

**ACCELL GATE GSM MODULE**  
MARCH 2007  
**GENERAL INFORMATION**

Ever dreamed of opening your gate with your phone? You can do it with Accell Gate GSM Module. Who needs it? Residence, Town Houses, Hospitals, Hotels, Factories, Villas, Complexes... The Accell Gate GSM Module can be used also as a long distance remote control. Stop spending money to provide everybody with a remote control, let everybody use his/her mobile phone. Everybody has a mobile phone, let it be your universal remote control!

**How Does it Work?**

The Accell Gate GSM Module incorporates a professional industrial grade GSM engine that receives calls at its SIM number, as any ordinary GSM phone. You need to either **CellC**, **Virgin** or **Vodacom** Service provider. Just to give an example, if your SIM has a phone number 082 123 8967, that is the number you have to call to open the gate. The Accell Gate Gsm Module has a memory where you will store the numbers of people enabled to open your gate (up to 500) When Accell Gate GSM Modue receives a call, it will check the calling number and if the number is in the list you have prepared it will reject the call and open the gate.

**Does it work on Any Electrical Gate?**

Yes. All electric gates have a button that is used to open them. The Accell Gate GSM Module has a relay whose contact has to be connected to the opening button.

**Does it cost me anything to use my phone to open my gate?**

The Accell Gate GSM Module doesn't answer the call, it simply checks the caller ID. Your network must send the caller ID otherwise the Accell Gate module won't work. Usually operators don't charge until you answer the call, so it won't cost you anything to open the gate. Of course you need to have an active SIM inside it, and this may have a monthly fee regardless of the calls. Check your local operators for these details.

**How can I enable different phone numbers to open my gate?**

To store a number, you simply send an SMS, that starts with a password, to the Accell Gate module, indicating the phone number to enable. Numbers are stored in the Accell Gate module's **memory and not on the SIM**. This prevents somebody from removing the SIM to copy all the numbers into a mobile phone. Only the one who knows the password can insert or delete enabled phone numbers.

**How many different phones can open my gate?**

The Accell Gate Module accepts up to 500 full numbers.

**What else do I need besides Accell GSM Gate Module?**

You need only a valid SIM card. Install Accell Gate module, insert SIM, program enabled numbers and you are ready to go.

**Input Trigger:**

The "ACCEL-GATE" is capable of monitoring 4 inputs which can either be pulsed triggered or level triggered.

- Pulse triggered = The pulse must be less than 2 seconds. ( See **Connection Diagram** )
- Level triggered = If the trigger is greater than 6 seconds, the unit will see the input as level triggered. ( See **Connection Diagram** )

The "ACCELL-GATE" also features two timers for the onboard relays. These timer can be set to switch the relay **ON** at a specific time as well as **OFF** at a specific time. The timers can be configured to either "**Pulse**" the relay or the "**Latch**" the relay.

500 Telephone numbers (users) can be programmed into the Accell Gate module by Cell phone. One Master telephone number is programmable. All the confirmation SMS's and Input triggers will be sent to the Master telephone number. The user can also request a preprogrammed telephone number to see if the telephone number exists on the Accell Gate module's database.

