Basic requirements for the owners

Warning

Do not make changes on the devices.
Violation will invalidate interference emission certification (FCC, RSS, CE), and the manufacturer's warranty.

This device complies with Part 15 of the FCC rules. Operation is subject to the following two conditions:

(1) this device may not cause harmful interference, and
(2) this device must accept any interference received,

including interference that may cause undesired operation.

Note

This equipment has been tested and found to comply with the limits for a Class B digital device, ***pursant*** to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures.

- Reorient or relocate the receiving antenna
- Increase the separation between the equipment and receiver
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected
- Consult the dealer

Sesam 500 – Door opening system

Sesam 501

Sesam 503

Sesam 512

Sesam 599

Receiver

Receiver Plug-in model

SESAM 500 has been developed to meet the markets requirements for an attractively priced, easily operated and powerful door opening system.

SESAM 500 is flexible and simple in operation, and it is based on modern digital radio technology.

The transmitter is available in four versions.

SESAM 501 is a small hand-held transmitter with one function.

SESAM 503 is technically identical to SESAM 501, but has three functions.

SESAM 512 is a hand-held or vehicle-mounted transmitter with facilities for communication with up to twelwe receivers.

SESAM 599 has the same facilities as SESAM 512, but can communicate with up to 999 receivers.

The SESAM 599 is also provided with a display.

The system includes receivers with one or three output relays.

ÅKERSTRÖMS

TECHNICAL DESCRIPTION SESAM 500

Type of equipment: Transmitters Sesam 501, Sesam 503, Sesam 512, Sesam 599.
Receivers Sesam R1 - R5

Characteristics of the equipment

Frequency band: ISM-band class 1, 433,92 MHz
Type of modulation: ASK, 1K20A1D
Output power: 74.0 dBµV/m@ 3m test distance
Operating temperature range: -25ºC – +55ºC

Sesam 501
Number of functions: 1
Power source: 9V battery
Current: 25 mA
Size: 100 x 60 x 25 mm

Sesam 503
Number of functions: 3
Power source: 9V battery
Current: 25 mA
Size: 100 x 60 x 25 mm

Sesam 512
Number of functions: 3
Number of codes: 12
Power source: 9V battery or external source
Current: 25 mA
Size: 142 x 68 x 26 mm

Sesam 599
Number of functions: 3
Number of codes: 12
Power source: 9V battery or external source
Current: 25 mA
Size: 142 x 68 x 26 mm

Sesam R1 – R5
Number of functions: 1 or 3
Sensitivity: better than –95 dBm
Relay load: max 400 VAC, 6 A, 1500 W, resistive load
Power source: 230 VAC, or 24 VAC or 12 – 24 VDC
Size: 152 x 102 x 42 mm or plug-in model 80 x 72 x 35 mm

ÅKERSTRÖMS BJÖRBO AB
780 45 Björbo
Sweden

Tel +46 (0)241 - 25000. Telefax +46 (0)241 - 23290
www-service: http://www.akerstroms.se
e-mail: sales@akerstroms.se

CE 0000 199x

DOOR OPENING SYSTEM SESAM 500 (1 - 3-functions)

TRANSMITTER 501:
The transmitter operates on a 9V alkaline battery. Pushbutton 1 = OPEN - CLOSE

TRANSMITTER 503:
The transmitter operates on a 9V alkaline battery. Pushbutton 1 = OPEN, button 2 = CLOSE, button 3 = STOP

TRANSMITTER 512 and 599:
The transmitter operates on a 9V alkaline battery or by a cassette. The cassette is supplied with 12-24V DC, where **the brown cable is connected to + and the blue cable to ground.** The voltage supply is connected via the vehicle's main switch, which means that the transmitter is dead at charging of the vehicle.

RECEIVER:
Incoming voltage (from after mainswitch) is connected to plinth P1 if it is 230 VAC alternately to plinth P5 if it is 12-24 VAC or DC (independently of polarity). On the printed circuit board there is a diode lamp LED4 for indication of voltage supply (+5V). Furtermore there is a diode lamp (LED1-3) for every relayoutput. The aerial is assembled on the aerial contact of the box and should be angled slightly outwards. Max. load of the relay is 250 VAC/6A. Nominal voltage see plate on the receiver. Power consumption 1,5VA/1,5W. Recommended cable Ø 5-11 mm. Temp. -25 - +55°C. Installation category III. **ATTENTION! At service of the door make sure that the receiver is disconnected.**

CODING:
The receiver and the transmitter have to be coded by the electrician.
The transmitter and receiver are provided with a ten pole dipswitch (512 and 599 eight pole) which has three positions as figur below:

Switch nr:		*1 2 3*	*4*	*5*	*6*	*7*	*8*	*9*	*10*
upper	+	Area code. The area code		**486**	**162**	**54**	**18**	**6**	**2**
middle	**0**	has to be identical for	**729**	**243**	**81**	**27**	**9**	**3**	**1**
lower	-	transmitter and receiver.	-	-	-	-	-	-	-

