AMPEROMETRIC SENSOR

(For electromechanical motors only)

The times learning can be done only on electromechanical gates, taking advantage of the automatic detection of the stops.

Once the programming has been started just make sure that the gate executes the following cycle: CLOSING M2 - CLOSING M1 - OPENING M1 - OPENING M2 - CLOSING M2 - CLOSING M1.

Note: For stop detection sensitivity setting refer to the special menu.

LEARNING WITH LIMIT SWITCH

When limit switches are mounted, the gate executes automatically the following cycle: CLOSING M2 - CLOSING M1 - OPENING M1 - OPENING M2 - CLOSING M2 - CLOSING M1.

Before starting the learning, make sure (through the test menu), that the relative limit switches of every leaf and every opening are employed.

Exe: For the M2 motor closing the limit switch M2 in closing must be employed.

FUNCTION LOGIC

AUTOMATIC LOGIC

A start impulse opens the gate. A second impulse during the opening will not be accepted.

A start impulse during closing reverses the movement.

NOTE 1: To have the automatic closing it is necessary to set a pause time, otherwise all the logic will be semi-automatic.

NOTE2: It is possible to choose, whether to accept or not, the start in pause, selecting in the MENU the item 8-STARTIN PAUSE and choosing ON or OFF. By default, the parameter is OFF.

SECURITY LOGIC

A start impulse opens the gate. A second impulse during opening reverses the movement.

A start impulse during closing reverses the movement.

NOTE 1: To have the automatic closing it is necessary to set a pause time, otherwise all the logic will be semi-automatic.

NOTE2: It is possible to choose, whether to accept or not, the start in pause, selecting in the MENU the item 8-STARTIN PAUSE and choosing ON or OFF. By default, the parameter is OFF.

STEP BY STEP TYPE 1 LOGIC

The start impulse follows the OPEN-STOP-CLOSE-STOP-OPEN logic.

NOTE 1: To have the automatic closing it is necessary to set a pause time, otherwise all the logic will be semi-automatic.

NOTE2: It is possible to choose, whether to accept or not, the start in pause, selecting in the MENU the item 8-STARTIN PAUSE and choosing ON or OFF. By default, the parameter is OFF.

STEP BY STEP TYPE 2 LOGIC

The start impulse follows the OPEN-STOP-CLOSE -OPEN logic.

NOTE 1: To have the automatic closing it is necessary to set a pause time, otherwise all the logic will be semi-automatic.

NOTE2: It is possible to choose, whether to accept or not, the start in pause, selecting in the MENU the item 8-STARTIN PAUSE and choosing ON or OFF. By default, the parameter is OFF.

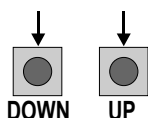
DEAD MAN LOGIC

The gate opens as long as the **START** button of opening is pressed; releasing it the gate stops. The gate closes as long as the button connected to the **PEDESTRIAN START** is pressed; releasing it the gate stops. To execute complete opening and/or closing cycles the related pushbuttons must be constantly pressed.

2 PUSHBUTTONS LOGIC

One start opens, one pedestrian start closes. In opening the closing will not be accepted. In closing a start command reopens, a pedestrian start command (closes) will be ignored.

SPECIAL MENU



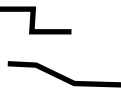
**PRESS AT THE SAME TIME FOR 5 SECONDS TO ENTER OR TO EXIT THE SPECIAL MENU
OR ACCESS THROUGH THE MENU '16**

SPECIAL MENU FUNCTIONS TABLE GATE 2 DG R1B

For entering into the special menu move on one of the menu and press the UP and DOWN buttons at the same time for 5 s. For exiting the special menu press END or move on one of the menu and press the UP and DOWN buttons at the same time for 5 s.

MENU SP	SET	Description	Default	Set value
26 - LEAF DELAY IN OPENING *	Off 6	Setting from OFF to 6 seconds	1,5	
27 - LEAF DELAY IN CLOSING *	Off 20	Setting from OFF to 20 seconds	2,5	
28 - OPENING TORQ 1 *	10 100	M1 opening torque Note: with hydraulic motors the torque will be on 100%	75	
29 - CLOSING TORQ 1 *	10 100	M1 closing torque Note: with hydraulic motors the torque will be on 100%	75	
30 - OPENING TORQ 2 *	10 100	M2 opening torque Note: with hydraulic motors the torque will be on 100%	75	
31 - CLOSING TORQ 2 *	10 100	M2 closing torque Note: with hydraulic motors the torque will be on 100%	75	
32 - ENCODER *	On	In ON enables the Encoder, in OFF it's disabled	Off	
47 - ENCODER PAR.1 *	xxx.	Encoder impulses during operation (Motor 1).		
48 - ENCODER TOT.1 *	xxx.	Encoder impulses stored in programming (Motor 1).		
49 - ENCODER PAR.2 *	xxx.	Encoder impulses during operation (Motor 2).		
50 - ENCODER TOT.2 *	xxx.	Encoder impulses stored in programming (Motor 2).		
32 - ENCODER *	Potentiometer	Enables the reading of the potentiometer with LE card.	Off	
51 - I.PAR.M1 *	-----	Reports the current position of the potentiometer on the leaf of motor 1. This parameter is useful for seeing if the potentiometer is read correctly.		
52 - I.AP.M1 *	-----	Reports the impulses stored by the control unit when the leaf of motor 1 is fully open.		
53 - I.CH.M1 *	-----	Reports the impulses stored by the control unit when the leaf of motor 1 is fully close.		

MENU SP		SET	Description	Default	Set value
	54 - I.PAR.M2 *	-----	Reports the current position of the potentiometer on the leaf of motor 2. This parameter is useful for seeing if the potentiometer is read correctly.		
	55 - I.AP.M2 *	-----	Reports the impulses stored by the control unit when the leaf of motor 2 is fully open.		
	56 - I.CH.M2 *	-----	Reports the impulses stored by the control unit when the leaf of motor 2 is fully close.		
32 - ENCODER *		Off	In ON enables the Encoder, in OFF it's disabled	Off	
	65 - OPENING TIME MOTOR1	xxx.s	Indicates the working times selflearning in opening and closing (Motor 1). With UP or DOWN it is possible to increase or reduce the working times.		
	66 - CLOSING TIME MOTOR1	xxx.s			
	67 - OPENING TIME MOTOR2	xxx.s	Indicates the working times selflearning in opening and closing (Motor 2). With UP or DOWN it is possible to increase or reduce the working times.		
	68 - CLOSING TIME MOTOR2	xxx.s			
33 - OPENING SENSITIVITY MOTOR1		10% (Fast intervention) 99% (Slow intervention)	Adjusts the intervention time of the Encoder / Potentiometer on Motor 1 in opening	Off	
		Off (Intervention excluded)	Disabled		
34 - CLOSING SENSITIVITY MOTOR1		10% (Fast intervention) 99% (Slow intervention)	Adjusts the intervention time of the Encoder / Potentiometer on Motor 1 in closing	Off	
		Off (Intervention excluded)	Disabled		
35 - OPENING SENSITIVITY MOTOR2 *		10% (Fast intervention) 99% (Slow intervention)	Adjusts the intervention time of the Encoder / Potentiometer on Motor 2 in opening	Off	
		Off (Intervention excluded)	Disabled		
36 - CLOSING SENSITIVITY MOTOR2 *		10% (Fast intervention) 99% (Slow intervention)	Adjusts the intervention time of the Encoder / Potentiometer on Motor 2 in closing	Off	
		Off (Intervention excluded)	Disabled		
37 - SLOW DOWN SENSITIVITY *		10% (Fast intervention) 99% (Slow intervention)	Adjusts the amperometric sensitivity in slowdown. Active only if the motors are electromechanical.	Off	
		Off (Intervention excluded)	Disabled		

MENU SP	SET	Description	Default	Set value
38 - POT. THRESHOLD OPENING 1 *	1 100	Adjusts the threshold of the potentiometer intervention. The parameter self-determines in learning but can also be adjusted later. The lower the value, the slower will be the response of the potentiometer. The parameter can be set as maximum threshold at the value read on the DEBUG VPI, VP2 menu.		
39 - POT. THRESHOLD CLOSING 1 *				
40 - POT. THRESHOLD OPENING 2 *				
41 - POT. THRESHOLD CLOSING 2 *				
42 - POT. SLOWDOWN THRESHOLD OPENING1 *	1 100	Adjust the threshold of the potentiometer in slowdown. By default this value is set on 1 and can be increased manually up to the maximum value read on the DEBUG VPI, VP2 menu.		
43 - POT. SLOWDOWN THRESHOLD CLOSING1 *				
44 - POT. SLOWDOWN THRESHOLD OPENING 2 *				
45 - POT. SLOWDOWN THRESHOLD CLOSING 2 *				
46 - INVERSION	0 2000	Allows you to adjust the inversion space calculated in pulses.	500	
	Normal	In case of inversion on obstacle in opening the gate partially reverses, in closing it reopens completely and if a pause time has been set it attempts to reclose for three times.		
59 - OPENING SLOWDOWN 1	Off 50	From OFF to 50% of the stroke	20	
60 - CLOSING SLOWDOWN 1	Off 50	From OFF to 50% of the stroke	20	
61 - OPENING SLOWDOWN 2 *	Off 50	From OFF to 50% of the stroke	20	
62 - CLOSING SLOWDOWN 2 *	Off 50	From OFF to 50% of the stroke	20	
63 - DECELERATION	0 %  100%	Adjust the passage between normal speed and slowdown speed	100%	
64 - ACCELERATION	0 %  100%	Acceleration ramp. Adjusts the motor start.	100%	
69 - ANTI OVERLAP *	Off	Desactivate the leaves anti-overlapping control, allowing separate control of the two leaves.	Off	
	On	Activate the leaves anti-overlapping control		
70 - OPENING POSITION RECOVERY	0 20	Retrieves the inertia of the motor in opening after Stop or reversing	1	

