

Operatore elettromeccanico interrato per cancelli ad anta battente

Istruzioni d'uso ed avvertenze

Underground electro-mechanical operator for swing gates

Operating instructions and warnings

Opérateur électromécanique enterré pour portails battants

Notice d'emploi et avertissements

Operador electromecánico enterrado para puertas de hoja batiente

Instrucciones de uso y advertencias

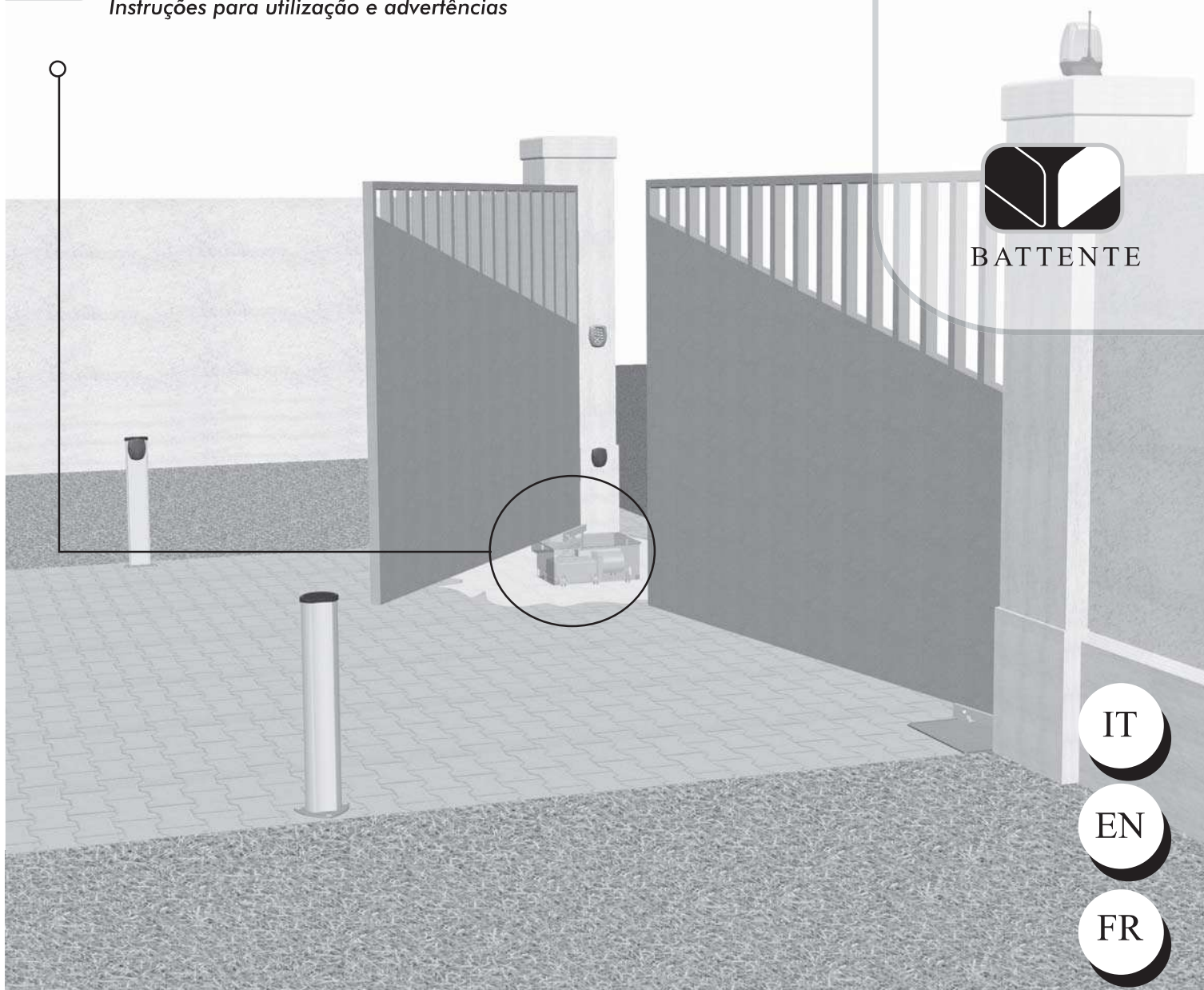
Operador electro-mecânico enterrado para portões de folha batente

Instruções para utilização e advertências

DEA[®]



BATTENTE



IT

EN

FR

ES

PT

GHOST 200

IT UTILIZZO DEL LIBRETTO

Per facilitare la comunicazione e la rintracciabilità di particolari importanti informazioni all'interno del testo DEA System adotta la simbologia riportata.

EN USE OF THIS BOOKLET

In order to facilitate communication and the traceability of particularly important parts of the text, DEA System adopts the symbols provided.

FR UTILISATION DE CE LIVRET







Pour faciliter la communication et le repérage de renseignements spéciaux et importants à l'intérieur du texte, DEA System a adopté la symbolologie indiquée.

ES UTILIZACIÓN DEL MANUAL

Para facilitar la comunicación y la trazabilidad de informaciones de particular importancia, DEA System adopta, en el interior del texto, la simbología reproducida.

PT UTILIZAÇÃO DO FOLHETO

Para facilitar a comunicação e localizar pormenores importantes de informações no interior do texto, a DEA System adoptou os símbolos apresentados.

	Avvertimento Warning Avertissement Advertencia Advertência
	Pericolo Danger Danger Peligro Perigo
	Consultaione Consultation Consultation Consultación Consulta
	Osservazione Observation Observation Observación Observação
	Ispezione Inspection Inspection Inspección Inspeção
	Certificazione Certification Certification Certificación Certificado

GHOST 200

Underground electro-mechanical operator for swing gates
Operating instructions and warnings

ENGLISH

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ANNEXES

- Instructions for the final user
- Terms of warranty

OVERVIEW

SCOPE OF THE INSTRUCTIONS

These instructions were prepared by the manufacturer and are an integral part of the product. The operations described are intended for adequately trained and qualified operators and must be carefully read and preserved for future reference.

Chapters "2 RESIDUAL RISK WARNINGS" and "4 OPERATING INSTRUCTIONS" contain all the information that **DEA** System provides in order for the product to constantly satisfy the Essential Safety Requirements prescribed by the Machinery Directive (European Directive 2006/42/CE).

Read these chapters carefully because they contain important instructions for safe installation, use and maintenance and important warnings regarding the residual risks remaining even after all the safety devices and measures described have been applied.

The product is designed for installation in complete closing systems subject to specific legislation. Chapter 6 "COMPLETE CLOSING ASSEMBLY" provides useful information for the respect of the Essential Safety Requirements for special types of closing.




