## Installation

1. Prepare a SIM card so that the PIN code is 1234 or is deactivated. Mount the card in the unit. The unit has now 1234 as password or runs without a password. The card must be placed as shown below.

2. Connect inputs, outputs and power cable (12-24 VAC/DC) and if necessary a rechargeable 3,6 V Li-ion battery.

3. Turn on the power. A red diode is lit. After max. 1 min. the diode flashes approx. every 2 sec., and the unit is ready.

The GSM unit interior
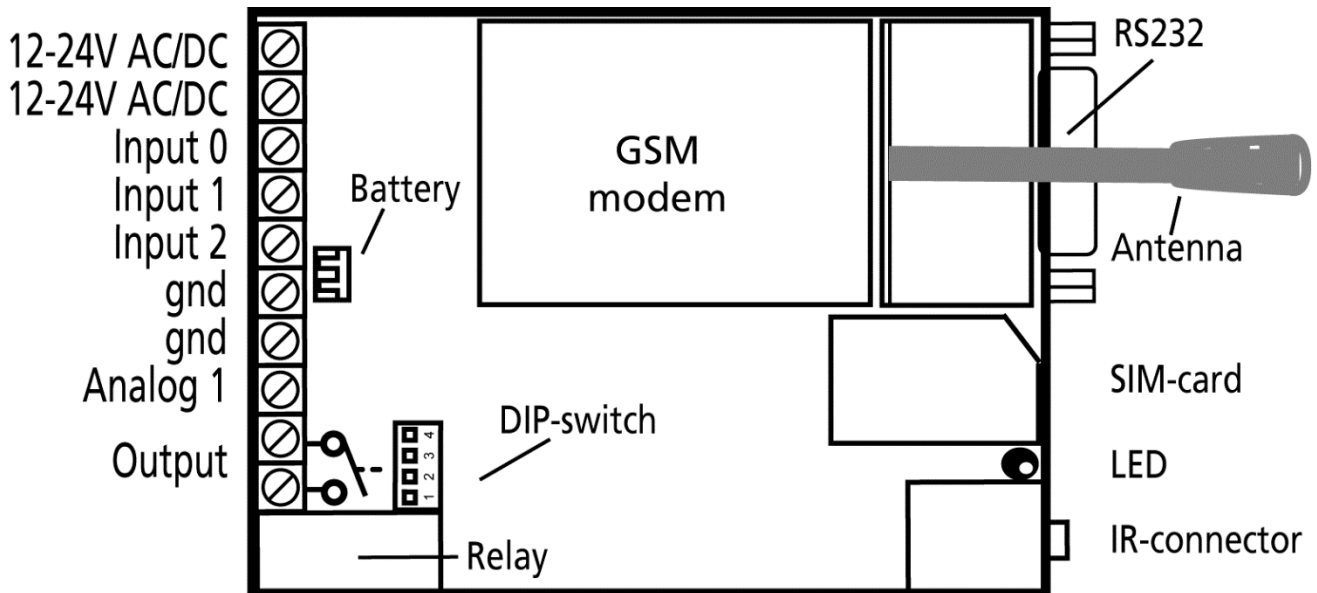
DIP-switch for analog input		Voltage	
1 ON:	0-10 VDC	Output:	AC max. 230 VAC, 6A
2 ON:	0/4-20 mA		DC max. 30 VDC, 6A
3 ON:	PT-100	Input, digital:	max. 24 VDC
4 ON:	Profort probes		max. power 2 mA
All OFF:	digital input	Input, analog:	max. 0-10 VDC
			Only print voltage when
			The DIP-switch 1 is on, and 2-4 are off

Set-up with browser via the Internet

1. Open a browser on your PC, tablet or smartphone.

2. Type http://setup.masterview.dk in the address bar. Log on to the portal or create yourself as user. An unlimited number of units can be connected to any user, and several users can be connected to the same units.

3. Create a new unit in the list and choose multiGuard DIN4 as unit. When you press SAVE the portal sends a text message to the unit, which connects it to the Profort server via GPRS/Internet on the SIM-card. All communication will then take place as data.

