

User manual



AUTOMATIC DOOR OPERATOR NEO-100

Table of contents

Safety instructions	3
Overview	4
Technical information	5
Installation example	6
Installation of mounting plate and door operator	6
Outward opening door: Installation with push arm (door operator inside)	7
Inward opening door: Installation with pull arm (door operator inside)	8
KytKentä	9
Button functions	11
Settings	12
General settings 1-22	12
Advanced settings	13
Kauko-ohjaimen toiminnot	14
Adding a remote control	14
Deleting remote controls	14
Digital display code table	15



Safety instructions

This manual is intended for use by electrical professionals. All installation connections and adjustments must be made in accordance with this instruction manual.

- **Before installation**

Check for transport damages, do not install / use a damaged unit.

Make sure that the strength and stability of the wall and door structures are sufficient.

- **Connection**

Only professional electricians are allowed to make electrical connections.

Make sure the power supply is turned off before making any connections.

This product must be earthed.

- **Before turning on the power**

Ensure correct supply voltage 230VAC.

Make sure that the input and output connections are connected correctly, and the connectors are tight. Improper connection can damage the door operator.

- **Always switch off the power before installation or maintenance and make sure that power is disconnected.**

Read the manual carefully before installing the product.

Improper installation can be fatal.

The manufacturer or distributor is not responsible for the consequences of incorrect installation or use.

Overview

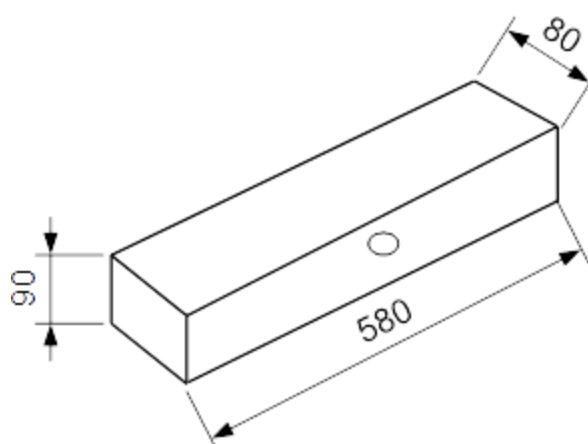
Automatic door operator



Accessories



Dimensions



Technical information

Model	NEO-1000
Door max. weight	100kg
Door max. width	1200mm
Weight	6kg
Service life	More than 3.000.000 operations
Installation method	Surface mounting
Voltage output for locking	12VDC With included relay card 12V AC/DC - 30V AC/DC
Door hold-open time	0-99s, adjustable
Opening angle	45°-180°, adjustable
Supply voltage	230VAC
Max. power	45W
Standby power consumption	< 2W
Remote control distance	Over 30m
Operating temperature	-40°C - 85°C
Protection class	IP41
Dimensions	580mm x 80mm x 90mm