1 PRODUCT CONFORMITY

DEA System guarantees the conformity of the product to European Directives 2006/42/CE regarding machinery safety, 2004/108/CE electromagnetic compatibility and 2006/95/CE low voltage electrical equipment. **DEA** System also encloses the manufacturer's Declaration of Conformity with these instructions (see Directive 2006/42/CE Art. 4, paragraph 2).



2 RESIDUAL RISK WARNINGS

 Read these warnings carefully; the failure to respect the following warnings can create risk situations.

WARNING Using this product under unusual conditions not foreseen by the manufacturer can create situations of danger, and for this reason all the conditions prescribed in these instructions must be respected. A1

WARNING Under no circumstances must the product be used in explosive atmospheres or surroundings that may prove corrosive and damage parts of the product. A2

WARNING All installation, maintenance, cleaning or repair operations on any part of the system must be performed exclusively by qualified personnel with the power supply disconnected working in strict compliance with the electrical standards and regulations in force in the nation of installation. A3

WARNING Starting the operator with the lever unit set on the released position may severely injure your arms and legs. Be extremely careful! Release the lever unit only if really necessary: If there is a power supply failure disconnect manually the power supply of the operator by using the opposite switch; in this way, when the power is back you will be able to start the operator only after blocking the lever unit again. A4

WARNING All other adjustment/setting operations beyond the adjustment of the oil flow are made by the manufacturer. Tampering with these settings may cause malfunction and/or situations of risk to people, animals and property. Refrain from performing any operations not authorised by **DEA** System. A5

WARNING Before doing any maintenance operation take off the foundation box lid (by unscrewing the two fixing screws; see F5 page 31); this lid offers protection against the risk of scissor movement due to the presence of moving levers. Once the maintenance operation is completed place back immediately this protection. A6

WARNING Using spare parts not indicated by **DEA** System and/or incorrect re-assembly can create risk to people, animals and property and also damage the product. For this reason, always use only the parts indicated by **DEA** System and scrupulously follow all assembly instructions. A7

WARNING Awareness of the operation of the key-release mechanism (see F8 Page 32) is essential for all users of the automatism because the failure to use the device quickly during emergencies can jeopardise people, animals and property. Enclosure I to these instructions, which the installer is required to deliver to the final user, illustrates operation and can be detached. A8



WARNING To ensure an appropriate level of electrical safety always keep the 230V power supply cables apart (minimum 4mm in the open or 1 mm through insulation) from low voltage cables (motors power supply, controls, electric locks, aerial and auxiliary circuits power supply), and fasten the latter with appropriate clamps near the terminal boards.



WARNING In line with EU Directive 2002/96/EC for waste electrical and electronic equipment (WEEE), this electrical product must not be disposed of as unsorted municipal waste. Please dispose of this product by returning it to your local municipal collection point for recycling.



3 MODELS AND CONTENTS OF THE PACKAGE

The name GHOST 200 identifies a series of underground electro-mechanical operators with different features depending on motor phase power supply and speed.

DEA System articles in the series are listed in the "AVAILABLE MODELS" table.

GHOST 200 is completed by a set of accessories listed in the "PRODUCT ACCESSORIES" table.

Inspect the "Contents of the Package" on Page 30 and compare it with your product for useful consultation during assembly.



4 OPERATING INSTRUCTIONS

In compliance with Directive 2006/42/CE Enclosure I, Point 1.7.4.

4.1 Product description

GHOST 200 is an electromechanical operator for swing gates (see F1, page 30) rotating an articulated arm.

This arm is connected to the gate to be operated by means of the lever unit of the foundation box. The lever unit, that will be properly welded at the time of installation, has a built-in operator unlocking device which will allow you to open the gate even if there is a power supply failure.

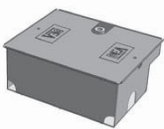
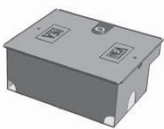
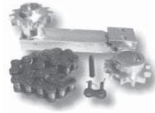

4.2 Technical data

See the "TECHNICAL DATA" table.

4.3 Labelling information

Part of the summarised data for the CE label are listed in the label applied to the product (see Position F7, Page 32); the data regarding the seller are found in the enclosed Warranty, while "Indispensable Operating Safety Elements" are found under Point "4.2 Technical data".

"PRODUCT ACCESSORIES" table

Article Code	Description
215 629000	 Zinc-plated foundation box with release device
215 I 629010	 Stainless steel foundation box with release device
216 629020	 Device to be installed on item art. 215 and 215I to get a 180° angle of opening
218 629030	 Mechanical stop

4.4 Appropriate conditions of use

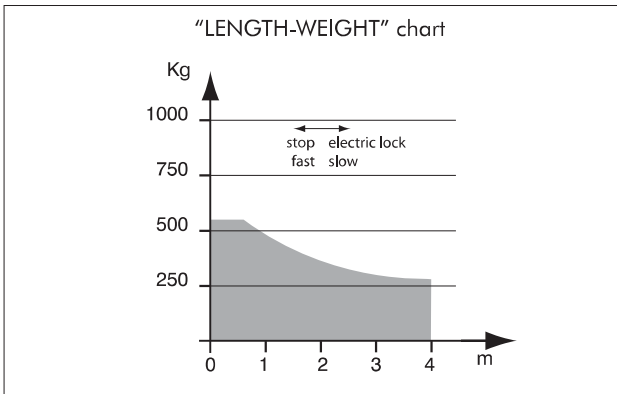
The GHOST 200 is designed for installation in civil and industrial swing gates as an actuator for the operational automatism as shown in F3 on Page 31. By installing the accessory item 216 you may widen the wing angle of opening up to 180°.

The GHOST 200 has been designed and tested for operation under "normal" civil and industrial gate opening conditions; temperature limits, degrees of protection against dust and water, and other data are provided in Point 4.2 "Technical Data".

Satisfactory operation requires the correct positioning of the GHOST 200 operator with respect to the gate (see F4 page 30).

The required automation must be selected according to the gate to be moved; the attrition on the attachments, the weight, the length/height of the gate wing, and the degree of closing of the surfaces are the elements to be considered. The chart "LENGTH-WEIGHT" correlating the length of the gate leaf and its weight in typical situations can be used in selecting the automation according to the gate to be automated.