4. Type in the required information and press 'save and send'.

5. The unit is now ready.

Additional help: press F1 in the program, see the manual on the CD or www.profort.com

Version 3.15

Set-up with text message

1234 = password, 0 = zero, space counts as a character and is therefore important.

Define the unit phone number and change password, if necessary	`1234 N0 xxxxxxxx yyyy` (N0 = N + zero)	xxxxxxxx = the unit mobile no. yyyy = new four-digit password Define the unit phone number (N0) and create a new password. New password is optional.
Receivers Add	`1234 Nx yyyyyyyy`	Adds receiver x to receive text on phone number yy yy yy yy x = 1-9 + A-P, max. 25 receivers.
Delete	`1234 Nx`	Deletes receiver x. x = 1-9 + A-P
Text on input Add	`1234 Ax TEXT`	TEXT on input x by open/break. x = 0,1, or 2
	`1234 Lx TEXT`	TEXT on input x by close/make. x = 0,1 or 2
Delete	`1234 Ax`	Deletes TEXT for input x by open/break. x = 0, 1 or 2.
	`1234 Lx`	Deletes TEXT for input x by close/make. x = 0, 1 or 2
Only alarm if text is added	`1234 CT`	The unit ignores input that has no text attached.
Add analog input	`1234 V1 S yyyy zzzz`	Set-up of the scale (yyyy = minimum zzzz = maximum) for 0-10 V and for 0-20 mA.
	`1234 V1 M yyyy zzzz`	Set-up of values for the intervals LOW, MIDDLE and HIGH (Point 1 and Point 2) on analog input 1. If the value on the input gets higher or lower than yyyy (Point 1) or higher or lower than zzzz (Point 2), an alarm is sent.
	`1234 V1 A TEXT`	Alarm text LOW on analog input 1 is sent when the value becomes lower than the value defined in Point 1/yyyy (`Vx M yyyy zzzz`).

.	`1234 V1 L TEXT`	Alarm text MEDIUM on analog input 1 is sent when the value becomes higher than the value defined in Point 1/yyyy or lower than the value in Point 2/zzzz (`Vx M yyyy zzzz`).
	`1234 V1 B TEXT`	Alarm text HIGH on analog input 1 is sent when the value becomes higher than the value defined in Point 2/zzzz (`Vx M yyyy zzzz`).
Activate output in case of alarm	`1234 Gx`	x = 1-9 (1 = 10 sec., 2 = 20 sec., 3 = 30 sec., 4 = 1 min, 5 = 2 min, 6 = 4 min, 7 = 8 min, 8 = 16 min and 9 = constant.) Sets the relay output to activate for x time in case of alarm on an input.
Output follows state on input	`1234 GA`	Indicates that the output follows the corresponding input if text is added. Notice: input signal has higher priority than command S0 (S + zero) and B0 (B + zero)

Additional help: see the manual on the CD or on www.profort.com

Control with call from telephone

Relay:

Call the unit. Press 1234 (password), when the connection has been established and await two 'beeps'. Enter the desired code and hang up..

Examples of codes:

*00 (asterisk + zero + zero)	Pulses relay output for 10 sec.
*10 (asterisk + 1 + zero)	Opens relay output
*20 (asterisk + 2 + zero)	Closes relay output

Macro:

Call the unit. When connection is established enter the desired code and hang up.

x (x = 0-9 for macro 0-9)	Performs macro x

Version 3.15

Control with text message

Control with text message	1234 ON	Inputs are activated, red diode flashes
	1234 OF	Inputs are deactivated, red diode turns off
Activation of output	1234 S0 (S + zero)	Closes output
	1234 B0 (B + zero)	Opens output
	1234 P0 (P + zero)	Pulses output for approx. 10 sec.
Download	1234 OK	Downloads information about GSM transmission power and battery level. Example: OK>>OK SQ: xx% BAT: yyV xx = transmission power in percentage. 25 % is least acceptable value yy = battery status
	1234 V1 R	Downloads measurements on the analog input
Connection to the Internet	1234 EH USERNAME 12345678	GPRS traffic starts (12345678=own number)
	1234 EH	GPRS traffic stops
Send alarm immediately in case of power failure	1234 JS	Send alarm immediately in case of power failure (after approx. 10 sec.)
	1234 JM	Programs the unit to send alarm in case of power failure after approx. 30 min. (Default setting)

Additional control

The unit can also be controlled by use of the PC program and some functions can be controlled directly from the internet.