Approvals

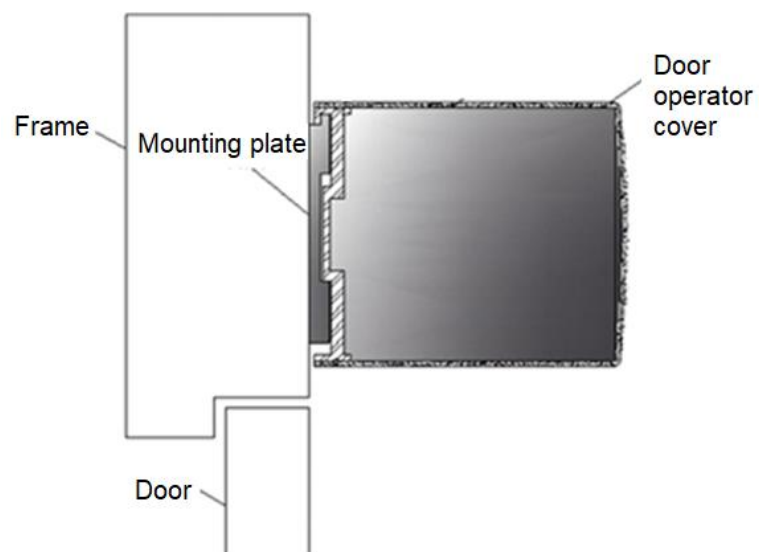
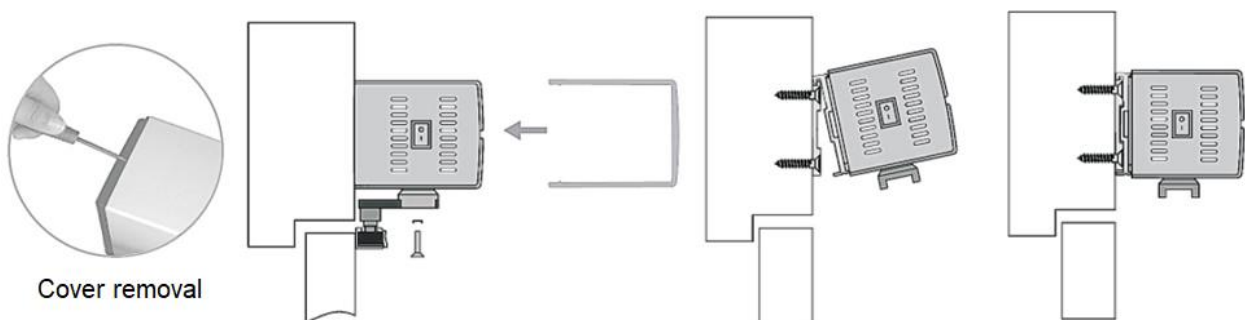
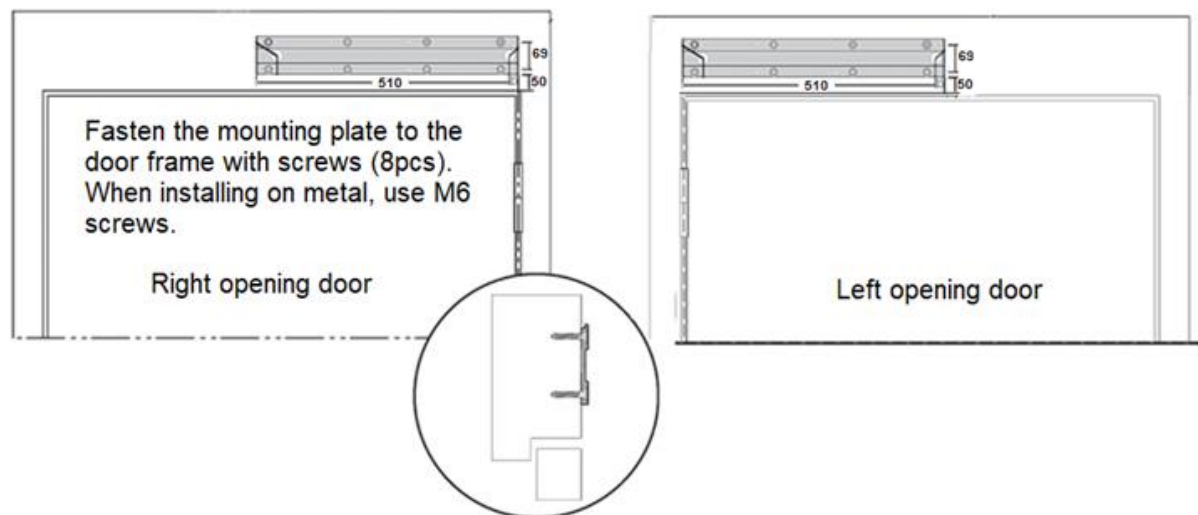
EU Directive	Test Standard(s)
2011/65/EU (RoHs)	EN 62321-1:2013 EN 62321-2:2014 EN 62321-3-1:2014 EN 62321-4:2014+A1:2017 EN 62321-5:2014 EN 62321-6:2015 EN 62321-7-1:2015 EN 62321-7-2:2017 EN 62321-8:2017

EU Directive	Test Standard(s)
2014/30/EU (EMC)	EN IEC 61000-6-1:2019 EN 61000-6-3:2007/A1:2011 /AC:2012