MENU SP	SET	Description	Default	Set value
71 - CLOSING POSITION RECOVERY	0 20	Retrieves the inertia of the motor in closing after Stop or reversing	1	
72 - OPENING TOLERANCE MOTOR1	0 100	Adjust the tolerance between stop and obstacle M1 opening	0	
73 - CLOSING TOLERANCE MOTOR1	0 100	Adjust the tolerance between stop and obstacle M1 closing	0	
74 - OPENING TOLERANCE MOTOR2 *	0 100	Adjust the tolerance between stop and obstacle M2 opening	0	
75 - CLOSING TOLERANCE MOTOR2 *	0 100	Adjust the tolerance between stop and obstacle M2 closing	0	
76 - PUSHING STROKE	Off 3	Facilitates the unlocking of the electrolock	Off	
77 - LOCK TIME	Off 5	Sets the lock release time from 0 to 5 s	1	
78 - LOCK	Only opening	Active only before opening	Only opening	
	Only closing	Active only before closing		
	Opening and closing	Active before opening and closing		
79 - ANTI INTRUSION	Only opening	If you force the gate manually, the control unit starts the motor to restore the state of the gate before forcing only if limit switch is present	Off	
	Only closing			
	Opening and closing			
	Off			
80 - PUSHOVER *	Off	Allows the leaf to make an extra move at maximum torque to ensure the tightening.	Off	
	Opening and closing			
	Only opening			
	Only closing			
81 - PERIODICAL PUSHOVER *	Off 8	Allows the repetition of the Pushover function at a distance of time adjustable from 0 to 8 hours at hourly intervals	Off	
82 - MOTOR RELEASE *	Off	Disabled	0.1	
	0.1 3.0 s	Setting from 1 to 3 s. At the end of closing the motor re-opens for the set time.		
83 - EXTRA TIME	0.0 s 10 s	If limit switches are present it adds an extra time to the movement of the motors after the reading of the limit switches.	0.0 s	
84 - BRAKE *	- - - -	Adjusts the braking on the limit switches	0	
85 - PREFLASHING	Only closing	Pre-flashing only active before closing	Off	
	0.0 5.0 s	Pre-flashing time		
86 - FLASHING LIGHT	Normal	Normal	Normal	
	Light	Control lamp		
	Always	Always ON		
	Buzzer	Buzzer		

MENU SP	SET	Description	Default	Set value
87 - FLASHING LIGHT AND TIMER	Off	The flashing light remains OFF with the active timer and open gate	Off	
	On	The flashing light remains ON with active timer and open gate		
88 - COURTESY LIGHT	1 240	Courtesy light setting from 1s to 4min.	20	
	In cycle	Courtesy light in cycle		
89 - TRAFFIC LIGHT RESERVATION	Off on	When setting this function the pedestrian input will be activated to work on the auxiliary board SEM (traffic light management).	Off	
90 - PEDESTRIAN OPENING	20 100	Setting from 20 to 100	100	
91 - PEDESTRIAN PAUSE	= Start	Pause in pedestrian opening same as in total opening	= Start	
	Off	Disabled		
	1 240	Setting from 1s to 4 min.		
92 - TIMER	Off	Transforms the selected input in an input on which to connect an external clock.	Off	
	On photo2			
	On pedestrian entry			
94 - 24V AUX	Always	AUX output always power supplied	Always	
	In cycle	AUX output active only during cycle		
	Opening	AUX output power supplied only during opening		
	Closing	AUX output power supplied only during closing		
	In pause	AUX output power supplied only during pause		
	Positive brake management	Positive Electrobrake		
	Negative brake management	Negative Electrobrake		
	Negative brake management - photocellule	Negative electrobrake not active on intervention of the photocell.		
	Gate open warning light	1 flash per sec. in opening 2 flashes per sec. in closing Steady lit in Stop or Open.		
95 - FOTOTEST	Photo1	Auto-test active only on Photo1	Off	
	Photo2	Auto-test active only on Photo2		
	Photo1-2	Auto-test active on Photo1 and Photo2		
	Off	Disabilitato		
96 - EDGE AUTOTEST	Edge1	Test enabled on edge 1	Off	
	Edge2	Test enabled on edge 2		
	Edge1-2	Test enabled on edge 1 and 2		
	Off	Disabled		

MENU SP	SET	Description	Default	Set value
97 - PHOTO1	<i>Closing</i>	Photocell active in closing	<i>Closing</i>	
	<i>Opening and closing</i>	Active in opening and closing		
	<i>Stop</i>	Photocell active before opening		
	<i>Stop and close</i>	The photocell stops in closing and closes when released		
	<i>Close</i>	The photocell gives a command to close during opening, pause and closing		
	<i>Pause reload</i>	The photocell charging the pausing time		
	<i>Delay pause time</i>	If the photocell is occupied during opening, pause or closing, the gate reopens completely and closes without observing the pause time.		
98 - PHOTO2	<i>Closing</i>	Photocell active in closing	<i>Opening</i>	
	<i>Opening and closing</i>	Active in opening and closing		
	<i>Stop</i>	Photocell active before opening		
	<i>Stop and close</i>	The photocell stops in closing and closes when released		
	<i>Close</i>	The photocell gives a command to close during opening, pause and closing		
	<i>Pause reload</i>	The photocell charging the pausing time		
	<i>Delay pause time</i>	If the photocell is occupied during opening, pause or closing, the gate reopens completely and closes without observing the pause time.		
100 - EDGE1	<i>Normal</i>	Normal N.C. contact	<i>Normal</i>	
	<i>8K2</i>	Edge is active and protected by a 8k2 resistor		
101 - EDGE2	<i>Normal</i>	Normal N.C. contact	<i>Normal</i>	
	<i>8K2</i>	Edge is active and protected by a 8k2 resistor		
102 - EDGE1	<i>Opening and closing</i>	Active in opening and closing	<i>Opening and closing</i>	
	<i>Only opening</i>	Active only in opening		
	<i>Only closing</i>	Active only in closing		
103 - EDGE2	<i>Opening and closing</i>	Active in opening and closing	<i>Opening and closing</i>	
	<i>Only opening</i>	Active only in opening		
	<i>Only closing</i>	Active only in closing		

MENU SP	SET	Description	Default	Set value
104 - SELECT LIMIT SWITCH	<i>Automatic</i>	Limit switch in automatic recognition	<i>Automatic</i>	
	<i>Only opening</i>	Only limit switch in opening present		
	<i>Only closing</i>	Only limit switch in closing present		
	<i>Motor internal</i>	To be activated if there is a limit switch that stops the motor phase		
	<i>Ext</i>	Limit switch connected on Four limit switch interface card		
106 - DIAGNOSTICS	<i>1 10</i>	Shows last event (See alarms table)		
107 - MAINTENANCE CYCLES	<i>100 10E4</i>	Setting from 100 to 100000	<i>10E4</i>	
108 - PERFORMED CYCLES	<i>0 10E9</i>	Reports the executed cycles. Keep pressed OK to reset the cycles	<i>0</i>	
109 - THERMOMETER	<i>On Off</i>	In ON you can insert the piston oil temperature probe combined with the LE card.	<i>Off</i>	
112 - PASSWORD	<i>----</i>	Allows the entering of a password blocking the control unit parameters modification.	<i>----</i>	
120 - BASIC MENU	Press OK to exit the special menu. The special menu switches off automatically after 20 minutes.			

Note 1: The * indicates that the default value or the menu may change depending on the selected motor type.

Note 2: After initialization the parameters "motor type" and "limit switch type" remain on the value chosen in the setup program.

POTENTIOMETER MANAGEMENT (Position Gate)

(Available only on GATE 2 DG R1B)

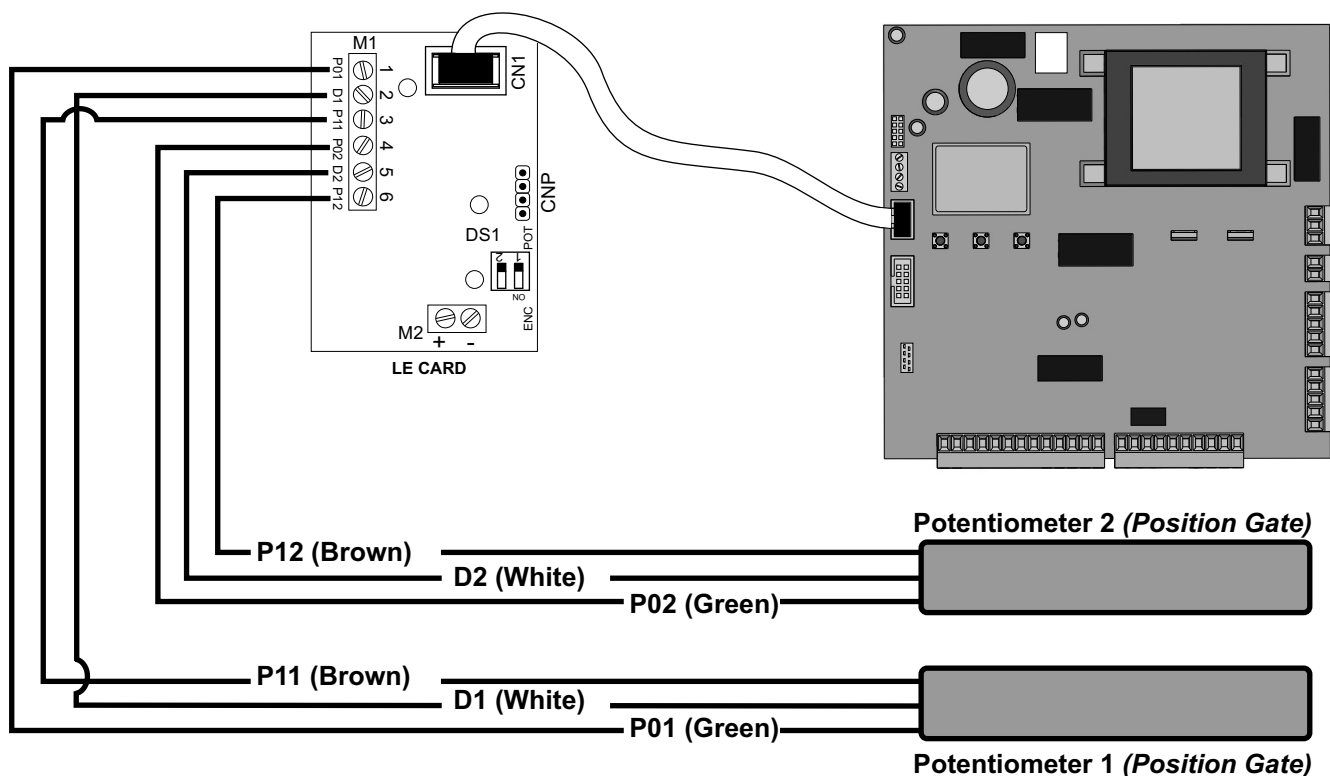
To connect the potentiometer you must use the LE card (Cod.23001256) and set with Dip Switches 1 and 2 both in OFF. With the potentiometer it is possible to access the hidden DEBUG menu to check the maximum settable value as threshold in normal and slowdown speed.