See more in the manual or log on to internet management via www.profort.dk

www.profort.com

Macro with command or IR-code

Add a "super command" by gathering together one or more commands. Name it and activate it under the chosen name. This works with text message, call from telephone and DTMF-toner, and the internet. It is possible to set up 10 macros.

A macro can be set up with commands or with infrared codes from e.g. a remote control.

Set up macro with command	`1234 Mx NAME`
	`<COMMAND>`
	E.g.
	1234 M0 TEMP <V1 R>
		Sets up macro x (x = 0-9) under the name NAME and adds command. More commands in the same macro can be separated by semicolon ';' without space.
		Example: `1234 SHORT PULSE <S0;B0>`

Play macro	`TEMP`	Plays macro with the name TEMP
Delete macro	`1234 Mx`	Deletes macro x (x = 0-9).

The unit contains pre-programmed IR-kodes for most heat pumps.

Send text message `1234 MI HEAT PUMP NAME` e.g. `1234 MI PANASONIC` to the unit. Then send e.g. `1234 PR M` to see which codes the unit has saved on each heat pump.

Additional help: see the manual on the cd or www.profort.dk

Power supply

12-24V AC/DC min 0,5 A (acquisition)
NB! Supply must not come into contact with the ground.

Battery

3,6V rechargeable Li-ion-battery (acquisition)

Usage

Approx. 50 mA when resting (supplied with 12-24 VAC/DC)
150 mA when battery-charged
2 mA in connection with power failure and battery supply

Output

Max. 6 A at 230V AC
Max. 6 A at 35V DC

Inputs, digital

Max. 1V, 2 mA (GND)   Input 0: also connect/disconnect (level/pulse)
Min. 18V max 30 V (24V DC)   Input 1: also pulse/minute counter
                                  Input 2: also pulse counter

Input, analog

0-10V DC
0/4-20mA
PT-100
Profort temperature sensor (Profort-no. 007995)

Pulse- and minute counter

Max. 10Hz. Maks. one mio. pulse or minutes

Infrared

- AUX output for infrared senders. IR-gooseneck Profort-no. 009067. IR-diode w. 2m cable Profort-no. 009065. Built-in codes for most heat pumps.

Dimension

4 DIN-modules
69x86x57 mm, weight: 125 g.

Temperature

– 20 °C - +55 °C

Antenna

1 internal antenna for GSM-modem. Possible to add external antenna (Profort-no. 369003)

Profort PC-Program Quick set-up

Compliant with all versions of Windows. The PC must have a COM-port (RS232), a USB-RS232-converter must be used or connection through the internet via GRPS.

NB! Find the product key for the PC program on www.profort.com.

Other PC Programs

- "Basis set-up". Expands the set-up options
- "Professional set-up" as an alarm centre on PCs supplied with GSM modem

multiGuard DIN6

- 2 relay outputs
- 4 digital inputs
- 1 analog input
- 230V/12-24V power supply
- 9V rechargeable back-up battery (acquisition)
- Connector for external IR sender
- DIN-rail with six modules
- Mudbus interface

multiGuard Master RF

- 8 relay outputs
- 8 digital inputs
- 4 analog inputs
- Wireless 868 MHz receiver
- 230V/12-24V power supply
- 9V rechargeable back-up battery (acquisition)
- Modbus interface
- IP-65 box
- Touch display for set-up and programming

multiGuard Remote IO

- 1 relay output
- 2 senders of infrared codes for heat pump control
- 3 digital inputs
- 1 built-in temperature/humidity sensor
- 1 recorder for infrared codes
- 12V DC power supply (inclusive)
- 3,6V Li-ion back-up battery (inclusive)
- Box for wall mount
- Connector for external IR-sender

IP-65-box for GSM unit

- Waterproof box
- DIN-rail for 4 and 9 modules
- 3 PG-inputs

PROFORT ENGINEERING