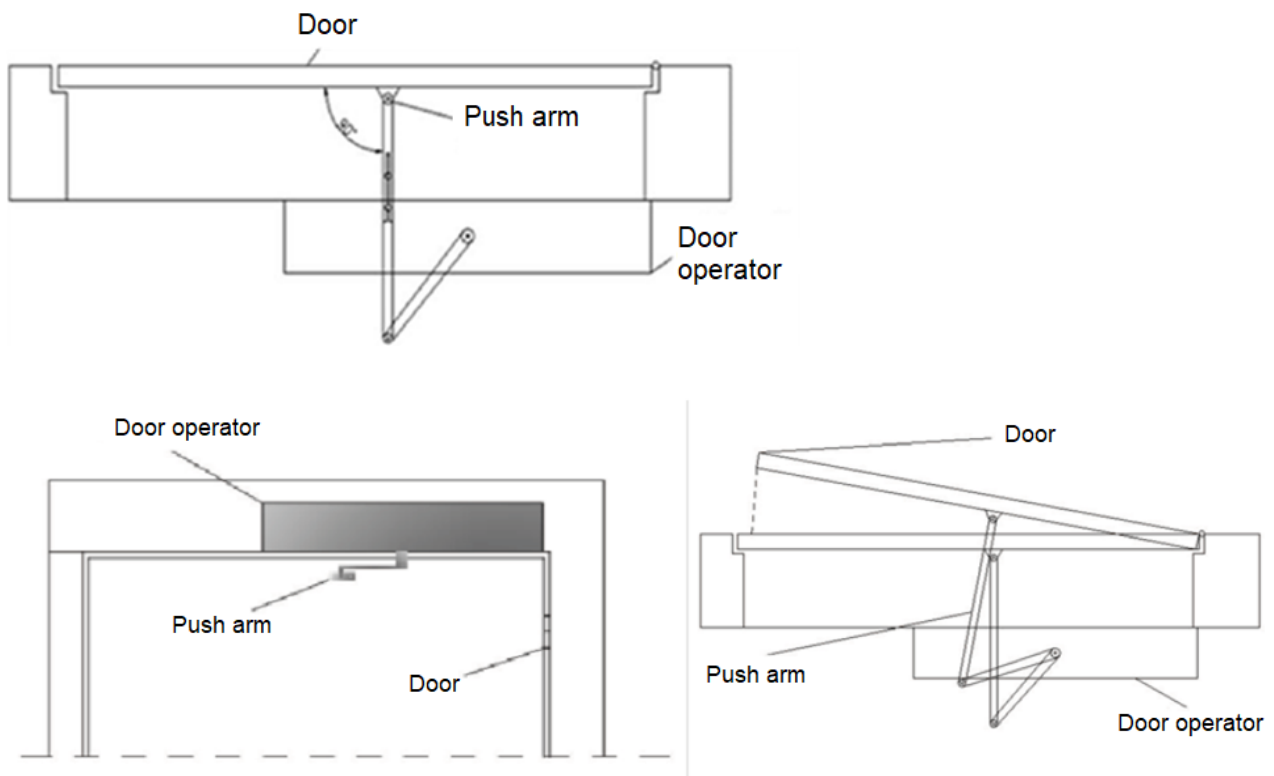


Installation example

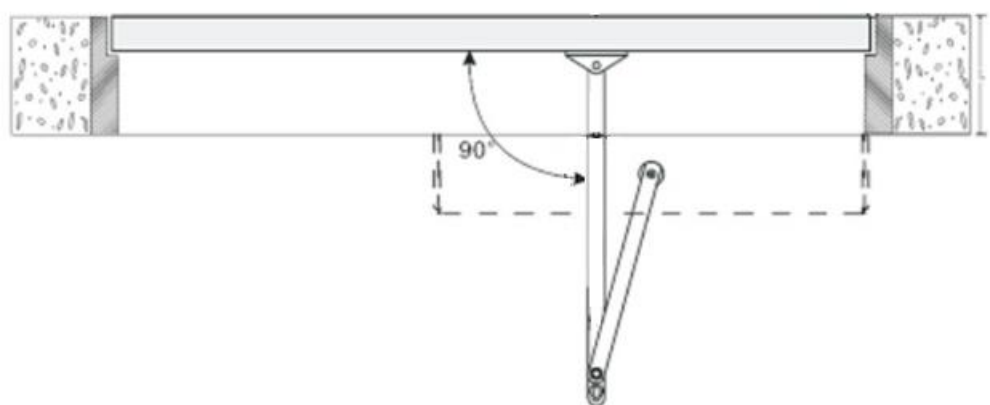
Installation of mounting plate and door operator