To access this menu you have to press, in the menu that displays the firmware version, UP and OK at the same time until the menus VP1 speed of potentiometer 1 and VP2 speed of potentiometer 2 will appear.

To view the speed of the potentiometer on the related menu, press OK.

To exit the DEBUG menu go to END and press OK.

If the reading of the potentiometer is reversed relative to the movement of the motor, on the display will appear the alarm "Potentiometer direction" and you will have to reverse the brown wire with the green one and repeat programming.



PASSWORD ENTERING MANAGEMENT

With a new control unit all menus can be displayed and set and the password will be disabled.

Selecting one of the Menus and keeping UP and DOWN pressed at the same time for 5 seconds, you will access the SP Menu containing the 112-PASSWORD Submenu.

Pressing OK in the 112-PASSWORD Menu, you will proceed with the entering of the numeric code of the 4-digit password.

Use UP and DOWN to increase or decrease the number, press OK to confirm it and you will pass automatically to the entering of the next number. Pressing OK after the last entered number the word "Sure?" appears, confirm the activation of the password and the message OK appears, pressing UP or DOWN instead you can cancel the operation and "No operation" will appear on the display.

Once entered the password, it will be definitively activated, once the display switch off timeout has expired, or by turning off and on again the control unit. Once the password has been activated, the menus of the display can be only displayed but not set. To unlock them you must enter the correct password in the 112-PASSWORD menu, if the password is wrong the message "Error" will appear.

At this point, if the password has been entered correctly, the menus will be unlocked and it will be possible to change the parameters of the control unit again.

If the control unit has been unlocked through 112-PASSWORD Menu, it is possible to enter a new and different password, using the same entering process as for the first one; at this point, the old password will no longer be valid.

If the password has been forgotten, the only way to unlock the control unit is to contact the SEA technical assistance, which will assess whether to provide the procedure to unlock the control unit or not.

Note: The password cannot be set through the Jolly or Jolly 2 terminal.

MENU FOR INPUT CHECK

The settings of the control unit are made through the UP, DOWN and OK buttons. The UP and DOWN buttons to scroll through the MENUS and SUBMENUS. By pressing OK you enter from MENU into SUBMENU and confirm the choice.

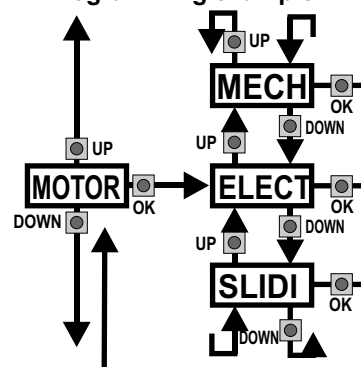
Moving in the 1-LANGUAGE menu pressing the UP and DOWN buttons at the same time you access the SP MENU for special settings.

Moving in the 1-LANGUAGE menu pressing the OK button for 5 seconds, you enter the CHECK MENU, where you can check the operating status of all inputs.

Initial system

U.022 Software Version

Programming example



MENU FUNCTION TABLE CHECK GATE 2 DG R1B INPUTS

To access the Menu for input check keep pressed OK for about 5 seconds.

MENU			Description	Description
START			Start test	The contact must be a N.O. Contact . When activating the related command on the display SET lights up, the input works. If SET is always on, check the wirings.
STOP		Enabled	Stop test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact
		Blocked		
PEDESTRIAN START			Pedestrian start test	The contact must be a N.O. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, check the wirings.
EDGE1		Enabled	Safety edge1 test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact
		Blocked		
EDGE2		Enabled	Safety edge2 test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact
		Blocked		
PHOTO1		Enabled	Photocell 1 test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact
		Blocked		
PHOTO2		Enabled	Photocell 2 test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact
		Blocked		
LIMIT SWITCH OPENING 1			M1 Opening limit switch test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. contact or that the related limit switch is not occupied.
LIMIT SWITCH CLOSING 1			M1 Closing limit switch test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact or that the related limit switch is not occupied.
LIMIT SWITCH OPENING 2			M2 Opening limit switch test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. contact or that the related limit switch is not occupied.
LIMIT SWITCH CLOSING 2			M2 Closing limit switch test	The contact must be a N.C. Contact. When activating the related command on the display SET lights up, the input works. If SET is always on, make sure that the contact is a N.C. Contact or that the related limit switch is not occupied.
END			Exit menu	

Note: If the **Stop**, **Photocell 1** and **Photocell 2**, **Edge 1** and **Edge 2** contacts are not bridged in self-learning, they will be deactivated and can be reactivated through this menu, without repeating times self-learning.

RADIO TRANSMITTER SELF LEARNING WITH RECEIVER ON BOARD OF CONTROL UNIT



WARNING: Make the radio transmitters programming before you connect the antenna and insert the receiver into the special CMR connector (if available) with turned off control unit.

With RF UNI and RF UNI PG module it will be possible to use both Coccinella Roll Plus transmitters and radio transmitters with fixed code. The first memorized radio transmitter will determine the type of the remaining radio transmitters.

If the receiver is a **Rolling Code**, press twice the button of the radio transmitter that you want to program to memorize the first TX.

In the case of **transmitters with fixed code** it is necessary to press **1 time** the button of the transmitter you want to program to store the first remote control

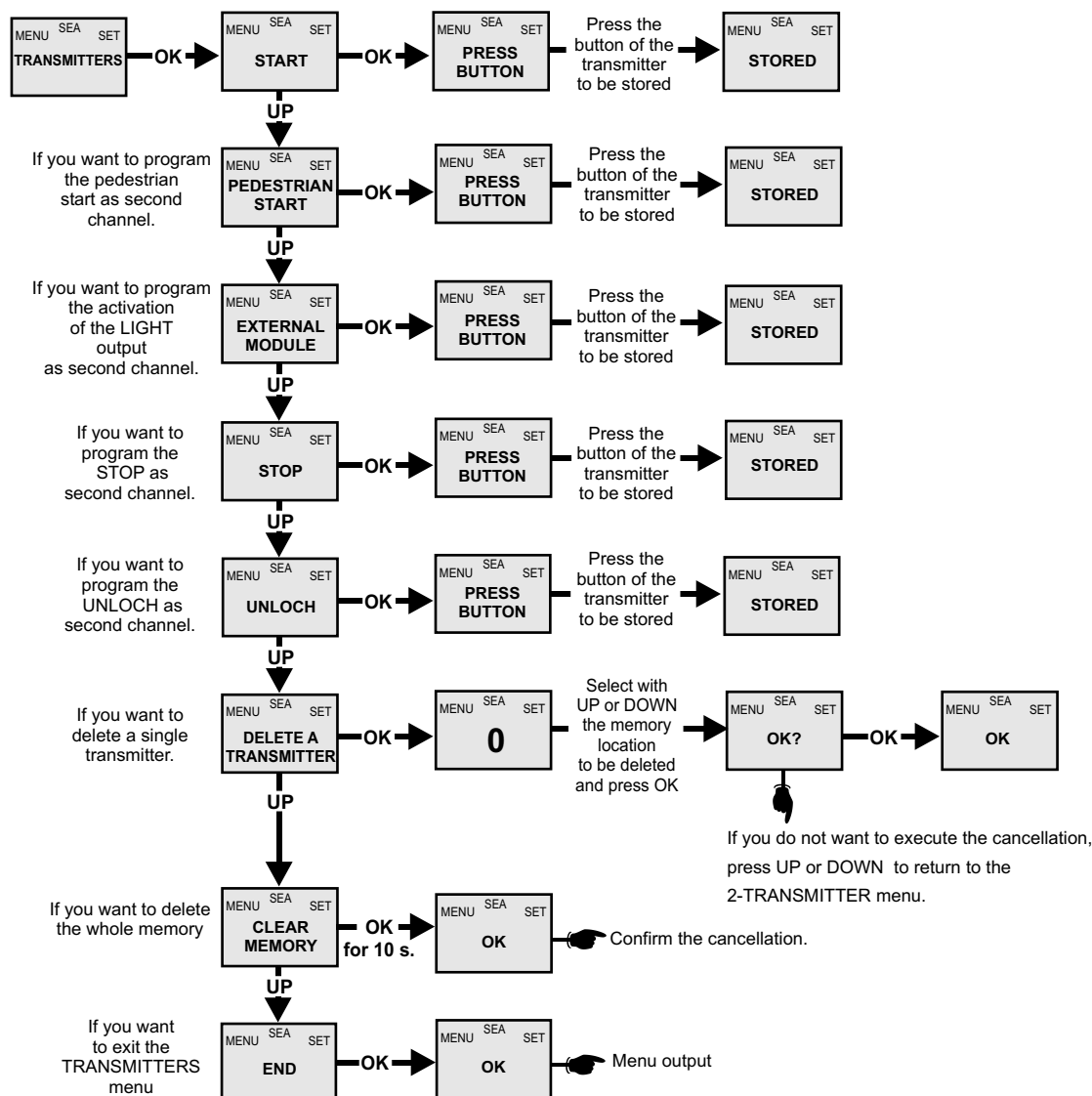
Notes:

- Enter radio transmitters learning only when the working cycle stops and the gate is closed.
- You can store max. 2 of the available 4 functions. If the control unit receives a code which was already associated to another function it will be updated with the new function.

RF UNI	16 USERS Whitout memory 800 USERS With additional memory MEM
RF UNI PG <i>Old Model</i>	100 USERS Fixed code 800 USERS Roll Plus
RF UNI PG <i>New model</i>	800 UTENTI Fixed code 800 UTENTI Roll Plus

TABLE EXAMPLE

Transmitter button Memory location	1	2	3	4	Serial number	Customer
0						
1						
2						
3						



START - STOP - PEDESTRIAN START - ANTENNA - PHOTOCELL

Photocell 1 and Photocell 2 Connections

Note: If the photocells are not connected, it is not necessary put a jumper between the clamps (6 and 7 and/or 6 and 8 of the CN1 terminal)

24VA=AUX 24V === (Accessories) 800 mA max COM = 0V PH1 = Photocell contact 1
PH2 = Photocell contact 2

Note: For the autotest in the 95-FOTOTEST menu select the photocell or the photocells on which you want to perform it. Auto-test is possible only when the transmitter of the photocell is powered on 24V~. The default setting of the photocell 1 is in "Closing" and the one of the photocell 2 is "Opening and closing". The photocell 2 can also be set as TIMER (see TIMER function).