	200 - 200CL - 200/EN - 200/CLEN	200L	200/24 - 200/24CL
Motor power supply voltage (V)	230 V ~ ±10% (50/60 Hz)		24 V ===
Absorbed power (W)	400	330	150
Max torque (Nm)	320	300	210
Duty cycle (cycles/hour)	20 - 28 (200/EN)		40
Maximum n° of operations in 24 hour	200		280
Built-in capacitor (µF)	12,5		-
Operating temperature range (°C)	-20÷50 °C		
Motor thermal protection (°C)	150 °C		-
Opening time 90° (s)	17	26	16
Weight of product with package (Kg)	14,5		14
Protection degree	IP67		



WARNING The use of the product under unusual conditions not foreseen by the manufacturer can create situations of danger, and for this reason all the conditions prescribed in these instructions must be respected. A1

WARNING Under no circumstances must the product be used in explosive atmospheres or surroundings that may prove corrosive and damage parts of the product. A2

4.5 Instructions for risk-free operation

4.5.1 Transport

The GHOST 200 gate operator is always delivered packed in boxes that guarantee the product adequate protection. Carefully read any warnings or instructions for storage and handling provided on the box.

4.5.2 Installation, assembly and disassembly

The following operations are essential to the correct laying of the product:

- the careful definition of the entire automatic opening layout (see also "6 Complete Closing Assembly"); in particular, after carefully assessing the characteristics of the place you have selected, define the model and the correct positioning of the foundation box. (see F2, F3, F4 Page 30 e 31);
- dig a hole and position the foundation box (see F4, page 30);
- check carefully the correct positioning of the foundation box;
- put the foundation box in concrete;
- position the gate and weld the lever unit to the gate;
- cover with the foundation box protective lid.

WARNING All installation, maintenance, cleaning or repair operations on any part of the system must be performed exclusively by qualified personnel with the power supply disconnected working in strict compliance with the electrical standards and regulations in force in the nation of installation. A3

The necessity of installing reinforcement plates must always be carefully assessed, whenever the remaining part of the structure does not appear sufficiently strong, whenever the metal plate used does not appear thick enough or whenever the morphology of the gate appears to lack solidity.

Keep all welding seams well protected from corrosion.

Give extra attention to the alignment of the attachments and their correct vertical positioning.

4.5.3 Starting

The installation of the product requires masonry and/or welding and electrical connection operations using adequate equipment for the job in complete respect of the accident-prevention standards and regulations in force in the nation of installation.

The product must be electrically connected to a special control unit for gate operators; see the instructions provided for such device for further information.

4.5.4 Use

The product is designed for incorporation in the assembly of devices that comprise the gate's automatism. **DEA** System assumes that it will always be used in compliance with the standards and regulations in force.

All GHOST 200 models have an unlocking system; the working of this system is the following: Once you have unlocked with a special key the spring device contained in the lever unit, the operator is released and, if no other obstructions are present, the gate is free to move without hindrance. The opposite procedure, in other words, positioning the gate on the lever unit and blocking the spring device with the opposite special key, returns the GHOST 200 operator to normal working conditions.

WARNING Starting the operator with the lever unit set on the released position may severely injure your arms and legs. Be extremely careful! Release the lever unit only if really necessary: If there is a power supply failure disconnect manually the power supply of the operator by using the opposite switch; in this way, when the power is back you will be able to start the operator only after blocking the lever unit again. A4

"TROUBLE-SHOOTING" table

MALFUNCTION	CAUSES / SOLUTIONS
When the opening command is given, the gate wing fails to move and the operator's electric motor fails to start	The operator is not receiving correct power supply. Check all connections, fuses, and the power supply cable conditions and replace or repair if necessary
When the opening command is given, the motor starts but the gate wing fails to move	Check that the unlocking system is closed (see F8, page 32)
	Make sure that the electronic device for power adjustment is in good condition
	Check if the gate pushes while closing; the motor electrical connections might be inverted
The operator jerks or is noisy during movement	If the wing of the gate does not move freely, release the piston and readjust the rotation points
	Make sure that the electronic device for electric power adjustment is in good condition
	The power of the gearmotor may be insufficient for the characteristics of the gate's wing; check the choice of model whenever required



4.5.5 Adjustment

In order to install standard products no adjustment is required; while to install GHOST 200 with the accessory “mechanical stop art. 218” you will only have to position the stop blocks by unscrewing their fixing screws; then position them correctly, have them run along the apposite slots and tighten up the two screws again (see F6 page 32)

WARNING All the other adjustment/setting operations beyond the adjustment of the oil flow are made by the manufacturer. Tampering with these settings may cause malfunction and/or situations of risk to people, animals and property. Refrain from performing any operations not authorised by **DEA** System.

4.5.6 Maintenance and repair

Good preventive maintenance and regular inspection ensure long working life (see also “Warranty”). Consult the “TROUBLE-SHOOTING” table (see page 9) whenever anomalies are observed in order to find the solution to the problem and contact **DEA** System directly whenever the solution required is not provided.

The inspection/maintenance operations to be routinely scheduled in the “complete automation maintenance handbook” are:

INTERVENTION TYPE	PERIODICITY
cleaning of external	6 months
checking of screw tightening	6 months
checking of release mechanism operation	6 months
check that water flows out properly from the foundation box	6 months
greasing of articulated joint	1 year

WARNING Before doing any maintenance operation take off the foundation box lid (by unscrewing the two fixing screws; see F5 page 30); this lid offers protection against the risk of scissor movement due to the presence of moving levers. Once the maintenance operation is completed place back immediately this protection. A6

WARNING All installation, maintenance, cleaning or repair operations on any part of the system must be performed exclusively by qualified personnel with the power supply disconnected working in strict compliance with the electrical standards and regulations in force in the nation of installation. A3

WARNING The use of spare parts not indicated by **DEA** System and/or incorrect re-assembly can create risk to people, animals and property and also damage the product. For this reason, always use only the parts indicated by **DEA** System and scrupulously follow all assembly instructions. A7

4.6 Training

After installation and setting, the correct operation of the complete automatism must be carefully illustrated to the final user.

GHOST 200 gate operator requires careful instruction on the release mechanism (see “Enclosures”) and on the specific maintenance schedule (see Point 4.5.6.).

WARNING Awareness of the operation of GHOST 200 key-release mechanism (see F8 Page 32) is essential for all users of the automatism because failure to use the device quickly during emergencies can jeopardise people, animals and property. Enclosure I to these instructions, which the installer is required to deliver to the final user, illustrates operation and can be detached.

4.7 Inappropriate use

Chapter “4.4 Appropriate conditions of use” describes the conditions for which the product has been designed and tested. The product must never be used for other purposes.

WARNING The use of the product under unusual conditions not foreseen by the manufacturer can create situations of danger, and for this reason all the conditions prescribed in these instructions must be respected. A1

WARNING Under no circumstances must the product be used in explosive atmospheres or surroundings that may prove corrosive and damage parts of the product. A2



5 SPARE PARTS LIST

The list of spare parts that can be ordered (Pages 28 and 29) is a detailed list that accompanies the exploded view of the product and must be used to order spare parts.

The following data must always be provided when ordering spare parts:

- the code of the product (seen on the product label; see F7, Page 32),
- the part’s position number in the exploded view,
- if available, the product’s purchase date may be useful in some cases.



