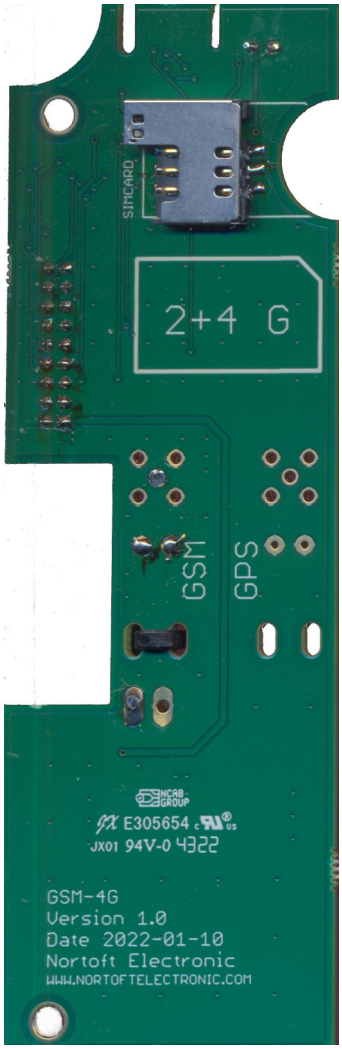
Nortoft Electronic A/S, Sejrupvej 38, DK 7323 Give.
www.nortoftelectronic.com

GSM-4G



Features	**Modem**
Easy mount on PR10-12	• SIMCOM 7070G
Low power consumption	• GSM 850/900/1800/1900MHz
Total PR10-12 og GSM-4G	• Cat-M/Cat-NB
10 mA GSM	• GPRS/EDGE
10 mA GSM + GPS (Only GPS on request)	• GPS, Galileo & GLonass
Visible LED for Status	
Includes	• Temperature: -40℃ ~85℃
Antennas with 2 meter cable.	
All fittings for mounting.	

GSM

GSM-4G is a GSM modem made for PR10-12.

Irrigator, can be Started, Stopped, or requested for status, only by sending an SMS.

Likevise using GPS, machine position can be tracked.
*Optional program using maps

Commands

Start	Starts machine.
Stop	Stops Machine
Speed ###	Set the ***Speed*** whitin 3..400 m/h. eg.: ***Speed 24***
Status	Gets the current status of machine.

SMS can be typed in both upper- or lower case or mix.

If you call the modem, from a GSM telephone, you will recieve an SMS containing ***Status***

Status

```
SPEED         30.0m/h
DOSE            22 mm
TIME 14:10 STOP18:16
STATUS Running
DISTANCE         123m
BATTERY        12.8V
CHARGE ON     0.231A
```

SMS, Sent by PR10, contains information about Irrigation

SMS is sent on:

LOW PRESSURE:	Start the pump, so you get pressure on the machine.
STOP SENSOR:	The machine is ready to be moved to a new field.
STOP REMOTE:	The machine is stopped using SMS
STOP DISTANCE:	The machine has reached stop point. (Constant 8)
SUPERVISION TIME:	The machine has not moved, for nn minutes (Constant 4), due to a malfunction. Check the machine before continuing.

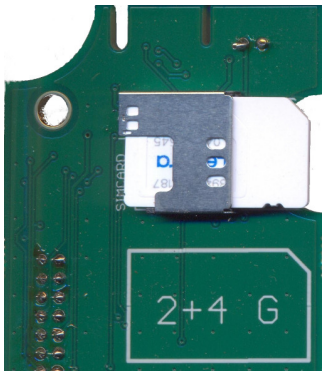
How to get started:

Disconnect Electronic from Battery.

Put in the SIM card into an ordinary mobile phone and change the pin code to 1111.
Try to send at receive an SMS, on phone, to verify the SIM card and account is working properly.

Mount the modem on PR10-12 using the treaded spacers.

Insert the SIM card into the modem.



Connect power connector.

Connect the power and setup machine data #30

0 = GSM Disabled
1 = GSM Enabled, all telephone number is allowed.
2 = GSM Enabled, only telephone number on SMS list.

```
SPEED          11.1m/h
DOSE             22 mm
TIME 14:10 STOP 7:43
M.DATA 30         1
```

See manual for changing machine data.

If selected numbers are used, number could be found in display on PR10 when receiving SMS from actual phone. Number should always be entered in the same format eg. +44213.. 0044213.. 213..

```
SPEED          11.1m/h
DOSE             22 mm
TIME 14:10 STOP 7:43
A:   +45123456
```

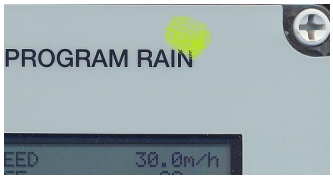
See manual for changing machine data.

After Approx. 30-45 seconds moden should be connected to network.

```
SIGNAL  23  SAT 12  +
NETWORK HOME
A: +45123456
B: +45234567
```

Signal strength, 0 – 31,and network should show up in display menu #6
A Signal strength at 10 og higher to work properly.
A Signal strength at 99 indicates signal error.
SAT Numbers of satellites visible for position.
When data,
‘ ‘ No data connection (SIMCARD)
– or + for data Connection To internet server.

Modem has a LED showing status, the LED is visible trough the front panel.



GREEN	**LED**
POWER DOWN	Off
– Network search or – no SIM card is inserted – no PIN is entered – no GSM network is available	On
STANDBY (registered in the network)	Flashes
Connection (TALK)	On

When an SMS is Received, following is showed on Display:

```
Receiving SMS
#: +45123456
Status
```

Receiving SMS, Incomming phone number and 40 character of message, Any SMS can be received, but only known commands are accepted.

When an SMS is Sent, following is showed on Display:

```
Sending SMS
#: +45123456

Status Running
```

Sending SMS, Outgoing phone number and current machine status.