OPTIONS ON FOTO1 and FOTO2 adjustable on on-board display or with JOLLY terminal.

"Closing": if occupied, reverses the movement in closing, during pause it prevent the closing.

"Opening and closing": If activated the photocell blocks the movement as long as it's busy, when released the opening continues.

"Stop": When activated before the opening the photocell blocks the automation as long as it is busy, during the opening it will be ignored. In closing the intervention of the photocell causes the reopening.

"Stop and close": in opening it is not active; in pause are activated it commands the closing when released, otherwise it's not active; in closing it stops the movement as long as it is busy, when released the closing continues.

"Close": The photocell stops the gate as long as it is occupied in both opening and closing, when released it gives a closing command (Closing one second after release of the photocell).

"Pause reload": If occupied, during pause it recharges the timer of pause. In closing it reverses the movement.

"Delay pause time": If the photocell is occupied during opening, pause or closing, the gate reopens completely and closes without observing the pause time.

Options AUX 24V === 800 mA max can be set with on-board Display or with Jolly device.

It is possible to chose when having tension on the AUX output.
The options are: **Always, In cycle, Opening, Closing, In pause, Positive brake management, Negative brake management-photocellule, Gate open warning light.**

PEDESTRIAN START (N.O.) The pedestrian start can be connected between the connectors 2 and 4 of the CN1 terminal .

This input allows a partial opening, the opening space can be set through the on-board display or through the JOLLY device.

Note1: The contact for partial opening is a N.O. Contact (Normally open). Holding START starts the TIMER function, releasing the pedestrian start, the operator repeats the pause and then performs the closing. In the case of triggering a safety device the timer will automatically reset after 6 seconds.

Note2: In 2 BUTTONS logic it is necessary to keep pressed the Start Ped. to re-close the automation.

Note3: In deadman logic this button executes the re-closing if you keep it pressed.

Note4: When closed during pause, the gate will reclose only after this input has been reopened.

TIMER activation: This input can be transformed into TIMER (See TIMER).

STOP (N.C.) The STOP is connected between the clamps 2 and 5 of the CN1 terminal .

When pressing this button the motor immediately stops in any condition/position. To re-start the movement give a start command.
After a stop the motor always re-starts in closing.

START (N.O.) The START is connected between connector 2 and 3 of the CN1 terminal.

An impulse given to this contact opens and closes the automation depending on the selected logic, it can be given by a keyswitch, a keypad, etc. Holding START starts the TIMER function, releasing the start, the operator repeats the pause and then performs the closing.

To connect the other devices refer to the related instructions leaflets. (ie. loop detectors and proximity switches). In the case of triggering a safety device the timer will automatically reset after 6 seconds.

Note1: In DEADMAN logic keep pressed the Start for the opening of the automation.

Note2: In 2 BUTTONS logic this button performs the opening.

TIMER

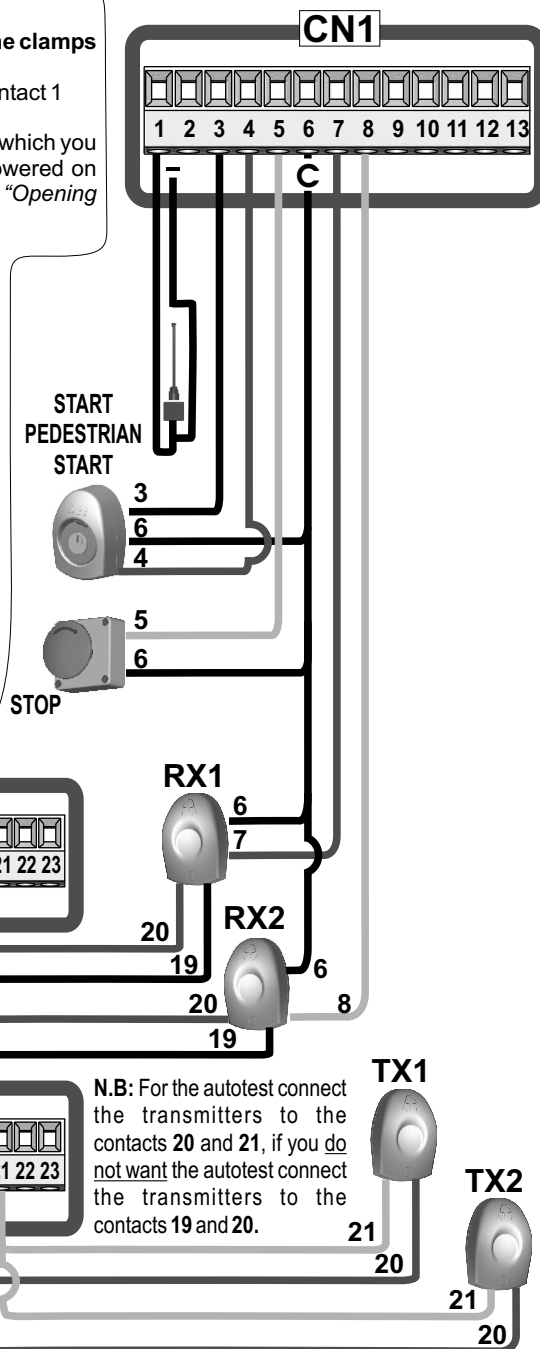


Can be activated through the on-board display or through the Jolly programmer. In both cases it's a N.O. contact which provokes the opening of the automation keeping it open as long as it is activated. When it's released, after having paused for the set pausing time the gate recloses. The TIMER can be activated on the inputs FOTO2, PEDESTRIAN START or keeping busy the START input.

Note1: When activated on the pedestrian entry, the pedestrian will be OFF also on the radio transmitter.

Note2: In the event of an intervention of a security device during the timer (Stop, amperometric, Edge), a start impulse restores the movement.

Note3: In case of no power supply with open gate and active Timer the control unit will restore its function, otherwise if during restoring of the power supply the TIMER is not activated it will be necessary to give a start impulse for the reclosing.



N.B: For the autotest connect the transmitters to the contacts 20 and 21, if you do not want the autotest connect the transmitters to the contacts 19 and 20.

SAFETY GATE OR AMPEROMETRIC MANAGEMENT

AMPEROMETRIC DEVICE FOR ELECTROMECHANICAL OPERATORS

This control unit comes with an obstacle detection system working only on electromechanical operators allowing to have the reversing on obstacles and the automatic detection of the stops.

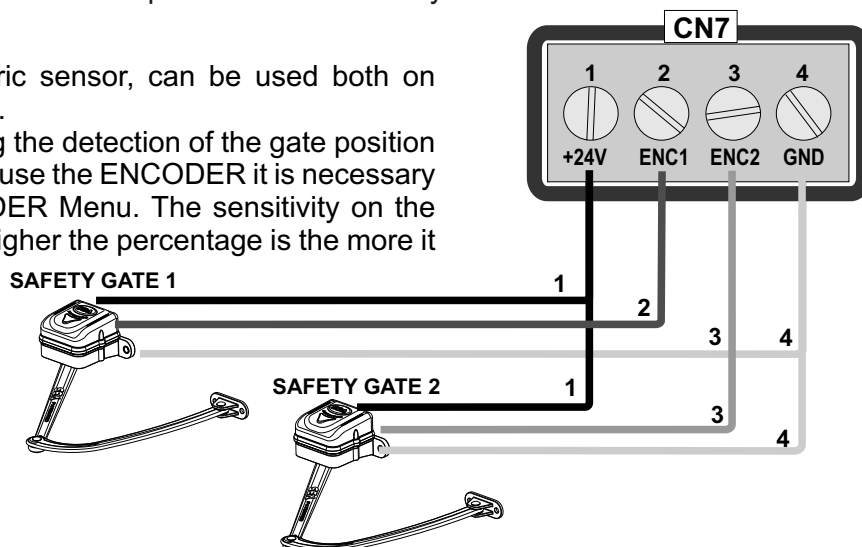
Sensitivity adjustable from OFF to 99% inside the special menu. The more the percentage is high the more the obstacle detection will be difficult. On hydraulic unit this parameter will be always OFF.

SAFETY GATE

The Safety Gate, unlike the amperometric sensor, can be used both on electromechanical and hydraulic operators.

The Safety Gate is an ENCODER allowing the detection of the gate position and its reversing in case of obstacles. To use the ENCODER it is necessary to enable it inside the special 32-ENCODER Menu. The sensitivity on the obstacle is adjustable from 0 - 99%. The higher the percentage is the more it will be difficult to detect the obstacle.

ATTENTION: The first operation after power failure, will be executed with the set speed to search the mechanical stops limit.



SAFETY EDGE AND FLASHING LAMP

SAFETY EDGE

Two safety edges (EDG1 e EDG2) can be connected, respectively between the contacts 9, 11 and 10 and 11 of CN1. Pressing EDG1 and EDG2, the contact opens, causing a partial reversing of the gate in closing and opening.

Note1: Put a jumper between the not used N.C. Contacts. The EDG1 and EDG2 inputs can be set: only in closing, only in opening or in both directions.

Note2: It is possible to activate a balanced edge 8K2 through the on board display or through the Jolly programmer, in such case the edge contact will be controlled by a specific resistance value, detecting the possible involuntary short circuit of the device. In case of an imbalanced device a special alarm will show on the on board display or on the JOLLY programmer.

If you connect a wireless edge it is possible to make a self-test on the power supply of the receiver by connecting it to 24Vac and selecting in the 96-EDGE AUTOTEST menu the edge or the edges on which to perform the test.

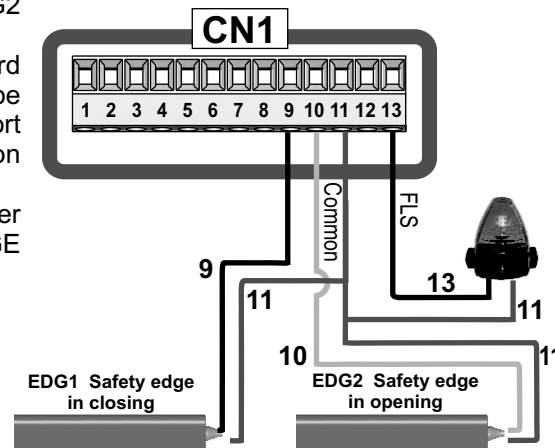
24V Flashing light == 3W Max

The flashing light can be connected between the FLS and COM connectors from Cn1 (It is recommended to use a 24V Flash Led flashing light).