SESAM 501: The transmitter and the receiver are coded identically on the dipswitches respectively SW1 (see fig 1, 3).
SESAM 503: The transmitter and the receiver are coded identically on the dipswitches respectively SW1 (see fig 1, 4).
SESAM 512: The transmitter is doorcoded with pushbutton 1-12 respectively and the receiver will be doorcoded as the 12 lowest doorcodes, the switches 8-10 (see above) if the doors even has to be operate with Sesam 599. The switches 4-7 in "-"position in both transmitter and receiver (see fig 2 and 4), observe that switch 8 in the transmitter also must be in "-"position.
SESAM 599: The transmitter will have the doorcode (1-999), which is pressed on each occasion, while the receiver has to be doorcoded according to the above tabell see even fig 4.
For example if you have to set doorcode 767 set switch 4 in middle position (729), switch 7 in middle position (27), switch 8 in middle position (9) and switch 10 in upper position (2) all other switches in the lower position (-).
The switches 1, 2, 3 are used for areacode and switch 4 in upper position **are not** to be used This is valid for all system.

FIG 1 SESAM 501 and SESAM 503

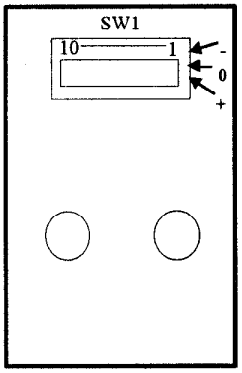

FIG 2 SESAM 512 and SESAM 599

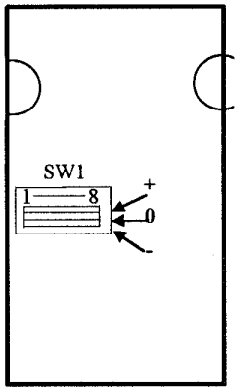

FIG 3 RECEIVER 1 Function

FIG 4 RECEIVER 3-Functions

HH 990310

CONNECTING INSTRUCTIONS

Draw no: 92 4610-000 Ver A

CE 0000 199x

PLUG IN

DOOR OPENING SYSTEM SESAM 500 (1 - 3-functions)

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RECEIVER:
Incoming voltage 12-24 VAC or DC (from after mainswitch) is connected to pin 5 and 6 (independently of polarity). On the printed circuit board there is a diode lamp LED4 for indication of voltage supply (+5V). Furtermore there is a diode lamp (LED1-3) for every relayoutput. The aerial is assembled on the aerial contact and should be angled slightly outwards. Max. load of the relay is 250 VAC/6A. Nominal voltage see plate on the receiver. Power consumption 1,5VA/1,5W. Temp. -25 - +55°C. Installation category III.
ATTENTION! At service of the door make sure that the receiver is disconnected.

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middle	0	has to be identical for			**729**	**243**	**81**	**27**	**9**	**3**	**1**
lower	-	transmitter and receiver.			-	-	-	-	-	-	-

SESAM 501: The transmitter and the receiver are coded identically on the dipswitches respectively SW1 (see fig 1, 3).
SESAM 503: The transmitter and the receiver are coded identically on the dipswitches respectively SW1 (see fig 1, 4).
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FIG 1 SESAM 501 and SESAM 503

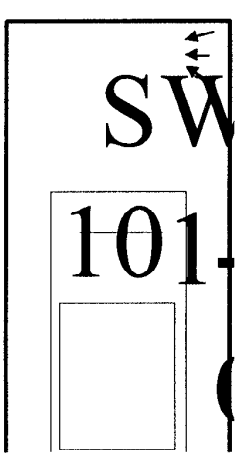

FIG 2 SESAM 512 and SESAM 599

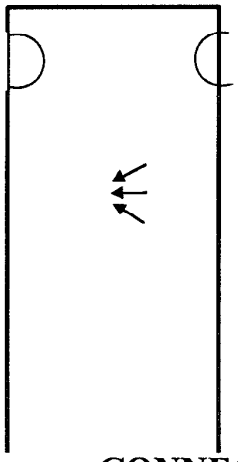

FIG 3 RECEIVER PLUG IN 1 Function

FIG 4 RECEIVER PLUG IN 3 Functions

HH 990310

CONNECTING INSTRUCTIONS

Draw. no: 92 4610-000 Ver A

Sesam 500

Range of application.

Sesam 500 is a industrial door opening system to open unlocked doors. It is also used for very simple on/off applications, where there are no personnel security demands, for example switching lights on/off.

Security.

Sesam 500 is not a security system.

Sesam 500 is not designed for applications on a high security level.

Sesam 500 is not allowed to be used in applications, where there are personnel security demands.