6 COMPLETE CLOSING ASSEMBLY

This chapter illustrates the typical installation of a complete automation for the purpose of informing and assisting the installer in the selection of the various parts to be used in compliance with Machinery Directive (2006/42/CE) and European Safety Standards (EN 12453 - EN 12445) for gate installation.

The data provided in this chapter are neither complete nor exhaustive, and **DEA** System declines all liability for any errors, omissions or inaccuracies that may occur.

6.1 Minimum level of protection provided by the safety edge

Among the most serious risks to be considered when automating of a swing gate is the risk of crushing between two wings or between one wing and its stop during closing. Regulations prescribe the adoption of one of the following types of controls against such risks depending on the use foreseen for the gate.

An appropriate type of operating control board must be used according to the gate type and according to its usage, as provided for by the quoted regulations (see “OPERATING CONTROL” table).

6.2 Risk of crushing in the opening area

The risk of being crushed can also arise in the area between the gate opening and the wall or fence behind it. F9 on Page 32 provides the measurements that must be observed whenever measures are not taken to limit the impact force or whenever presence detection systems are not used.

6.3 Impact in the opening/closing area

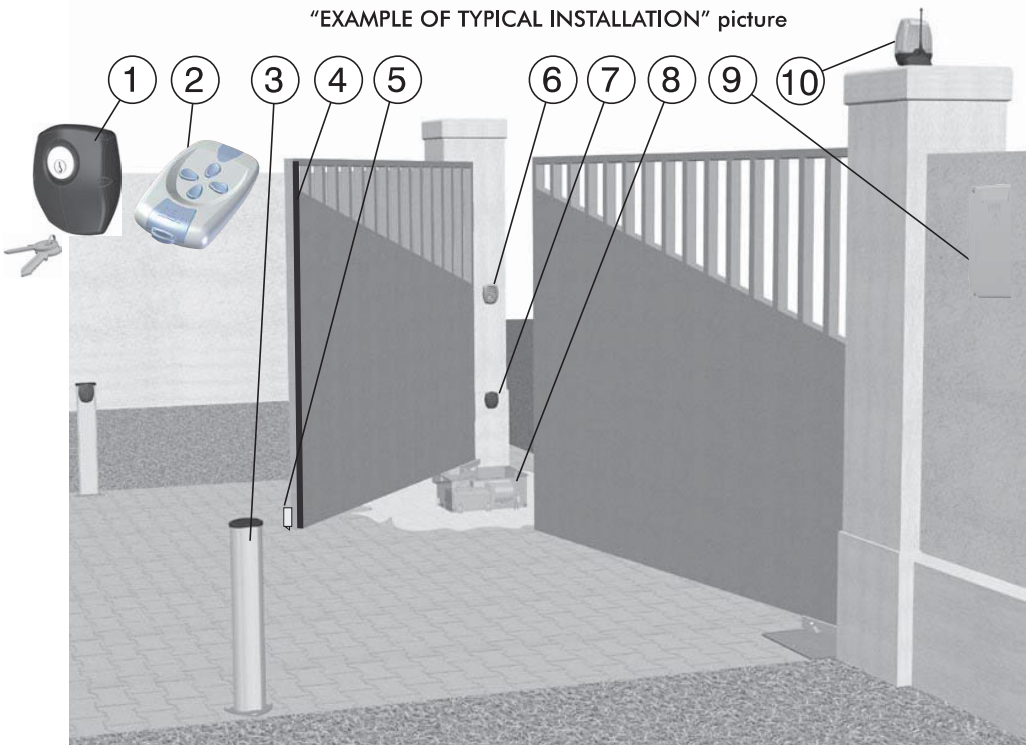
In order to avoid being crushed by the gate wing in the closing area, install a pair of photocells (A) (recommended height: 500 mm) in order to detect the presence of the test parallelepiped (B) (height: 700 mm) positioned as shown in F10 on Page 32.

Note. The presence detection test sample is a parallelepiped with 3 sides with light-coloured reflecting surfaces and 3 sides with dark-coloured, opaque surfaces.

In order to further reduce the risk of impact with the gate wing in the opening area, an extra pair of photocells (C) (recommended height: 500 mm) can be installed for the detection of the presence of the test parallelepiped (D) (height: 700 mm) positioned as shown in F10 on Page 32.



"EXAMPLE OF TYPICAL INSTALLATION" picture



Pos.	Description
1	102 Lux key switch
2	Remote-control
3	Pilly 60 column
4	Safety edge
5	Electric lock
6	FLIC/rad digital keypad
7	104 Lux series photocells
8	GHOST
9	Control board
10	Lumy flashing light

"OPERATING CONTROL" table

Type of control	Type of use		
	Informed users (private areas)	Informed users (public areas)	Uninformed users
Person-present control	Pushbutton control	Pushbutton control with key	The person-present control is not possible
Pulse control with the gate in sight	Force limitation or presence detectors	Force limitation or presence detectors	Force limitation and photocells or presence detectors
Pulse control with the gate not in sight	Force limitation or presence detectors	Force limitation and photocells or presence detectors	Force limitation and photocells or presence detectors
Automatic control (i.e. control with timed closing)	Force limitation and photocells or presence detectors	Force limitation and photocells or presence detectors	Force limitation and photocells or presence detectors

RESPONSIBILITIES OF THE INSTALLER

Remember that anyone who sells and/or motorises doors/gates becomes the manufacturer of the automatic door/gate machine and must therefore prepare and preserve a **technical folder** that contains the following documents (see Machinery Directive Enclosure V):

- Assembly drawing of the automatic door/gate;
- Electrical connection and control circuit wiring diagram;
- Risk analysis including: a list of the essential safety requirements provided in Machinery Directive Enclosure I; a list of the risks posed by the door/gate and the description of the solutions adopted.
- Keep these operating instructions in a safe place together with the instructions for all the other components;
- Prepare these operating instructions and general safety warnings (by filling in these operating instructions) and hand a copy to the final user;
- Fill in the maintenance handbook and hand a copy to the final user;
- Draft the CE declaration of conformity and hand a copy to the final user;
- Fill in the complete CE label or plate and apply it to the door/gate.

Note: The technical folder must be preserved for inspection by the competent national authorities for at least ten years from the date of construction of the automatic door/gate.



