

Operating Instructions

Switch Butler DSE 409E

For your safety.
Do not fail to read before putting into operation!

Models: Digital operation Type 898 401 for 230VAC

Introduction

Dear customer

As with all electrical equipment, also with this appliance special care is called for to avoid injuries, fire - or equipment damage. Please study these operating instructions before putting the appliance into operation and comply with the safety remarks.

Use of the Operating Instructions

These operating instructions cannot take every conceivable application into consideration. For additional information or in case of problems, which are not dealt with in sufficient detail in these operating instructions, please consult your specialist dealer. Keep these operating instructions carefully and if so required pass them on to any later users.

General Description

The Switch Butler (DSE 409) utilizes the public telephone network in conjunction with a paging network for controlling electrical consumer equipment. There is no fixed subscription fee. The DSE 409 operates in accordance with the « minicall » principle, in which only the call is subject to a charge.

Required for operation is a tone dial telephone with the keys * and #.

After dialling the call number, wait for the text message and then enter the 4-digit PIN-code followed by the control code of the required relay output. Complete the process by pushing the # - key.

Depending on the current traffic load in the paging network, the DSE 409 receives the message within 120 seconds and controls the relay output or outputs. In the immediate vicinity of the DSE 409, the switching noise of the relay can be heard and the lighting up of the corresponding LED observed.

The DSE 409 has three potential-free, individually controllable switching contacts (refer to the schematic diagram).

The relay contacts can be activated individually, in pairs or all together. The duration of operation can be activated in seconds, minutes and hours (1 - 99) or as a permanent switching on or - off.

The individual relays are controlled in accordance with the following scheme:

Relay 1 dial number « 1 ».

Relays 1 and 3 dial number « 4 ».

Relay 2 dial number « 2 ».

Relays 2 and 3 dial number « 5 ».

Relay 3 dial number « 3 ».

Relays 1 and 2 dial number « 6 ».

All relays together dial number « 7 ».

Programming the relay contacts:

Number 1 « On »

Number 0 « Off »

For programming a duration of operation in **hours** (1-99), the numbers corresponding to the number of hours are dialled.

For programming a duration of operation in **minutes** (1-99), first « 0 » and then the numbers corresponding to the number of minutes are dialled.

For programming a duration of operation in **seconds** (1-99), first « 00 » and then the numbers corresponding to the number of seconds are dialled.

For programming a **continuous relay operation**, the numbers for the time indications are left out.

Programming

A message is built-up as follows:

1. First dial the call number of the Switch Butler (**074 4.. ..**)
2. Then wait for the text message.
3. Enter the Pin-code / relay number(s) / relay function On/Off and duration of operation - confirm with # and hang up the phone.

The call number (Call-No.) and the PIN- code you will find on the name plate of the appliance.

Example:

1. **Dial the call number of the Switch Butler (074 4.. ..)**
2. **Wait for the text message.**
3. **Enter the PIN-code followed by the corresponding message.**
Confirm with # and hang up the phone.

- | | |
|---|--------------------------------------|
| 1. Relay 1 is to be activated for 2 hours: | Number sequence: PIN-code 1 1 2 # |
| 2. Relay 2 is to be activated for 20 minutes: | Number sequence: PIN-code 2 1 020 # |
| 3. Relay 3 is to be activated for 30 seconds: | Number sequence: PIN-code 3 1 0030 # |
| 4. Relay 1 is to be continuously activated: | Number sequence: PIN-code 1 1 # |
| 5. Relay 1 is to be de-activated: | Number sequence: PIN-code 1 0 # |
| 6. Relays 1 + 3 are to be activated for 1 minute: | Number sequence: PIN-code 4 1 01 # |
| 7. Relays 2 + 3 are to be activated for 1 second: | Number sequence: PIN-code 5 1 001 # |