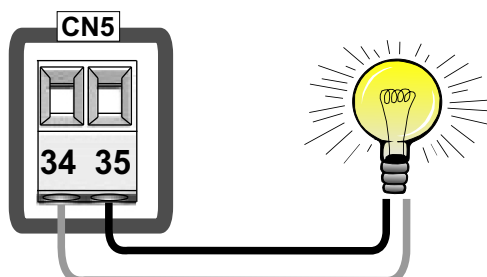
It blinks once per second during opening and twice per second during closing, while it remains lit during pause.

Through the warning light it is also possible to identify alarm signals coming from the STOP, PHOTOCELL 1, PHOTOCELL2 and EDGE devices. Through the on board display or the Jolly programmer it is possible to activate the pre-flashing function and/or to modify the flashing light function choosing between fixed flashing, control lamp or Buzzer.

The pre-flashing can be set from 0 to 5 s. or it is possible to have it only before closing.

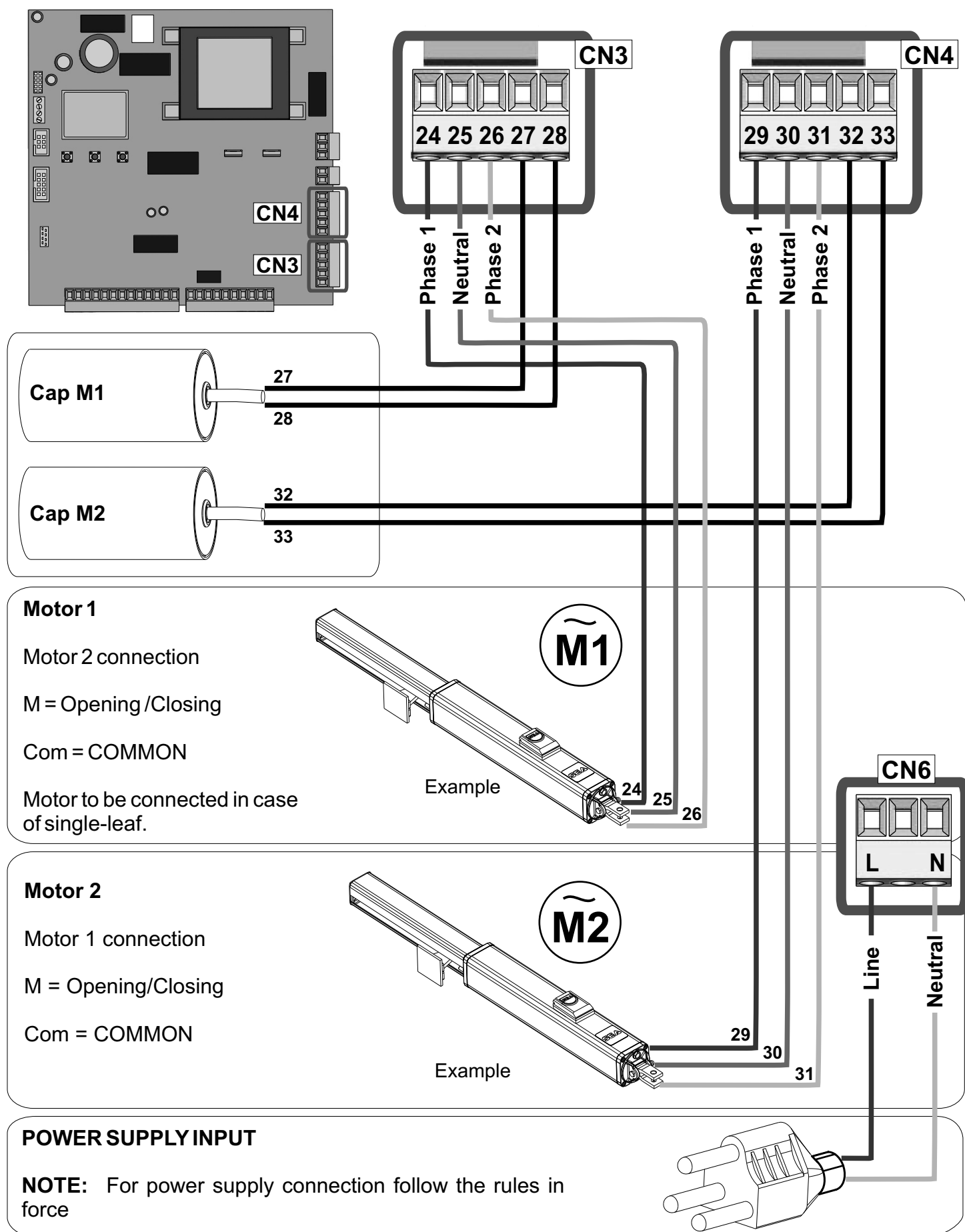


COURTESY LIGHT



Timing
 from 0 to 4 min
 (230V~ 50W Max - 115V~ 50W Max)

MOTORS CONNECTION, CAPACITY AND POWER SUPPLY



LIMIT SWITCH, ELECTROLOCK CONNECTION

Limit switch

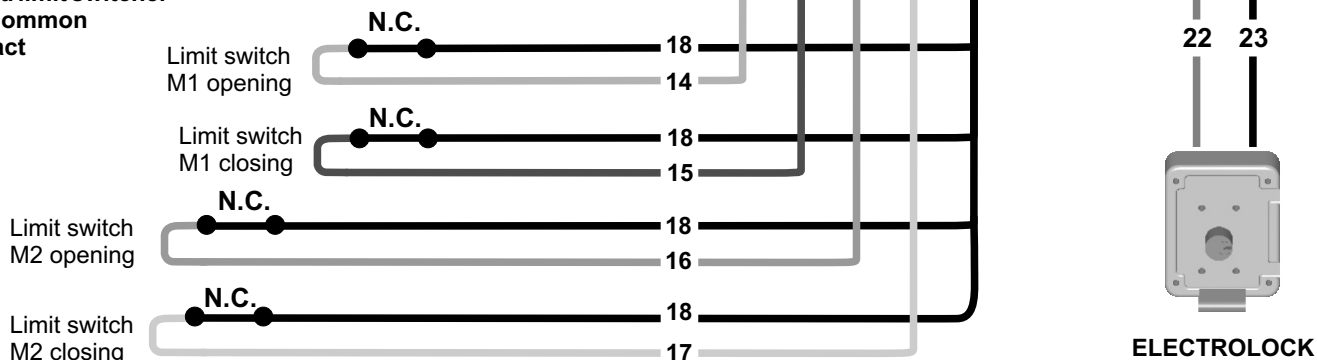
Does not need a jumper when not connected.

For the limit switch function, limit switches must be installed, both in opening and closing. In the case of single-leaf connect motor 1 (it is not necessary to bridge the limit switches of motor 2).

Anti-intrusion function can be activated. This function needs at least one limit switch, which pushes the motor in closing direction once it's released.

⚠ The right operation of the limit switch is guaranteed when the motors turning direction correspond with the respective employed limit switch.