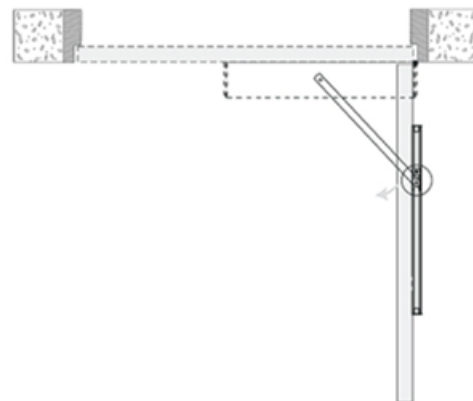
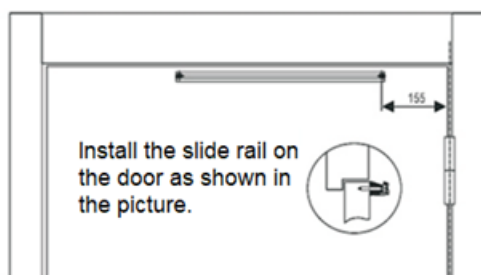
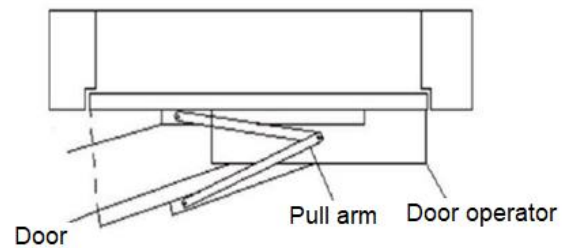
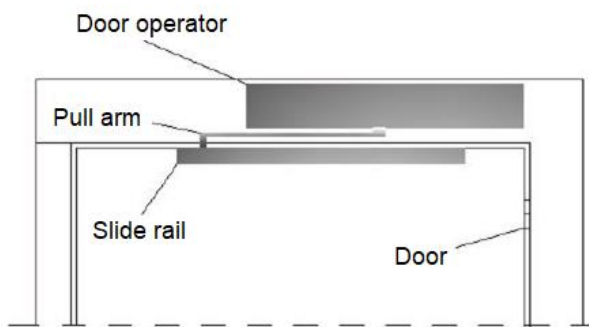
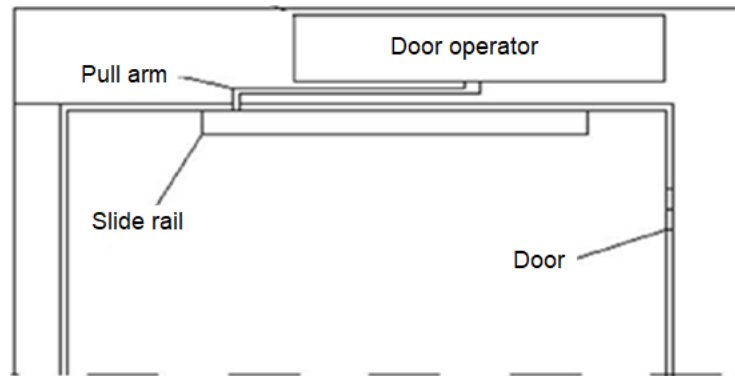
Outward opening door: Installation with push arm (door operator inside)