Esempio di installazione tipica - Example of typical installation - Exemple d'installation typique
Ejemplo de instalación típica - Exemplo de instalação típica

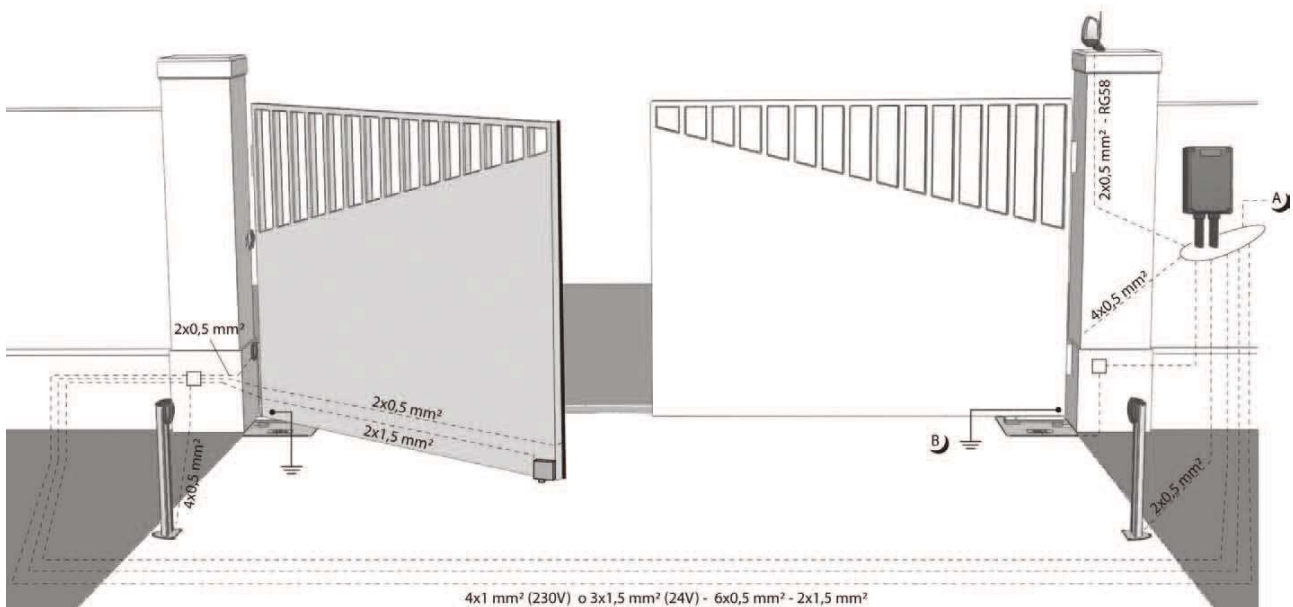
DEA System fornisce queste indicazioni che si possono ritenere valide per un impianto tipo ma che non possono essere complete. Per ogni automatismo, infatti, l'installatore deve valutare attentamente le reali condizioni del posto ed i requisiti dell'installazione in termini di prestazioni e di sicurezza; sarà in base a queste considerazioni che redigerà l'analisi dei rischi e progetterà nel dettaglio l'automatismo.

DEA System provides the following instructions which are valid for a typical system but obviously not complete for every system. For each automatism the installer must carefully evaluate the real conditions existing at the site. The installation requisites in terms of both performance and safety must be based upon such considerations, which will also form the basis for the risk analysis and the detailed design of the automatism.

DEA System fournit ces indications que vous pouvez considérer comme valables pour une installation-type, même si elles ne peuvent pas être complètes. En effet, pour chaque automatisme, l'installateur doit évaluer attentivement les conditions réelles du site et les pré-requis de l'installation au point de vue performances et sécurité ; c'est sur la base de ces considérations

DEA System consiglia di inserire il quadro di comando (scheda elettrica + box) in scatole di derivazione commerciali - DEA System suggests to shelter the control board (control board card + box) inside a connector block box (not supplied) - DEA System vous conseille d'insérer l'armoire de commande dans (carte électronique + boîte) une boîte étanche de dérivation (pas fournie) - DEA System aconseja de insertar el cuadro de maniobra (tarjeta electrónica del cuadro de mando + caja) en una caja de derivación (no provista) - Dea System aconselha instalar o quadro de comando (quadro eléctrico + caixa) numa caixa de derivação (não fornecida)

Per un corretto uso ai fini della sicurezza il motore deve essere collegato unicamente ad una centrale di comando Dea System 224RR o 224RR/B. To ensure proper and safe use of operators, connect them only to Dea System control panels 224RR o 224RR/B. Afin d'assurer un emploi correct au point de vue de la sécurité, le moteur doit être branché à une armoire de commande Dea System 224RR o 224RR/B. Para un empleo correcto en cuanto a seguridad, el motor tiene que conectarse exclusivamente a una central de control Dea System 224RR o 224RR/B. Para um uso certo em relação à segurança, o motor deve ser ligado unicamente a uma central de comando Dea System 224RR o 224RR/B.



- A)** Collegarsi alla rete 230 V \pm 10% 50-60 Hz tramite un interruttore onnipolare o altro dispositivo che assicuri la onnipolare disinserzione della rete, con una distanza di apertura dei contatti \geq 3 mm
Make the 230V \pm 10% 50-60 Hz mains connection using an omnipolar switch or any other device that guarantees the omnipolar disconnection of the mains network with a contact opening distance of 3 mm
Connectez-vous au réseau 230 V \pm 10% 50-60 Hz au moyen d'un interrupteur omnipolaire ou d'un autre dispositif qui assure le débranchement omnipolaire du réseau, avec un écartement des contacts égal à 3 mm.
Efectuar la conexión a una línea eléctrica 230 V \pm 10% 50-60 Hz a través de un interruptor omnipolar u otro dispositivo que asegure la onnipolar desconexión de la línea, con 3 mm de distancia de apertura de los contactos.
Ligue na rede de 230 V. \pm 10% 50-60 Hz mediante um interruptor omnipolar ou outro dispositivo que assegure que se desliga de maneira onnipolar da rede, com abertura dos contactos de pelo menos 3 mm. de distância
- B)** Collegare a terra tutte le masse metalliche - All metal parts must be grounded - Connectez toutes les masses métalliques à la terre - Conectar con la tierra todas las masas metálicas - Realize ligação à terra de todas as massas metálicas