Com = Common
C = Contact



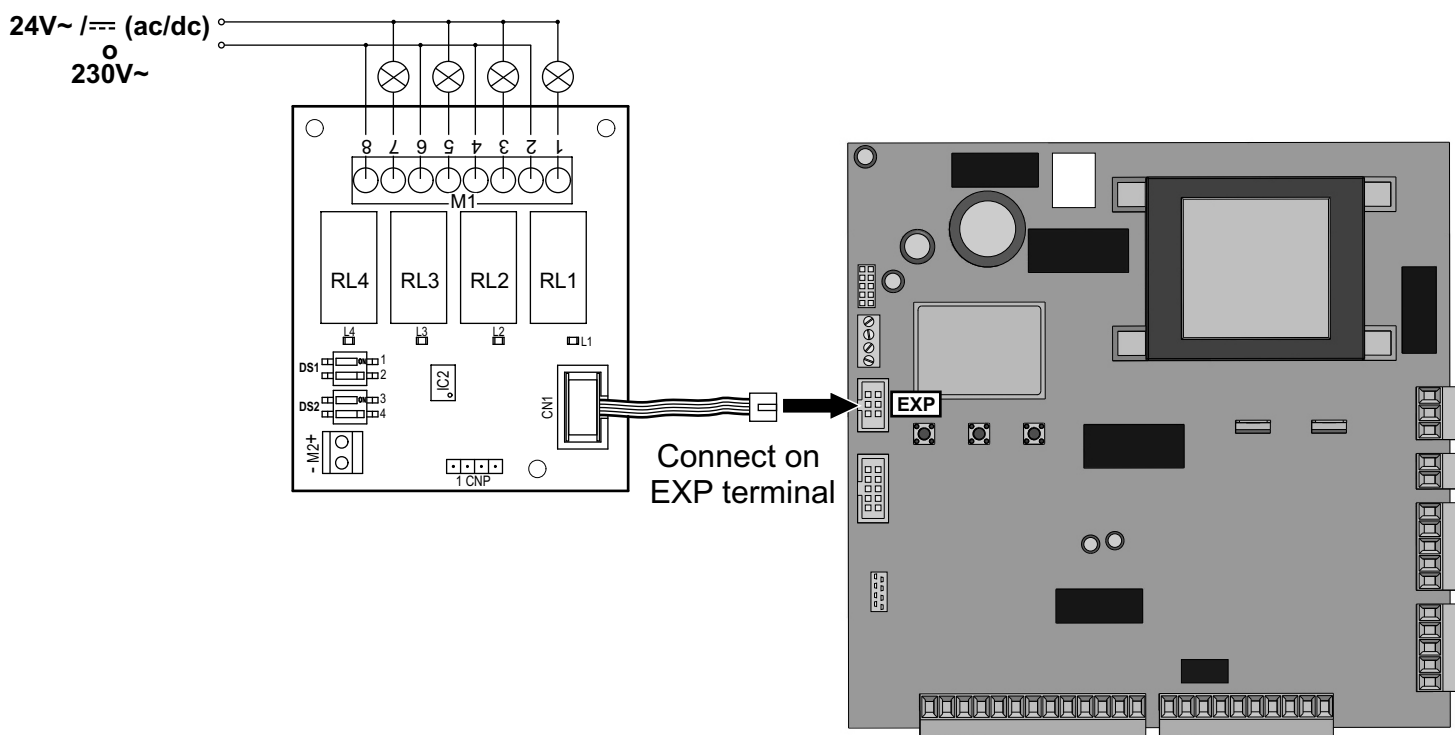
Electrolock output

A 12V== 15W max electrolock can be connected

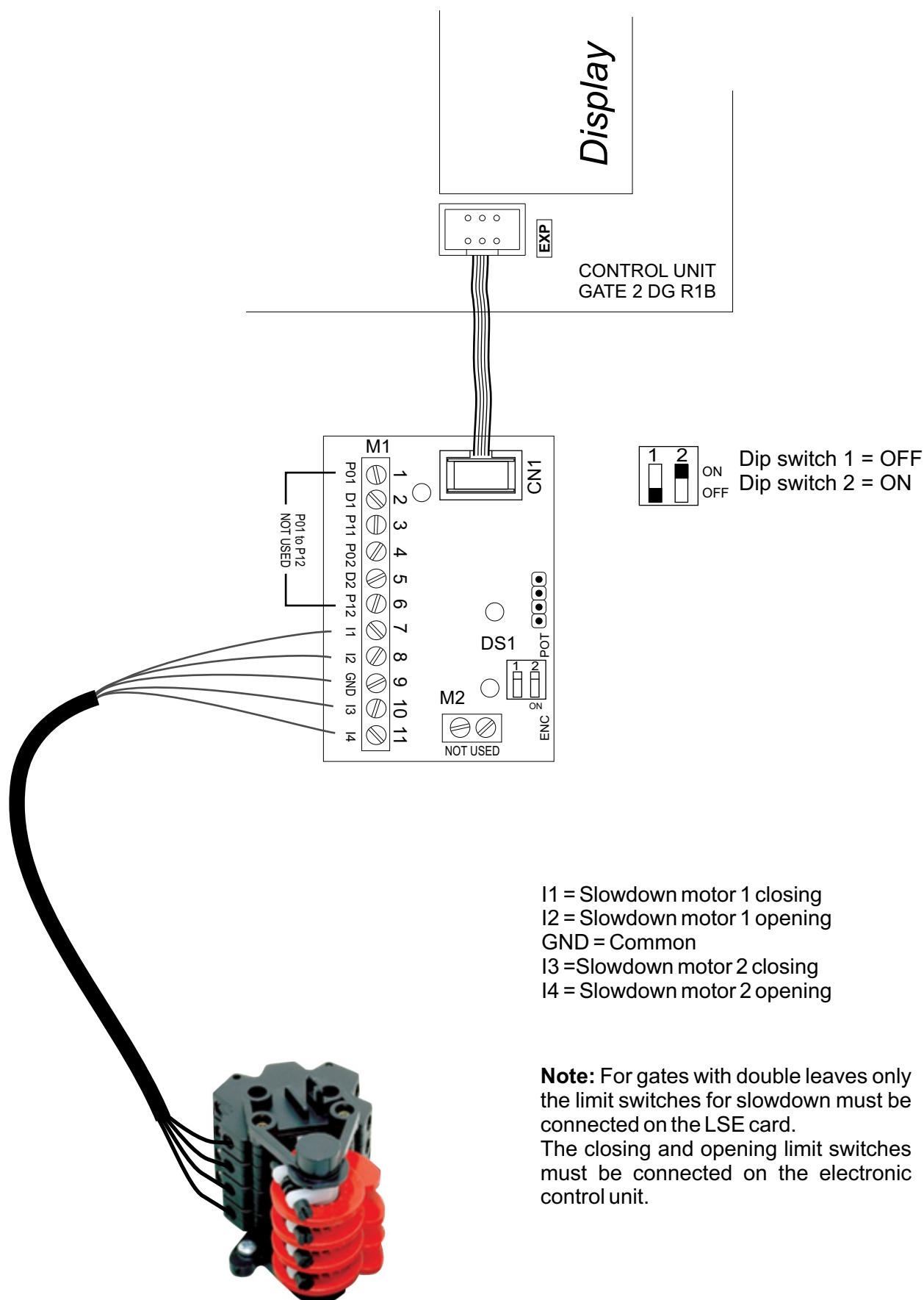
Electrolock can be deactivated when not used for energy saving on the control unit. Electrolock release can be timed from 0 to 5 s.

The electrobrake can be set: only before opening, only before closing or in both directions.

TRAFFIC LIGHT CARD CONNECTION



LSE MULTIFUNCTION CARD **FOR THE CONNECTION OF THE LIMIT SWITCH TO 4 CAMS**



ALARM DESCRIPTION

Signals	Kind of alarm	Solutions
FAILURE MOTOR	Motors current failure	Sure there are no short circuits on the motor or on the control unit.
FAILURE24VAUX	AUX output voltage	Make sure there are no short circuits on wiring or control unit and no overload.
FAILURE NET	Power supply failure	Check the network or the F2 fuse
FAILURE SELF TEST	Self-test photocells failure	Check the photocells operation and / or connections on the control unit.
FAILURE LIMIT SWITCH	Limit switch activation failure	Check the operation of both limit switches and / or correspondence between movement direction of the motor and engaged limit switches.
FAILURE FLASHING LIGHT	Flashing lamp failure	Check connections and / or conditions of the lamp.
FAILURE POTENTIOMETER	Potentiometer failure	The message appears only if the potentiometer is ON and the potentiometer (LE) card is broken or not connected.

Note 1: If in the diagnostics shows "Max. cycles reached", do the maintenance and / or reset the number of cycles performed.

Note2: To exit from the error messages, press OK. If the error persists, make all required checks for the specific error and / or disconnect the device that generates the error to see if the error disappears.

At each opening and closing of the automation the flashing light will blink. It blinks once per second during opening and twice per second during closing, while it remains lit during pause.

It is possible to view the alarms also on the flashing light or on the control lamp, simply by observing the number of flashes emitted and verifying the reference in the table below:

Blinks	Cause of alarm
9	Motors failure
2	Photocell in closing
3	Photocell in opening
6	Collision in opening
4	Safety edge

Blinks	Cause of alarm
5	Stop
7	Max. Cycles reached
6	Collision in closing
4 fast	Limit switch fault

TROUBLE SHOOTING

Advices		
Make sure all Safeties are turned ON All N.C. contacts must have jumpers		
Problem Found	Possibile Cause	Solutions
Motor doesn't respond to any START impulse	a.) Check the connected N.C. contacts b.) Burnt fuse	a.) Check the connections or the jumpers on the connections of the safety edges or of the stop and of the photocell if connected b.) Replace the burned fuse on the control unit
Gate doesn't move while the motor is running	a.) The motor is in the released position b.) There is an obstacle	a.) Re-lock the motor b.) Remove obstacle
Gate doesn't reach the complete Open / Closed position	a.) Wrong setting of the limit switches b.) Error on programming c.) Gate is stopped by an obstacle d.) Torque too low	a.) Set limit switches b.) Repeat programming c.) Remove obstacle d.) Increase torque parameter
The gate opens but doesn't close	a.) The contacts of the photocells are connected and open b.) The stop contact is connected and open c.) The edge contact is open d.) Ammeter alarm e.) Encoder alarm	a.) b.) c.) Check the jumpers or the signals indicated on the warning lamp d.) Check if the ammeter alarm has intervened and eventually increase the torque parameter. e.) Check the reading of the Encoder and/or the sensibility
The gate doesn't close automatically	a.) Pause time set to high b.) Control unit in semi-autom. logic	a.) Adjust pause time b.) Set the pause parameter on a different value from the OFF

Page for both instaler and user

MAINTENANCE

Considering the number of working cycles and the kind of gate, if the gate has changed the clutches and doesn't work it's necessary to periodically proceed, with **the learning times reprogramming on the electronic control unit**.
 Periodically clean the optical systems of the photocells.

REPLACEMENTS

Any request for spare parts must be sent to:

SEA S.p.A. - Zona Ind.le, 64020 S.ATTO - Teramo - Italia

SAFETY AND ENVIRONMENTAL COMPATIBILITY

Disposal of the packaging materials of products and/or circuits should take place in an approved disposal facility.



REGULAR PRODUCT DISPOSAL (electric and electronic waste)

(It's applicable in EU countries and in those ones provided with a differential waste collection)

The brand that you find on the product or on documentation signals that the product must not be disposed off together with other domestic waste at the end of life cycle. In order to avoid any possible environmental or health damage caused by irregular waste disposal, we recommend to separate this product from other forms of waste and to recycle it in a responsible way in order to provide the sustainable re-use of material resources. Domestic users are invited to contact the retailer where the product has been purchased or the local office in charge of all the information related to differential waste collection and recycling of this kind of product.

STORING

WAREHOUSING TEMPERATURES			
T_{min}	T_{Max}	Dampness_{min}	Dampness_{Max}
- 20°C	+ 65°C	5% <i>Not condensing</i>	90% <i>Not condensing</i>

Materials handling must be made with appropriate vehicles..

WARRANTY LIMITS

For the guarantee see the sales conditions on the official SEA price list.

SEA reserves the right to make any required modification or change to the products and/or to this manual without any advanced notice obligation.

TERMS OF SALES

EFFICACY OF THE FOLLOWING TERMS OF SALE: the following general terms of sale shall be applied to all orders sent to SEAS.p.A. All sales made by SEA to all costumers are made under the prescription of this terms of sales which are integral part of sale contract and cancel and substitute all apposed clauses or specific negotiations present in order document received from the buyer.

GENERAL NOTICE The systems must be assembled exclusively with SEA components, unless specific agreements apply. Non-compliance with the applicable safety standards (European Standards EM12453 – EM 12445) and with good installation practice releases SEA from any responsibilities. SEA shall not be held responsible for any failure to execute a correct and safe installation under the above mentioned standards.

1) PROPOSED ORDER The proposed order shall be accepted only prior SEA approval of it. By signing the proposed order, the Buyer shall be bound to enter a purchase agreement, according to the specifications stated in the proposed order.

On the other hand, failure to notify the Buyer of said approval must not be construed as automatic acceptance on the part of SEA.