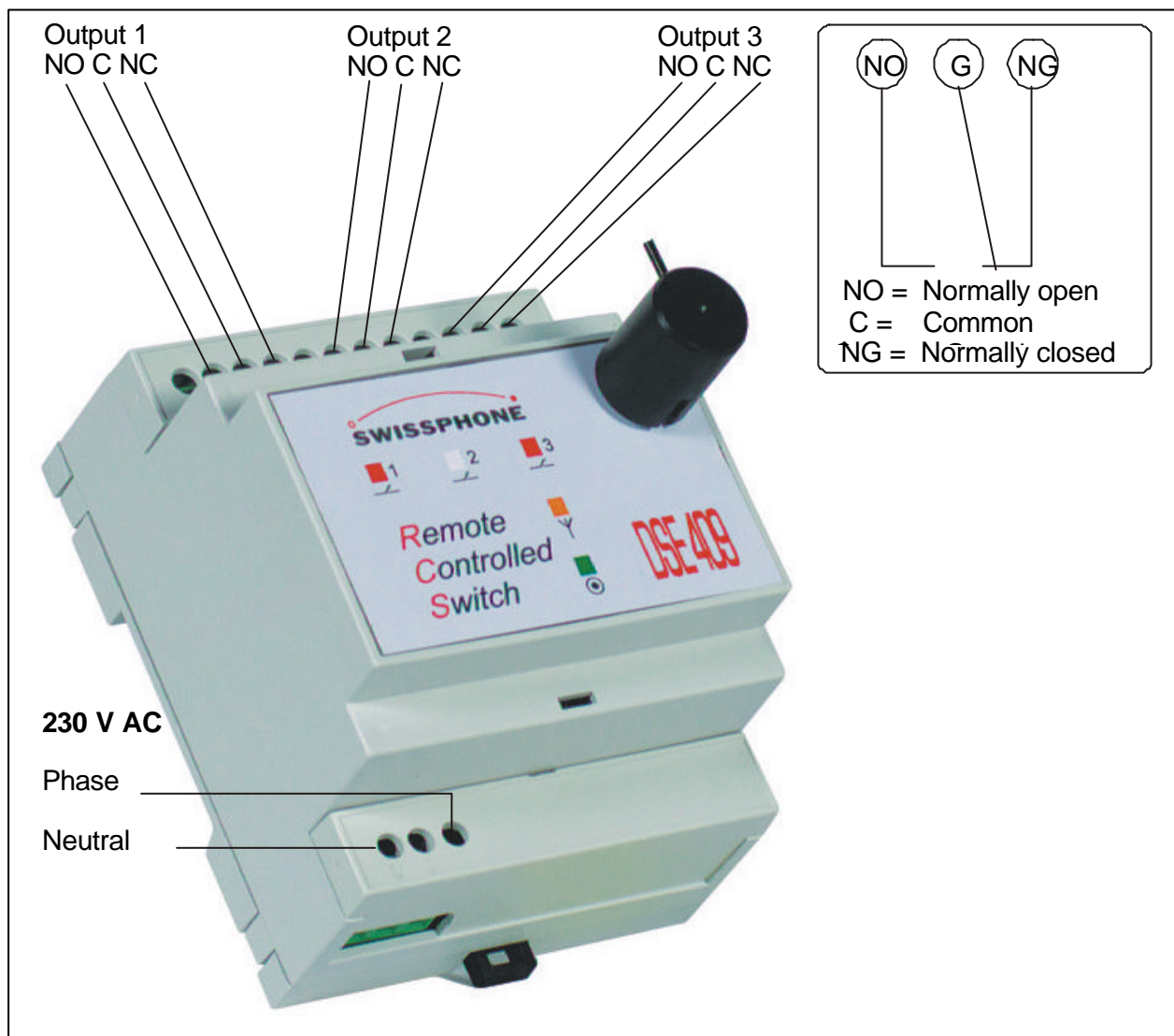
The relay operating conditions On/Off of the DSE 409 are indicated by means of LEDs.

The LEDs in case of activated relays are lit red and are extinguished in case of de-activated relays.

When the power supply is switched on, the corresponding LED is lit green ○

In case of traffic via the paging system, the corresponding relay is intermittently lit orange. Y

Schematic connection diagram:



Safety Regulations

Danger!

Electric current can be fatal! Never let the SwitchPager come into contact with water or other liquids:

Danger of a short-circuit!

Not authorized operators:

Persons, who are not familiar with the operating instructions, children as well as persons under the influence of alcohol or drugs must not operate the SwitchPager or else only under supervision.

Additional Regulations

- The user has the responsibility to ensure, that appliances connected to the remote switch do not cause any damage.
- The user is responsible for ensuring, that in case of a malfunction of the remote switch no damage is caused.
- It is not permitted to connect electrical appliances, which must only be operated under supervision.

Guarantee

- Any damage/problems, which are attributable to disturbances/faults of the paging network, are not subject to the appliance guarantee.
- The guarantee services are limited to the material value of the remote switch.

The duration of the guarantee is 12 months as from the date of purchase. The guarantee becomes null and void, if the appliance is opened by an unauthorized person.

Technical Data of the DSE 409S

HF-part:	POCSAG-standard Frequency ranges 130 ... 170 MHz, 275 ... 300 MHz, 440 ... 470 MHz Transmission speeds 512, 1200, 2400 Baud
Dimensions:	90 mm x 72 mm x 60 mm (4 modules), standard DIN construction, Weight approx. 300 g, BNC - aerial connector plug with 50 Ω impedance
Electric power supply:	230 VAC ±10 %, 50/60 Hz, 25 VA Current demand in standby operation 30 mA, Current demand with all relays activated 110 mA
Output relays:	Relay contact load 230 VAC / 10 A
Electric power failure:	In case of an electric power failure, the backup period for all static values amounts to 200 h, the timer functions are lost.
Ambient:	Operating temperature range –20 ... +40 °C Relative humidity 5 ... 95 %, without any condensation
Remark:	The operation of the device can be influenced by powerful magnetic fields. The following precautionary measures are to be implemented: <ul style="list-style-type: none">- Do not install the DSE 409 in the vicinity of powerful inductive loads.- If necessary, utilize line filters.- Select a suitable location for the aerial. The DSE 409 must not be installed inside a closed metallic housing. If this is unavoidable, the aerial has to be brought to the exterior through a suitable line (coaxial cable RG58, 50Ω).

If you should have any technical questions or reception problems,
please directly contact the company Elbro AG

Phone 01 854 73 00
Fax 01 854 73 01

Elbro AG
Gewerbestrasse 4, Postfach 11, CH-8162 Steinmaur