Lista parti ordinabili, Spare parts list, Liste pièces ordonnables, Lista partes que pueden encargarse,
Lista para pedido de peças de reposição

cod. 921010B leva del riduttore
reduction gear lever
levier du reducteur
palanca del reductor
alavanca do redutor

cod. 921090L cuscinetto+anello
bearing+ring
coussinet+anneau
cojinete+anillo
rolamento+anel

cod. 921100M cuscinetto+anello di tenuta
bearing+choke ring
coussinet+anneau d'étanchéité
cojinete+anillo aislador
rolamento+anel de vedação

cod. 921040E albero motore
motor shaft
arbre moteur
eje motor
veio do motor

cod. 157006 anello di tenuta
choke ring
anneau d'étanchéité
anillo aislador
anel de vedação

cod. 121017 cuscinetto
bearing
coussinet
cojinete
rolamento

cod. 340640 boccola in bronzo
bronze bushing
douille de bronze
casquillo de bronce
casquilho em bronze

cod. 126011 pignone
pinion
pignon
piñón
pinhão

cod. 921020C cassa riduttore
gearmotor casing
caisson reducteur
caja reductor
caixa do redutor

cod. 921030D statore - art. 200
stator - art. 200
estator - art. 200
estator - art. 200

cod. 921031D statore - art. 200L
stator - art. 200L
estator - art. 200L
estator - art. 200L

cod. 921032D statore - art. 200 (L=8m)
stator - art. 200 (L=8m)
estator - art. 200 (L=8m)
estator - art. 200 (L=8m)

cod. 921060G albero di trasmissione
transmission shaft
arbre de transmission
eje de transmisión
veio de transmissão

cod. 360211 ingranaggio in bronzo
bronze bushing
douille de bronze
casquillo de bronce
casquilho em bronze

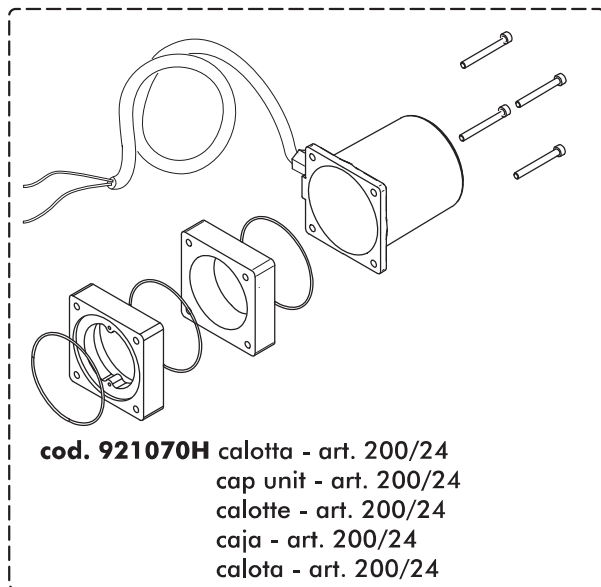
cod. 460102 vite senza fine
worm screw
vis sans fin
tornillo sinfin
parafuso sem fim

cod. 430230 catena+spina
chain+pin
chaîne+goupille
cadena+clavija
corrente+ficha

cod. 121013 cuscinetto
bearing
coussinet
cojinete
rolamento

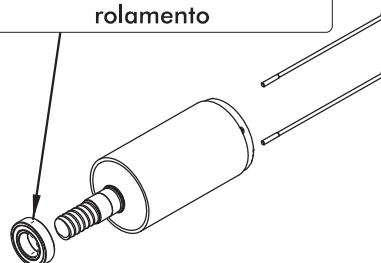


Lista parti ordinabili, Spare parts list, Liste pièces ordonnables, Lista partes que pueden encargarse,
Lista para pedido de peças de reposição



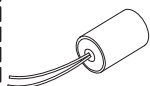
cod. 921070H calotta - art. 200/24
cap unit - art. 200/24
calotte - art. 200/24
caja - art. 200/24
calota - art. 200/24

cod. 121420 cuscinetto
bearing
coussinet
cojinete
rolamento

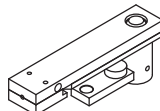


cod. 921080I motore 24V
24V motor
moteur 24V
motor 24V
motor 24V

cod. 162003 condensatore
capacitor
condensateur
condensador
condensador



cod. 480660 sblocco per cassa di fondazione zinc.
unlocking device for galvanized steel box
déverrouillage pour caisson zingué
desbloqueo para caja de fundación galvanizada
desbloqueio para caixa de fundação zincado



cod. 430110 sacchetto accessori
accessories small bag
sachet accessoires
bolsita accesorios
saco de acessórios



cod. 330610 chiave di sblocco
release key
clavette déverrouillage
chaveta de desbloqueo
chave de desbloqueio

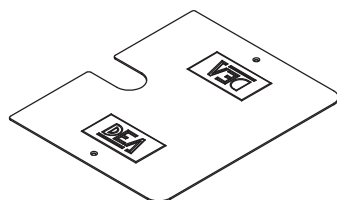


cod. 386191 coperchio neutro inox
neutral stainless steel cover
couvercle neutre inox
tapa neutro inox
tampa neutra inox

cod. 386190 coperchio marchiato inox
marked stainless steel cover
couvercle marqué inox
tapa marcada inox
tampa com marca inox

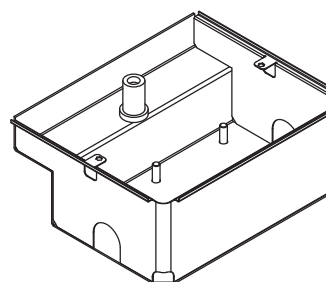
cod. 386331 coperchio neutro zinc.
neutral galvanized steel cover
couvercle neutre zinqué
tapa neutro galvanizada

cod. 386330 tampa neutra galvanizada
coperchio marchiato zinc.
marked galvanized steel cover
couvercle marqué zinqué
tapa marcada galvanizada
tampa com marca galvanizada

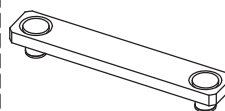


cod. 386180 cassa di fondazione inox
stainless steel foundation box
caisson inox
caja de fundación inox
caixa de fundação inox


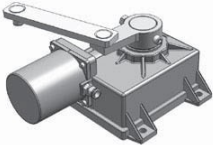
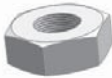

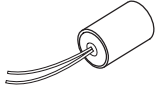
cod. 386320 cassa di fondazione zinc.
galvanized steel foundation box
caisson zingué
caja de fundación galvanizada
caixa de fundação galvanizada



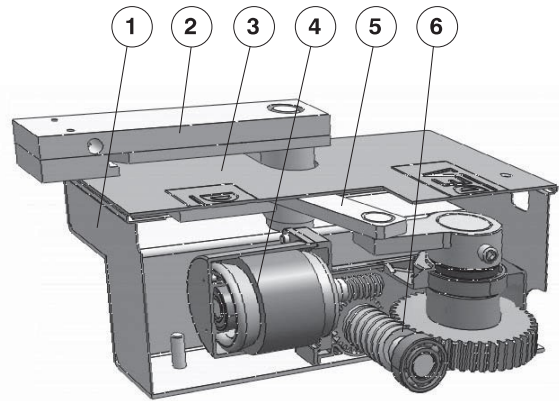
cod. 350100 piatto biella zinc.
connecting rod lever
levier bielle
plato biela
prato da biela





 <p>Contenuto dell'imballo Contents of the package Contenu de l'emballage Contenido del embalaje Conteúdo da embalagem</p>	
	x1
	x4
	x4
Art. 200, 200L	
	x1