2) PERIOD OF THE OFFER The offer proposed by SEA or by its branch sales department shall be valid for 30 solar days, unless otherwise notified.

3) PRICING The prices in the proposed order are quoted from the Price List which is valid on the date the order was issued. The discounts granted by the branch sales department of SEA shall apply only prior to acceptance on the part of SEA. The prices are for merchandise delivered ex-works from the SEA establishment in Teramo, not including VAT and special packaging. SEA reserves the right to change at any time this price list, providing timely notice to the sales network. The special sales conditions with extra discount on quantity basis (Qx, Qx1, Qx2, Qx3 formula) is reserved to official distributors under SEA management written agreement.

4) PAYMENTS The accepted forms of payment are each time notified or approved by SEA. The interest rate on delay in payment shall be 1.5% every month but anyway shall not be higher than the max. interest rate legally permitted.

5) DELIVERY Delivery shall take place, approximately and not peremptorily, within 30 working days from the date of receipt of the order, unless otherwise notified. Transport of the goods sold shall be at Buyer's cost and risk. SEA shall not bear the costs of delivery giving the goods to the carrier, as chosen either by SEA or by the Buyer. Any loss and/or damage of the goods during transport, are at Buyer's cost.

6) COMPLAINTS Any complaints and/or claims shall be sent to SEA within 8 solar days from receipt of the goods, proved by adequate supporting documents as to their truthfulness.

7) SUPPLY The concerning order will be accepted by SEA without any engagement and subordinately to the possibility to get it's supplies of raw material which is necessary for the production; Eventual completely or partially unsuccessful executions cannot be reason for complains or reservations for damage. SEA supply is strictly limited to the goods of its manufacturing, not including assembly, installation and testing. SEA, therefore, disclaims any responsibility for damage deriving, also to third parties, from non-compliance of safety standards and good practice during installation and use of the purchased products.

8) WARRANTY The standard warranty period is 12 months. This warranty time can be extended by means of expedition of the warranty coupon as follows:

SILVER: The mechanical components of the operators belonging to this line are guaranteed for 24 months from the date of manufacturing written on the operator.

GOLD: The mechanical components of the operators belonging to this line are guaranteed for 36 months from the date of manufacturing written on the operator.

PLATINUM: The mechanical components of the operators belonging to this line are guaranteed for 36 months from the date of manufacturing written on the operator. The base warranty (36 months) will be extended for further 24 months (up to a total of 60 months) when it is acquired the certificate of warranty which will be filled in and sent to SEA S.p.A. The electronic devices and the systems of command are guaranteed for 24 months from the date of manufacturing. In case of defective product, SEA undertakes to replace free of charge or to repair the goods provided that they are returned to SEA repair centre. The definition of warranty status is by unquestionable assessment of SEA. The replaced parts shall remain propriety of SEA. Binding upon the parties, the material held in warranty by the Buyer, must be sent back to SEA repair centre with fees prepaid, and shall be dispatched by SEA with carriage forward. The warranty shall not cover any required labour activities.

The recognized defects, whatever their nature, shall not produce any responsibility and/or damage claim on the part of the Buyer against SEA. The guarantee is in no case recognized if changes are made to the goods, or in the case of improper use, or in the case of tampering or improper assembly, or if the label affixed by the manufacturer has been removed including the SEA registered trademark No. 804888. Furthermore, the warranty shall not apply if SEA products are partly or completely coupled with non-original mechanical and/or electronic components, and in particular, without a specific relevant authorization, and if the Buyer is not making regular payments. The warranty shall not cover damage caused by transport, expendable material, faults due to non-conformity with performance specifications of the products shown in the price list. No indemnification is granted during repairing and/or replacing of the goods in warranty. SEA disclaims any responsibility for damage to objects and persons deriving from non-compliance with safety standards, installation instructions or use of sold goods. The repair of products under warranty and out of warranty is subject to compliance with the procedures notified by SEA.

9) RESERVED DOMAIN A clause of reserved domain applies to the sold goods; SEA shall decide autonomously whether to make use of it or not, whereby the Buyer purchases propriety of the goods only after full payment of the latter.

10) COMPETENT COURT OF LAW In case of disputes arising from the application of the agreement, the competent court of law is the tribunal of Teramo. SEA reserves the faculty to make technical changes to improve its own products, which are not in this price list at any moment and without notice. SEA declines any responsibility due to possible mistakes contained inside the present price list caused by printing and/or copying. The present price list cancels and substitutes the previous ones. The Buyer, according to the law No. 196/2003 (privacy code) consents to put his personal data, deriving from the present contract, in SEA archives and electronic files, and he also gives his consent to their treatment for commercial and administrative purposes.

Industrial ownership rights: once the Buyer has recognized that SEA has the exclusive legal ownership of the registered SEA brand num.804888 affixed on product labels and / or on manuals and / or on any other documentation, he will commit himself to use it in a way which does not reduce the value of these rights, he won't also remove, replace or modify brands or any other particularity from the products. Any kind of replication or use of SEA brand is forbidden as well as of any particularity on the products, unless preventive and expressed authorization by SEA.

In accomplishment with art. 1341 of the Italian Civil Law it will be approved expressly clauses under numbers:

4) PAYMENTS - 8) GUARANTEE - 10) COMPETENT COURT OF LOW

Italiano AVVERTENZE GENERALI PER INSTALLATORE E UTENTE

1. Leggere attentamente le **Istruzioni di Montaggio** e le **Avvertenze Generali** prima di iniziare l'installazione del prodotto. Conservare la documentazione per consultazioni future
2. Non disperdere nell'ambiente i materiali di imballaggio del prodotto e/o circuiti
3. Questo prodotto è stato progettato e costruito esclusivamente per l'utilizzo indicato in questa documentazione. Qualsiasi altro utilizzo non espressamente indicato potrebbe pregiudicare l'integrità del prodotto e/o rappresentare fonte di pericolo. L'uso improprio è anche causa di cessazione della garanzia. La SEA S.p.A. declina qualsiasi responsabilità derivata dall'uso improprio o diverso da quello per cui l'automatismo è destinato.
4. I prodotti SEA sono conformi alle Direttive: Macchine (2006/42/CE e successive modifiche), Bassa Tensione (2006/95/CE e successive modifiche), Compatibilità Elettromagnetica (2004/108/CE e successive modifiche). L'installazione deve essere effettuata nell'osservanza delle norme EN 12453 e EN 12445.
5. Non installare l'apparecchio in atmosfera esplosiva.
6. SEA S.p.A. non è responsabile dell'inosservanza della Buona Tecnica nella costruzione delle chiusure da motorizzare, nonché delle deformazioni che dovessero verificarsi durante l'uso.
7. Prima di effettuare qualsiasi intervento sull'impianto, togliere l'alimentazione elettrica e scollegare le batterie. Verificare che l'impianto di terra sia realizzato a regola d'arte e collegarvi le parti metalliche della chiusura.
8. Per ogni impianto SEA S.p.A. consiglia l'utilizzo di almeno una segnalazione luminosa nonché di un cartello di segnalazione fissato adeguatamente sulla struttura dell'infisso.
9. SEA S.p.A. declina ogni responsabilità ai fini della sicurezza e del buon funzionamento della automazione, in caso vengano utilizzati componenti di altri produttori.
10. Per la manutenzione utilizzare esclusivamente parti originali SEA.
11. Non eseguire alcuna modifica sui componenti dell'automazione.
12. L'installatore deve fornire tutte le informazioni relative al funzionamento manuale del sistema in caso di emergenza e consegnare all'Utente utilizzatore dell'impianto il libretto d'avvertenze allegato al prodotto.
13. Non permettere ai bambini o persone di sostare nelle vicinanze del prodotto durante il funzionamento. L'applicazione non può essere utilizzata da bambini, da persone con ridotte capacità fisiche, mentali, sensoriali o da persone prive di esperienza o del necessario addestramento. Tenere inoltre fuori dalla portata dei bambini radiocomandi o qualsiasi altro datore di impulso, per evitare che l'automazione possa essere azionata involontariamente.
14. Il transito tra le ante deve avvenire solo a cancello completamente aperto.
15. Tutti gli interventi di manutenzione, riparazione o verifiche periodiche devono essere eseguiti da personale professionalmente qualificato. L'utente deve astenersi da qualsiasi tentativo di riparazione o d'intervento e deve rivolgersi esclusivamente a personale qualificato SEA. L'utente può eseguire solo la manovra manuale.
16. La lunghezza massima dei cavi di alimentazione fra centrale e motori non deve essere superiore a 10 m. Utilizzare cavi con sezione 2.5 mm². Utilizzare cablaggi con cavi in doppio isolamento (cavi con guaina) nelle immediate vicinanze dei morsetti specie per il cavo di alimentazione (230V). Inoltre è necessario mantenere adeguatamente lontani (almeno 2.5 mm in aria) i conduttori in bassa tensione (230V) dai conduttori in bassissima tensione di sicurezza (SELV) oppure utilizzare un'adeguata guaina che fornisca un isolamento supplementare avente uno spessore di almeno 1 mm.

English GENERAL NOTICE FOR THE INSTALLER AND THE USER

1. Read carefully these **Instructions** before beginning to install the product. Store these instructions for future reference
2. Don't waste product packaging materials and /or circuits.
3. This product was designed and built strictly for the use indicated in this documentation. Any other use, not expressly indicated here, could compromise the good condition/operation of the product and/or be a source of danger. SEA S.p.A. declines all liability caused by improper use or different use in respect to the intended one.
4. The mechanical parts must be comply with Directives: Machine Regulation 2006/42/CE and following adjustments), Low Tension (2006/95/CE), electromagnetic Consistency (2004/108/CE) Installation must be done respecting Directives: EN12453 and EN12445.
5. Do not install the equipment in an explosive atmosphere.
6. SEA S.p.A. is not responsible for failure to observe Good Techniques in the construction of the locking elements to motorize, or for any deformation that may occur during use.
7. Before attempting any job on the system, cut out electrical power and disconnect the batteries. Be sure that the earthing system is perfectly constructed, and connect it metal parts of the lock.
8. Use of the indicator-light is recommended for every system, as well as a warning sign well-fixed to the frame structure.
9. SEA S.p.A. declines all liability as concerns the automated system's security and efficiency, if components used, are not produced by SEA S.p.A..
10. For maintenance, strictly use original parts by SEA.
11. Do not modify in any way the components of the automated system.
12. The installer shall supply all information concerning system's manual functioning in case of emergency, and shall hand over to the user the warnings handbook supplied with the product.
13. Do not allow children or adults to stay near the product while it is operating. The application cannot be used by children, by people with reduced physical, mental or sensorial capacity, or by people without experience or necessary training. Keep remote controls or other pulse generators away from children, to prevent involuntary activation of the system.
14. Transit through the leaves is allowed only when the gate is fully open.
15. The User must not attempt to repair or to take direct action on the system and must solely contact qualified SEA personnel or SEA service centers. User can apply only the manual function of emergency.
16. The power cables maximum length between the central engine and motors should not be greater than 10 m. Use cables with 2,5 mm² section. Use double insulation cable (cable sheath) to the immediate vicinity of the terminals, in particular for the 230V cable. Keep an adequate distance (at least 2.5 mm in air), between the conductors in low voltage (230V) and the conductors in low voltage safety (SELV) or use an appropriate sheath that provides extra insulation having a thickness of 1 mm.

