

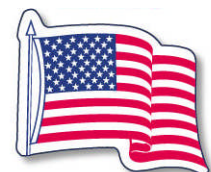


# Pro-2010 Quickstart Keypad Programming Guide

March 2011  
Revision 1.1

Castlegate IV

[www.TrigonElectronics.com](http://www.TrigonElectronics.com)



100% Made in Corona, CA

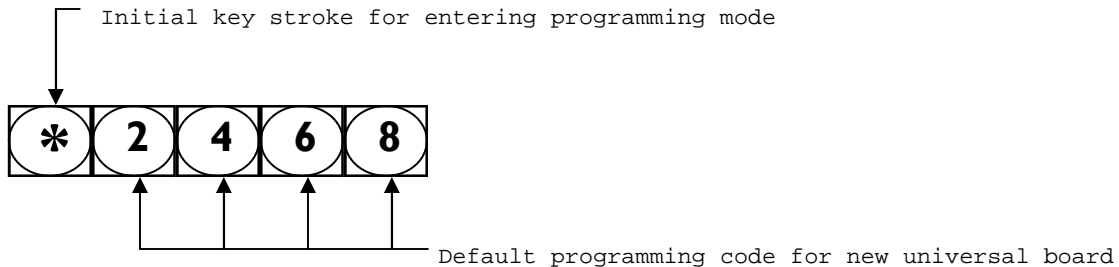
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### Access Programming Mode

Enter the Programming Mode using key sequence: \*2468.

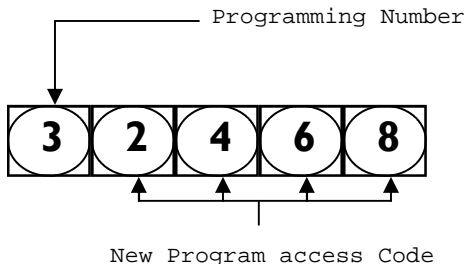
You should hear two "ACK" tones and the panel display, if available, shows "Program Mode".



NOTE Enter: ## Exits Programming Mode.

### Change Program Access Code (Enter Program Mode)

Command to set: 3nnnn Where "nnnn" is the new 4 digit programming access code.



This command sets a 4 digit code that is used at the keypad, or remotely via touch tone, to place this unit into programming mode. This is a very important number, for without it you will not be able to program your unit except via Modem. To program this unit via keypad this code is entered as "\*2468". Since all units will have this code number as the factory default, it is strongly suggested that you change this code soon after initial installation. Anyone with the knowledge of this code can put your unit into programming mode and erase everything with one command. Be absolutely sure to write down the new replacement code or you will lock yourself out from future programming changes. If you lose this code you may call Trigon and we can call the unit and send a special command to restore this code to factory default of 2468.

## Trigon Electronic Doorman (T.E.D.)

The Trigon Electronic Doorman (patent pending) is a telephone entry feature that allows the resident to determine the name or business of the visitor without actually talking to the visitor. The door unit, through a sophisticated combination of microprocessors and voice processors becomes a virtual doorman intermediary between the visitor and the resident as follows:

- –Once the call button is pressed, T.E.D answers with the following greeting:
  - –***“Hello, I’m TED The Electronic Doorman, please state your name or your business and I will contact your party for entry approval.”***
- –The visitor is given 6 seconds to record name or business then T.E.D. responds with:
  - –***“Please stand by while I contact your party for entry approval.”***
- –T.E.D. then places a call to the resident and announces the following:
  - –***“This is your Electronic Doorman, you have the following visitor.”***–The entry unit then plays back the visitor recording.
- –The Resident has the following three choices:
- –Pressing a zero “0” (programmable) activates the #1 relay in T.E.D. and grants entry.
- –T.E.D. responds with:
  - –***“I have received entry approval, please enter.”***
- –Pressing a seven “7” (programmable) rejects entry and generates the following response from T.E.D.:
  - –***“I was unable to receive entry approval, please try again later, thank you.”***
- –Pressing a four “4” (programmable) opens the telephone communication line between Resident and Visitor which then can result in an entry granted “0” or an entry rejected “7” and the corresponding responses from T.E.D.
- Second and third relays can be actuated by the resident to operate multiple entrees or cameras.