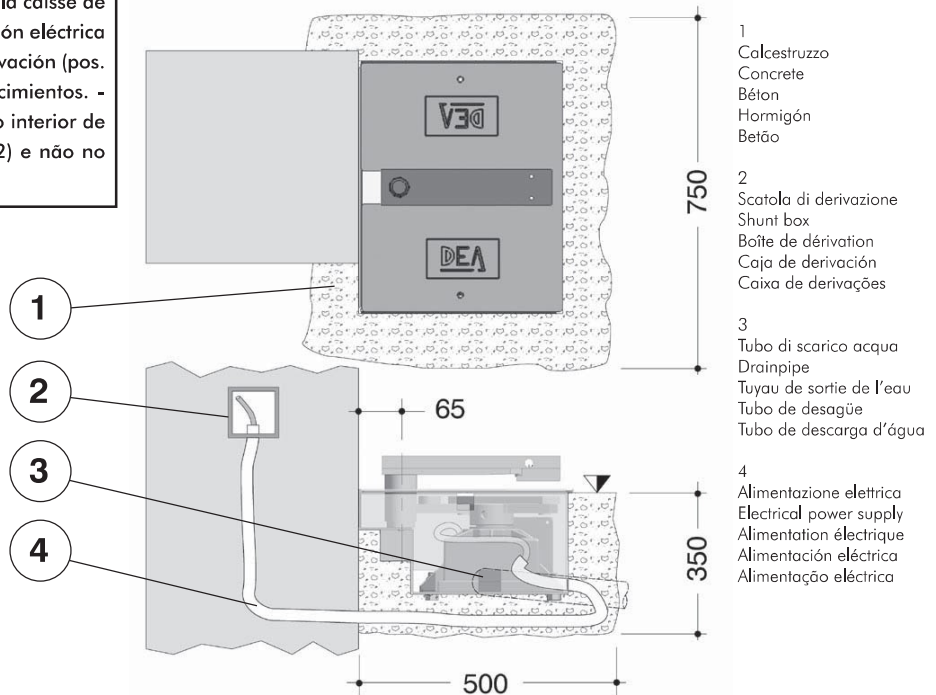
F1 Elementi del prodotto, Product elements, Eléments du produit, Elementos del producto, Elementos do produto



1	2	3	4	5	6
Cassa di fondazione Foundation box Caisse de fondation Caixa de cimentación Caixa de fundações	Gruppo leva Lever unit Groupe du levier Grupo palanca Grupo alavanca	Coperchio Lid Couvercle Tampo	Gruppo motore Motor unit Groupe moteur Grupo motor Grupo do motor	Braccio snodato Articulated arm Bras articulé Braço articulado	Riduttore Operator Réducteur Redutor

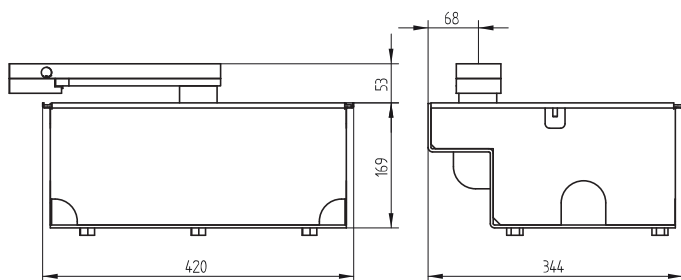
F4 Installazione cassa di fondazione, Installation of the foundation box, Installation caisse de fondation, Instalación de la caja de cimentación, Instalação da caixa de fundações

Eseguire il collegamento elettrico all'interno di una scatola di derivazione (pos.2) e non all'interno della cassa di fondazione.
- **Make** all electrical connections inside a connector block box (pos. 2) and not in the foundation box. - **Exécutez** le branchement électrique dans une boîte étanche de dérivation (pos. 2) et pas dans la caisse de fondation. - **Efectuar** la conexión eléctrica en el interior de la caja de derivación (pos. 2) y no dentro de la caja de cimientos. - **Efetuar** a conexão eléctrica ao interior de uma caixa de derivação (pos.2) e não no interior da caixa de fundação.