Français CONSIGNES POUR L'INSTALLATEUR ET L'UTILISATEUR

1. Lire attentivement les **instructions** avant d'installer le produit. Conserver les instructions en cas de besoin.
2. Ne pas disperser dans l'environnement le matériel d'emballage du produit et/ou des circuits
3. Ce produit a été conçu et construit exclusivement pour l'usage indiqué dans cette fiche. Toute autre utilisation non expressément indiquée pourraient compromettre l'intégrité du produit et/ou représenter une source de danger. SEA S.p.A. décline toute responsabilités qui dériverait d'usage impropre ou différent de celui auquel l'automatisme est destiné. Une mauvaise utilisation cause la cessation de la garantie.
4. Les composants doivent répondre aux prescriptions des Normes: Machines (2006/42/CE et successifs changements); Basse Tension (2006/95/CE et successifs changements); EMC (2004/108/CE et successifs changements). L'installation doit être effectuée conformément aux Normes EN 12453 et EN 12445.
5. Ne pas installer l'appareil dans une atmosphère explosive.
6. SEA S.p.A. n'est pas responsable du non-respect de la Bonne Technique de construction des fermetures à motoriser, ni des déformations qui pourraient intervenir lors de l'utilisation.
7. Couper l'alimentation électrique et déconnecter la batterie avant toute intervention sur l'installation. Vérifier que la mise à terre est réalisée selon les règles de l'art et y connecter les pièces métalliques de la fermeture.
8. On recommande que toute installation soit dotée au moins d'une signalisation lumineuse, d'un panneau de signalisation fixé, de manière appropriée, sur la structure de la fermeture.
9. SEA S.p.A. décline toute responsabilité quant à la sécurité et au bon fonctionnement de l'automatisme si les composants utilisés dans l'installation n'appartiennent pas à la production SEA.

11. Utiliser exclusivement, pour l'entretien, des pièces SEA originales.
12. Ne jamais modifier les composants d'automatisme.
13. L'installateur doit fournir toutes les informations relatives au fonctionnement manuel du système en cas d'urgence et remettre à l'Usager qui utilise l'installation les "Instructions pour l'Usager" fournies avec le produit.
14. Interdire aux enfants ou aux tiers de stationner près du produit durant le fonctionnement. Ne pas permettre aux enfants, aux personnes ayant des capacités physiques, mentales et sensorielles limitées ou dépourvues de l'expérience ou de la formation nécessaires d'utiliser l'application en question. Eloigner de la portée des enfants les radiocommandes ou tout autre générateur d'impulsions, pour éviter tout actionnement involontaire de l'automatisme.
15. Le transit entre les vantaux ne doit avoir lieu que lorsque le portail est complètement ouvert.
16. L'utilisateur doit s'abstenir de toute tentative de réparation ou d'intervention et doit s'adresser uniquement et exclusivement au personnel qualifié SEA ou aux centres d'assistance SEA. L'utilisateur doit garder la documentation de la réparation. L'utilisateur peut exécuter seulement la manoeuvre manuel.
17. La longueur maximum des câbles d'alimentation entre la carte et les moteurs ne devrait pas être supérieure à 10 m. Utilisez des câbles avec une section de 2,5 mm². Utilisez des câblage avec câble à double isolation (avec gaine) jusqu'à proximité immédiate des terminaux, en particulier pour le câble d'alimentation (230V). Il est également nécessaire de maintenir une distance suffisante (au moins 2,5 mm dans l'air), entre les conducteurs en basse tension (230V) et les conducteurs de très basse tension de sécurité (SELV) ou utiliser une gaine ayant une épaisseur d'au moins 1 mm, qui fournisse une isolation supplémentaire.

Español ADVERTENCIAS GENERALES PARA INSTALADORES Y USUARIOS

- 1 Leer las **instrucciones de instalación** antes de comenzar la instalación. Mantenga las instrucciones para consultas futura
2. No desperdiciar en el ambiente los materiales de embalaje del producto o del circuito
3. Este producto fue diseñado y construido exclusivamente para el uso especificado en esta documentación. Cualquier otro uso no expresamente indicado puede afectar la integridad del producto y ser una fuente de peligro. El uso inadecuado es también causa de anulación de la garantía. SEA S.p.A. se exime de toda responsabilidad causadas por uso inapropiado o diferente de aquel para el que el sistema automatizado fue producido.
4. Los productos cumplen con la Directiva: Maquinas (2006/42/CE y siguientes modificaciones), Baja Tension (2006/95/CE, y siguientes modificaciones), Compatibilidad Electromagnética (2004/108/CE modificada). La instalación debe ser llevada a cabo de conformidad a las normas EN 12453 y EN 12445.
5. No instalar el dispositivo en una atmósfera explosiva.
6. SEAS.p.A. no es responsable del incumplimiento de la mano de obra en la construcción de la cancela a automatizar y tampoco de las deformaciones que puedan producirse durante el uso.
7. Antes de realizar cualquier operación apagar la fuente de alimentación y desconectar las baterías. Comprobar que el sistema de puesta a tierra sea diseñado de una manera profesional y conectar las partes metálicas del cierre.
8. Para cada instalación se recomienda utilizar como mínimo una luz parpadeante y una señal de alarma conectada a la estructura del marco.
9. SEAS.p.A. no acepta responsabilidad por la seguridad y el buen funcionamiento de la automatización en caso de utilización de componentes no producidos por SEA.
10. Para el mantenimiento utilizar únicamente piezas originales SEAS.p.A..
11. No modificar los componentes del sistema automatizado.
12. El instalador debe proporcionar toda la información relativa al funcionamiento manual del sistema en caso de emergencia y darle al usuario el folleto de adjunto al producto.
13. No permita que niños o adultos permanecen cerca del producto durante la la operación. La aplicación no puede ser utilizada por niños, personas con movilidad reducida de tipo físico, mental, sensorial o igual por personas sin experiencia o formación necesaria. Tener los radiomandos fuera del alcance de niños así como cualquier otro generador de impulsos radio para evitar que el automación pueda ser accionada accidentalmente.
14. El tránsito a través de las hojas sólo se permite cuando la puerta está completamente abierta.
15. Todo el mantenimiento, reparación o controles deberán ser realizados por personal cualificado. Evitar cualquier intento a reparar o ajustar. En caso de necesidad comunicarse con un personal SEA calificado. Sólo se puede realizar la operación manual.
16. La longitud máxima de los cables de alimentación entre motor y central no debe ser superior a 10 metros. Utilizar cables con 2,5 mm². Utilizar cables con doble aislamiento (cables con vaina) hasta muy cerca de los bornes, especialmente por el cable de alimentación (230V). Además es necesario mantener adecuadamente distanciados (por lo menos 2,5 mm en aire) los conductores de baja tensión (230V) y los conductores de baja tensión de seguridad (SELV) o utilizar una vaina adecuada que proporcione aislamiento adicional con un espesor mínimo de 1 mm.



Dichiarazione di conformità
Declaration of Conformity

La SEA S.p.A. dichiara sotto la propria responsabilità e, se applicabile, del suo rappresentante autorizzato che il prodotto:

SEA S.p.A. declares under its proper responsibility and, if applicable, under the responsibility of its authorised representative that the product:

Descrizione / Description	Modello / Model	Marca / Trademark
Gate 2 DG R1B (e tutti i suoi derivati)	23023025	SEA
<i>Gate 2 DG R1B (and all its by-products)</i>	<i>23023025</i>	<i>SEA</i>

è costruito per essere incorporato in una macchina o per essere assemblato con altri macchinari per costruire una macchina ai sensi della Direttiva 2006/42/CE:

is built to be integrated into a machine or to be assembled with other machinery to create a machine under the provisions of Directive 2006/42/CE:

è conforme ai requisiti essenziali di sicurezza relativi al prodotto entro il campo di applicabilità delle Direttive Comunitarie 2006/95/CE e 2004/108/CE.

it is conforming to the essential safety requirements related to the product within the field of applicability of the Community Directives 2006/95/CE and 2004/108/CE.

COSTRUTTORE o RAPPRESENTANTE AUTORIZZATO:
MANUFACTURER or AUTHORISED REPRESENTATIVE:

SEAS.p.A.
DIREZIONE E STABILIMENTO:
Zona industriale 64020 S.ATTO Teramo - (ITALY)
Tel. +39 0861 588341 r.a. Fax +39 0861 588344
[Http://www.seateam.com](http://www.seateam.com)

I test sul prodotto sono stati effettuati in configurazione standard e in riferimento alle norme specifiche per la sua classe d'utilizzo.

The products have been tested in standard configuration and with reference to the special norms concerning the classe of use.

(Luogo, data di emissione)
(Place, date of issue)
Teramo, 10/06/2015

L'Amministratore
The Administrator
Ennio Di Saverio




SEA®

electronic opening system

Questo articolo è stato prodotto seguendo rigide procedure di lavorazione ed è stato testato singolarmente al fine di garantire i più alti livelli qualitativi e la vostra soddisfazione. Vi ringraziamo per aver scelto SEA.

This article was produced following strict processing procedures and has been tested individually in order to ensure the highest levels of quality and your satisfaction. We thank you for choosing SEA.

Cet article a été produit suivant les procédures d'usage strictes et a été testé individuellement afin de garantir les plus hauts niveaux de qualité et de votre satisfaction. Nous vous remercions d'avoir choisi SEA.

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di Apertura Porte e Cancelli
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