**ACCELL GATE INFORMATION**

**TELEPHONE CONTACTS:**

\*    NEWN=                     #

**MASTER TELEPHONE NUMBER**

\*    MASTER=                     #

**SYSTEM PASSWORD:**

\*    PASS=    #

**SUBSCRIBER NAME:**

\*    NAME=  #

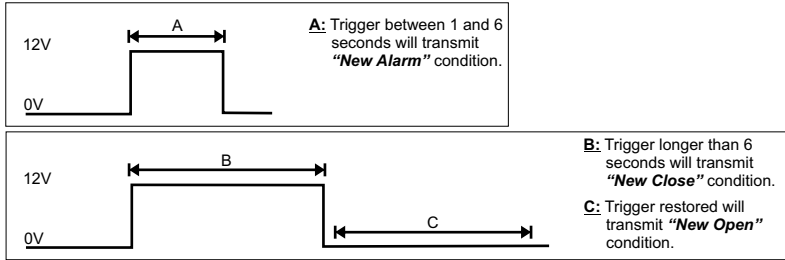
**RELAY1 AND RELAY 2 TIMERS:**

\*    TIMER1=   :   ,   :   ,   #

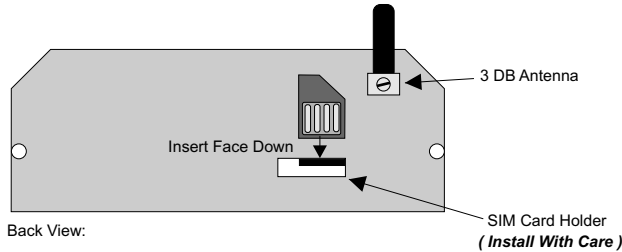
\*    TIMER2=   :   ,   :   ,   #

# GSM-ACCELL GATE CONNECTIONS

## INPUT CONFIGURATIONS:



## SIM CARD:



## STAND ALONE CONNECTIONS:

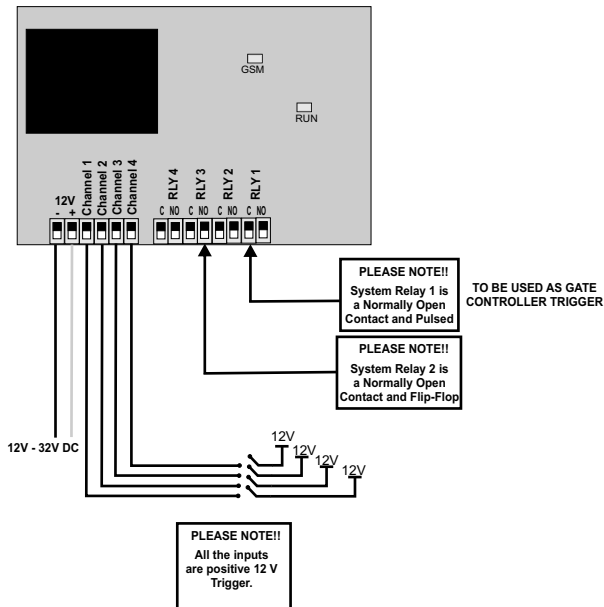


Figure 1

# ACCELL GATE GSM MODULE

JANUARY 2007

## GENERAL FEATURES:

The "ACCELL GATE " is a microprocessor based communication module that allows bidirectional GSM communication to and from gate controller. The following features make this module a versatile product:

- Operates the Gate controller by calling the Accell Gate module - FREE OF CHARGE!!!
- Supports the programming of 500 Telephone numbers.
- Programmable Password for security purposes.
- Supports the function requesting the programmed telephone numbers.
- Programmable gate identification by name or number.
- Programmable input identification.
- Can request the status of the Accell Gate module.
- Control the two onboard relays.
- Programmable function for the two onboard relays. The relay function can be either pulse or Flip-flop
- Provides a feedback SMS with every command sent to the unit (Except Opening).
- Pulse and Level trigger inputs.

## INITIAL SETUP

### SIM Card:

The SIM Card for the GSM module can be for any of the following Networks: **CellC, Vodacom or Virgin**. Before the SIM card is inserted into the SIM slot, make sure that the "PIN Request" feature has been switched off. If the feature is not switched off, insert the Sim Card in a normal Cell phone and disable this feature.

### Caller ID

Please make sure that the "Caller ID" feature on the phone from which the user operates the gate, has been switching activated. If it is not , the user must activate this feature to enable proper operation of the Accell Gate module.

### Voice Mail

Please make sure that the SIM CARD's voice mail feature has been switched off. If not, contact your service provider for more details.

### Power-Up:

Before Power is applied to the GSM module, make sure that the Antenna is connected. (Refer to Figure 1). Connect **12V to 32 V DC** to the unit and wait for the "RUN" LED to flickers constantly. Now the Module is ready for programming

**PROGRAMMING APPENDIX : ACCELL GATE PROGRAMMING OPTIONS**

**PLEASE NOTE:**  
**- All the options and Commands are not Case Sensitive.**

**SYSTEM PROGRAMMABLE OPTIONS- ADD MASTER TELEPHONE NUMBER**

To program the MASTER telephone number into the ACCELL GATE MODULE, send an sms with the following structure to the Panels sim card. A confirmation will be sent to the master user and to the cell phone which programmed the new Number:

**\*0000 MASTER=+27821234567#**

PROGRAM CHARACTER {  
 4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 MASTER NUMBER {  
 END CHARACTER {

**PLEASE NOTE:**  
 The international dialing code must be used when programming the telephone number.

**SYSTEM PROGRAMMABLE OPTIONS- ADD USER**

To program telephone numbers into the ACCELL GATE MODULE, send an sms with the following structure to the Panels sim card. A confirmation will be sent to the master user and to the cell phone which programmed the new Number:

**\*0000 NEWN=+27821234567#**

PROGRAM CHARACTER {  
 4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 USER NUMBER {  
 END CHARACTER {

**PLEASE NOTE:**  
 The international dialing code must be used when programming the telephone numbers!!

**SYSTEM PROGRAMMABLE OPTIONS- DELETE A TELEPHONE NUMBER**

To delete a telephone number from the ACCELL GATE MODULE, send an sms with the following structure to the Panels sim card. A confirmation will be sent to the master user and to the cell phone which deleted the telephone Number:

**\*0000 DELN=+27821234567#**

PROGRAM CHARACTER {  
 4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 USER NUMBER {  
 END CHARACTER {

**PLEASE NOTE:**  
 The international dialing code must be used when deleting the telephone numbers!!

**SYSTEM PROGRAMMABLE OPTIONS- REQUEST TELEPHONE NUMBER**

To request a programmed telephone number from the ACCELL GATE MODULE, send an sms with the following structure to the Panels sim card. A confirmation will be sent to the cell phone which requested the telephone number :

**\*0000 GETN=+27821234567#**

PROGRAM CHARACTER {  
 4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 TELEPHONE NUMBER {  
 END CHARACTER {

**PLEASE NOTE:**  
 The international dialing code must be used when requesting the telephone numbers!!

**PROGRAMMING APPENDIX : ACCELL GATE PROGRAMMING OPTIONS (1)**

**SYSTEM REQUEST OPTIONS- RELAY 1 OR 2 TIMER**

The onboard relays on the ACCELL GATE MODULE can be switched on or off by an internal timer function. This function enables the user to have a "pulse" or "flip-flop" function for each of the two relays. The Timer function will be repeated every day until the function has been disabled. The confirmation will be sent back only to the cell phone which requested the relay to be on/off.

**0000 TIMER1=12:00,13:00,F#**

4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 TIME ON {  
 TIME OFF {  
 FUNCTION {  
 END CHARACTER {

**FUNCTION:**  
 F = FLIP/FLOP  
 P = PULSE

**0000 TIMER2=12:00,13:00,P#**

4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 TIME ON {  
 TIME OFF {  
 FUNCTION {  
 END CHARACTER {

**EXAMPLE:**  
 Could be used to turn the gate's lights on/off with auxiliary relay

**SYSTEM REQUEST OPTIONS- DISABLE RELAY 1 OR 2 TIMER**

**0000 TIMER1=Off#**

4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 FUNCTION {  
 END CHARACTER {

**0000 TIMER2=Off#**

4 DIGIT PASSWORD {  
 SPACE {  
 COMMAND {  
 FUNCTION {  
 END CHARACTER {

**PROGRAMMING APPENDIX : ACCELL GATE PROGRAMMING OPTIONS (1)**

**SYSTEM REQUEST OPTIONS- SYSTEM STATUS**

The status of the ACCELL GATE MODULE can be obtained by sending an sms message to the ACCELL GATE module in the following structure. The confirmation of the status will only be sent back to the cell phone which requested the status.

**0000 STATUS#**

4 DIGIT PASSWORD    SPACE    COMMAND    END CHARACTER

**SYSTEM REQUEST OPTIONS- RELAY 1 OR 2**

The onboard relays on the ACCELL GATE MODULE can be switched on or off by sending an sms message to the ACCELL GATE MODULE. The confirmation will be sent back only to the cell phone which requested the relay to be on/off.

**0000 RELAY1#**

4 DIGIT PASSWORD    SPACE    COMMAND    RELAY NUMBER    END CHARACTER

**PROGRAMMING APPENDIX : ACCELL GATE PROGRAMMING OPTIONS**

**SYSTEM PROGRAMMABLE OPTIONS- CHANGE THE PASSWORD**

The password must always be alphanumerical 4 digit number. Once the password has been changed, the master will receive a confirmation and the new password:

**\*0000 PASS=PAS1#**

PROGRAM CHARACTER    4 DIGIT PASSWORD    SPACE    COMMAND    NEW 4 DIGIT PASSWORD    END CHARACTER

**SYSTEM PROGRAMMABLE OPTIONS- CHANGE THE SUBSCRIBER DETAIL**

The gates details can be programmed in to the ACCELL GATE MODULE. The gates details can be programmed to be a name Example: Front Gate at Midrand Villa. No Confirmation SMS will be sent back. Please note that the maximum length for the subscriber detail is 50 characters.

**\*0000 Name=John#**

PROGRAM CHARACTER    4 DIGIT PASSWORD    SPACE    COMMAND    NEW 50 DIGIT NAME    END CHARACTER

**PLEASE NOTE:**  
Will only be applicable when using the zone inputs.

**SYSTEM PROGRAMMABLE OPTIONS- RELOAD AIR TIME**

The Air Time for the SIM Card can be reloaded by sending the following SMS. ( You need to purchase the Air Time first and get the RECHARGE PIN)

**\*0000 Air=V,812120842273#**

PROGRAM CHARACTER    4 DIGIT PASSWORD    SPACE    COMMAND    \*NETWORK PROVIDER    RECHARGE PIN    END CHARACTER

**\*NETWORK PROVIDER DETAIL:**  
V= Vodacom  
C= CellC