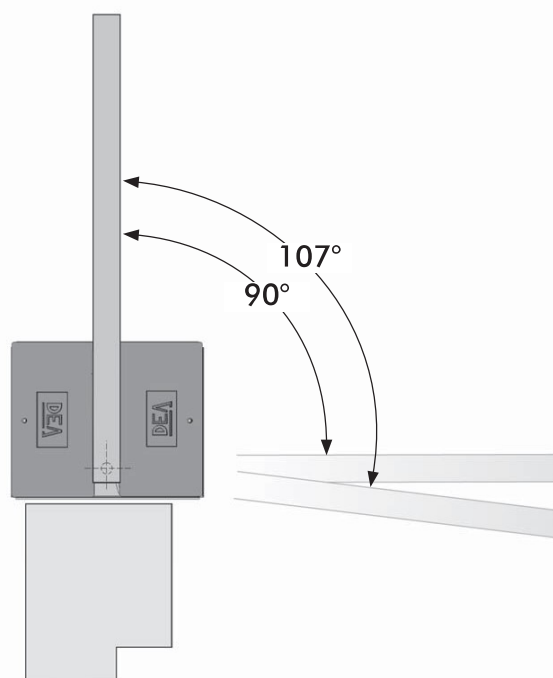




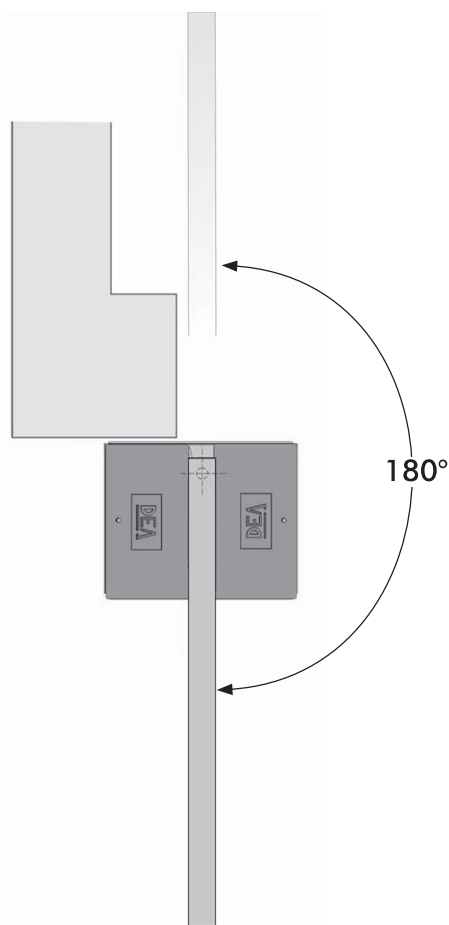
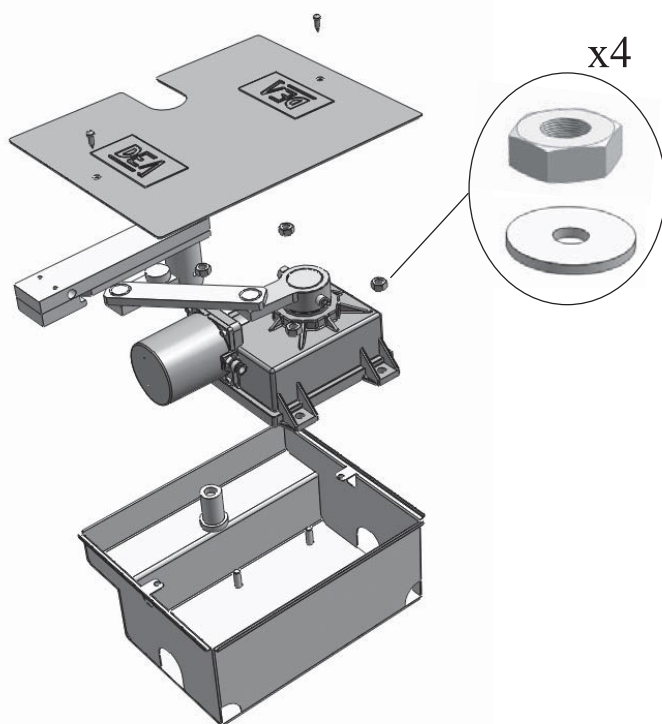
F2 Ingombri prodotto, Product dimensions, Cotes d'encombrement
 du produit, Espacio ocupado por el producto, Medidas máximas
 do produto



F3 Misure installazione. Installation measurements,
 Mesures pour l'installation, Medidas instalación,
 Medidas para instalação

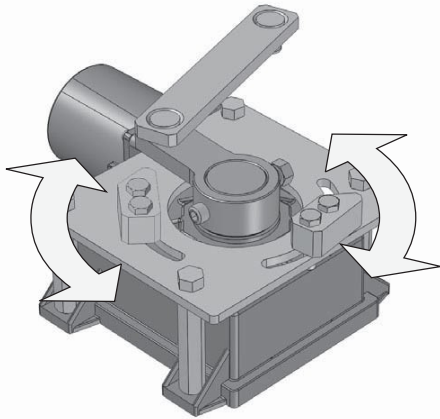


F5 Assemblaggio riduttore, Gearmotor assembly, Assemblage
 réducteur, Montaje del reductor, Montagem do reductor

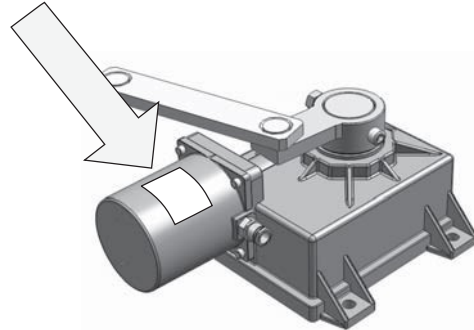




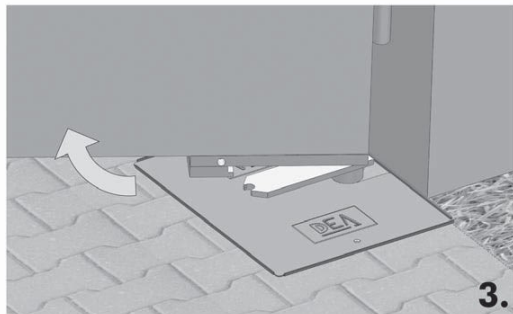
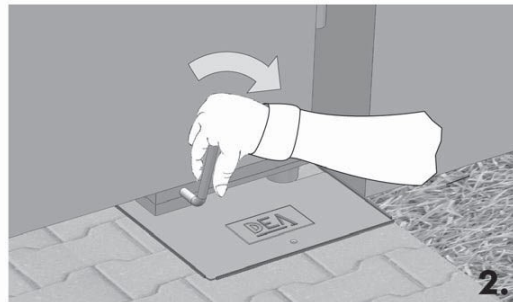
F6 Regolazione finecorsa, Limit switch adjustment,
Réglage fin de course, Regulación tope,
Regulação do final de percurso



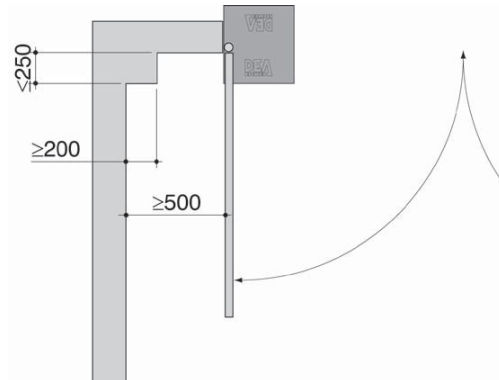
F7 Posizione etichetta, Label position, Position étiquette,
Posición etiqueta, Posição da etiqueta



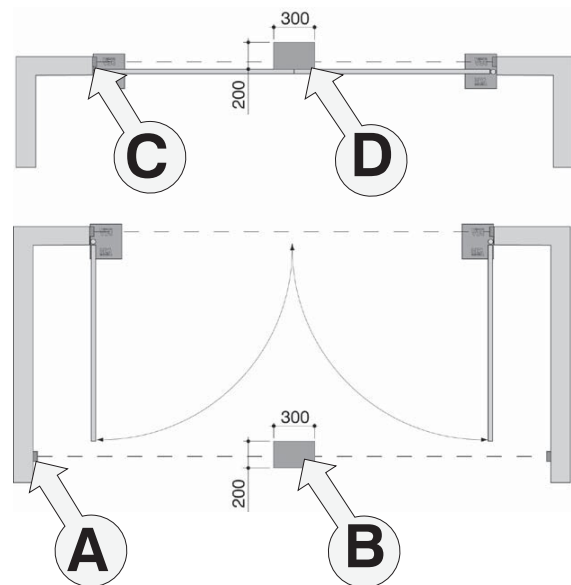
F8 Sblocco manuale, Manual release, Déverrouillage manuel,
Desbloqueo manual, Desbloqueio manual



F9 Distanze antischacciamento, Crushing prevention
safety distances, Distances anti-écrasement, Distancias
anti aplastamiento, Distância para evitar esmagamento



F10 Distanze installazione fotocellule, Photocell instal-
lation distances, Distances installation photocellules, Di-
stancias instalación fotocélulas, Distância da instalação
das fotocélulas



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