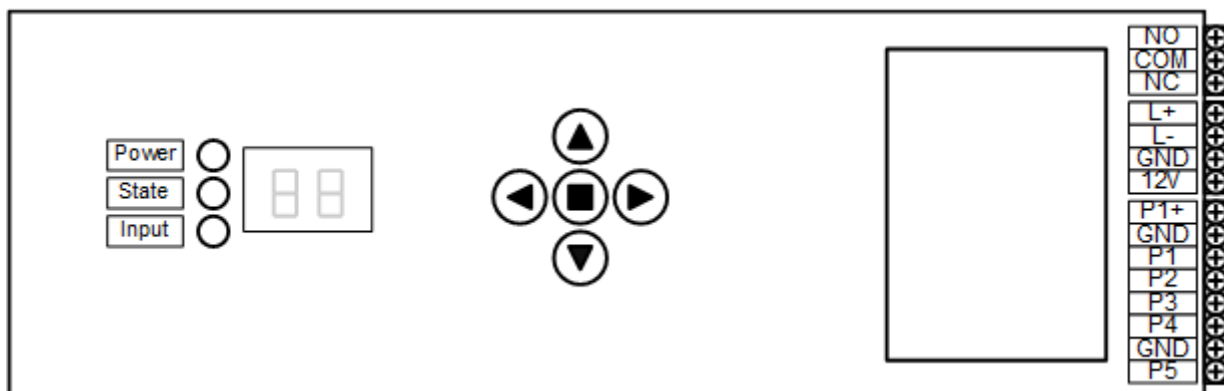
Loosen the screws to set the push arm at a 90-degree angle to the door.



Inward opening door: Installation with pull arm (door operator inside)



KytKentä



NO	NO, connected when the door is open
COM	COM
NC	NC, connected when the door is closed

L+	Electric lock output +12VDC*
L-	Electric lock output -12VDC*
GND	Voltage output -12VDC
12V	Voltage output +12VDC, max 500mA

P1+	Voltage signal 12VDC
GND	GND
P1	Door open signal
P2	Door close signal
P3	Closing door safety sensor input
P4	Opening door safety sensor input
GND	GND
P5	Synchronization of two door operators

NO/COM/NC: Potential-free changeover switch.

P1 +: Door open signal from access control. The input is a voltage signal of 12VDC.

P1/GND: Door open signal. Sensor signal.

P2/GND: Door close signal. The door does not open when the signal is active.

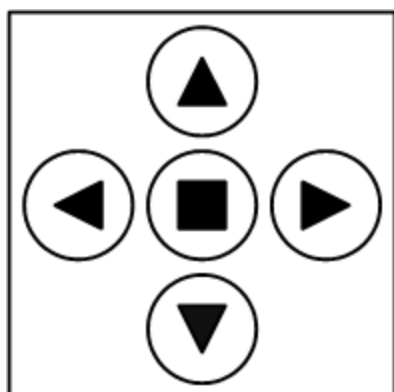
P3/GND: Safety sensor for closing door. When the sensor detects, the door opens.

P4/GND: Safety sensor for opening door. When the sensor detects, the door stops.

P5/GND: Synchronization of two door operators. Both door operators operate simultaneously.

* Use the included relay card if voltage used for locking is other than 12VDC.

Button functions



▲	Option+ : Scroll up the settings
▼	Option- : Scroll down the settings
▶	Parameter- : Increase parameter
◀	Parameter+ : Decrease parameter
■	Save: Save setting / Exit

- The door operator has a self-learning process when it is turned on or a new setting is made. The door operator drives the door in its closing direction and stops it when the door is closed in the correct position.
If the device cannot detect the correct stop position, the error message "E08" is displayed.
- If the door closes in the wrong direction, see setting no. 9.
- To skip the self-learning process, press the ▲ button to enter the setting mode.

Settings

Press the ▲ button to enter the setting mode.

Use the ▲ and ▼ buttons to select the setting you want to set.

Press the ◀ decrease or ▶ increase button to set the desired value.

To save the setting and exit the setting mode, press the ■ button.

General settings 1-22

Setting number	Function	Setting range	Factory setting	Additional information
1	Opening speed	0-30	20	The higher the value, the faster the door opens
2	Closing speed	0-30	20	The higher the value, the faster the door closes
3	Opening angle	0-99	20	The higher the value, the larger the opening angle 45-180 degrees
4	Unlock delay	0-99	0	The lock is released first, after which the door opens after a set delay of 0-1 seconds
5	Door hold open time	0-99	1	0-99 seconds opening time after the door has opened
6	Closing door anti-collision delay	0-30	10	The smaller the delay, the faster the door opens in a collision
7	Closing force	0-10	5	The higher the value, the greater the closing force
8	Lock mode selection	0-4	1	1: The door opens by pushing / pulling 2: - 3: Magnetic lock 4: Electric bolt lock
9	Opening direction	0-1	0	0: left 1: right
10	Adding a remote control	0-40	0	see Adding a remote control Additional controller [80410] RCT-8100 or [33340] RCT-1224
11	Slow closing angle	0-50	0	The higher the value, the greater the angle at which the door closes slowly
12	Slow opening angle	0-50	0	The higher the value, the greater the angle at which the door opens slowly
13	Opening door anti-collision delay	0-30	10	The lower the delay, the faster the door stops in a collision
15	Closing speed after reset	0-20	0	Closing speed after reset
16	*P1+ signal mode	0-1	0	Standard voltage signal input Lock signal ends
17	*P1, P2 Port function	0-2	0	P1 Automatic switch P2 Forced off

				1: P1 normally open P2 close 2: P1 Point move open-close
18	Motor torque	0-20	20	0: minimum 20: maximum
19	Opening delay	0-85	0	Opening delay for synchronization of two door operators
21	Restore factory settings	0-10	0	0: empty 1: resets settings 1-22 settings to factory defaults
22	Delete the remote controls	0 or 10	0	0: empty 10: Delete all remote controls

Advanced settings

Press the ▼ button for five seconds to enter the advanced setting mode.

Use the ▲ and ▼ buttons to select the setting you want to set.

Press the ◀ decrease or ▶ increase button to set the desired value.

To save the setting and exit the setting mode, press the ■ button.

Asetuksen numero	Toiminto	Asetusalue	Lisätiedot
27	Encoder direction	0-1	0: normal 1: reverse
28	Type of electric lock	0-1	0: power on: locked 1: power off: locked
29	Windproof mode	0-1	0: off 1: windproof
31	Protected mode	0-2	0: Lock release 1: Access control 2: Autoreset

Kauko-ohjaimen toiminnot



Automatic mode. The door opens when the button is pressed and closes normally.



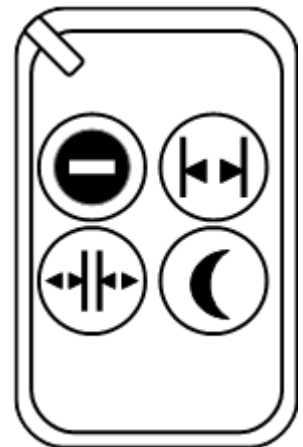
Hold-open mode. The door opens and stays open.



Not in use.



Sensor and access control signals disabled.
The door can only be controlled with the remote control.



Adding a remote control

1. Go to setting no. 10 and press the parameter increase or decrease button.
2. Press any key on the remote control.
3. The value of the digital display increases by 1.
4. The remote control has been successfully added.

Repeat the above steps to add more remote controls.

Additional controller [\[80410\] Remote control for door operators RCT-8100](#)
or [\[33340\] RCT-1224 Wireless transmitter, 433Mhz](#) (only automatic mode/open function)

Maximum quantity 40 pcs

Deleting remote controls

1. Got to setting no. 22
2. Set value to 10
3. Press the Save button
4. All the remote controls have been successfully deleted.

Digital display code table

Error code	Cause	Solution
E0	System error	Replace the controller
E1	The motor is not connected	Check motor connection
E2	Motor line failure	Check motor connection, replace the motor
E3	Electric lock over current	Check that the electric lock is not short-circuited and the current does not exceed 1A
E4	Too high DC voltage	Check 12V voltage port input and lock
E5	Too low DC voltage	Check 12V voltage port input and lock
E6	Too high AC voltage	Check voltage
E7	Too low AC voltage	Check voltage
E8	No door was detected	Check the attachment of the pull and push arm
E9	The door does not close	Check the door, remove obstacles in front of the door