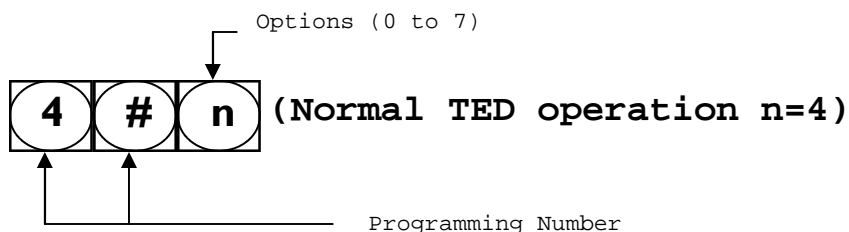
### Note

Units shipped with TED enabled are shipped with TED turned off, because the unit is quicker to program and test with TED turned off. After programming use the following to turn TED on.

### Operational Enable TED on/off (Enter Program Mode)

Enter programming mode.

Operational Enable: (Defaults to 0) (Normal TED operation n=4)  
 Command to set: 4#n Where "n" is the selection of modes enabled.



**Options are:**

- n=0 Push Button Mode, No Dial Looping, No TED
- n=2 Push Button Mode, Yes Dial Looping, No TED
- n=4 Push Button Mode, No Dial Looping, Yes TED
- n=6 Push Button Mode, Yes Dial Looping, Yes TED

**Dialer Looping:**

Use "Yes Dial Looping" if you dial from a list of several numbers and want to be able to start again with the first number listed. A "No" to looping disables restarting a phone list and all dialing attempts quit after failing to connect after the last number on the list has been tried.

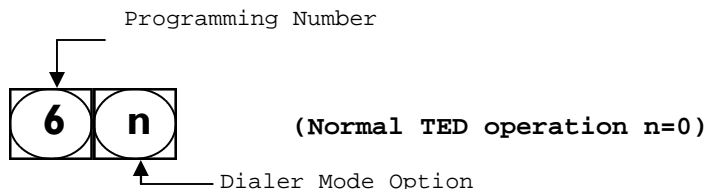
**TED Mode:**

You must use the "Yes TED" options if the automated doorman feature is desired. See page 7 in manual for more details about the TED option.

**Note: Dialer Mode (Page 12 in manual) must be set to "call progress on" when TED is enabled.  
(Enter Program Mode)**

**Dialer Modes: (Defaults to 1)**

**Command to set: 6n** Where "n" is the method the unit employs for dialing functions.



**Options are:**

- n=0 with call progress, false dial=off, verify dialtone=off
- n=1 without call progress, false dial=off, verify dialtone=off
- n=2 with call progress, false dial=on, verify dialtone=off
- n=3 without call progress, false dial=on, verify dialtone=off
- n=4 with call progress, false dial=off, verify dialtone=on
- n=5 without call progress, false dial=off, verify dialtone=on
- n=6 with call progress, false dial=on, verify dialtone=on
- n=7 without call progress, false dial=on, verify dialtone=on

**Call Progress** must be allowed (with) if the unit is expected to respond to a Busy Signal, Ring Signals or Voice detection for the purposes of redialing another number on Busy detection or Voice Detection as required for the electronic doorman (TED) operation.

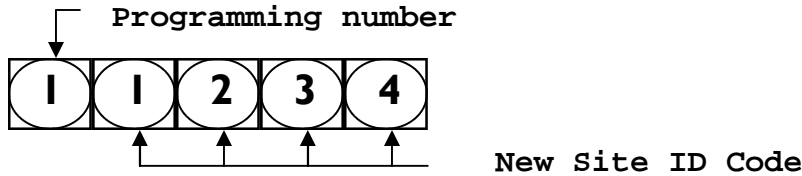
Without Call Progress being enabled, the unit reverts to a simple single number dialer and TED will not function as desired.

**False Dial On** forces the unit to create the impression to the visitor that it has dialed a number. It makes random Touch Tone sounds to the speaker as if speed dialing. This gives the visitor a sense that the unit is working and pre-empts their inclination to pump the dial button, as if that will speed the process up like is mistakenly believed with elevators and traffic lights.

**False Dial Off** results in a voice that declares that the dialing process is in action by playing system message #2 "Dialing in progress, please stand by" to the visitor. If message #2 is diverted to another function or disabled, then it's a good idea to enable false dialing.

**Set Unit Site ID (Enter Program Mode)**

Enter: 1 1234 This sets the Unit's Site ID to 1234. (default)



**Terminate Program Mode**

Enter: ## This terminates the Program Session and Unit is ready to operate.

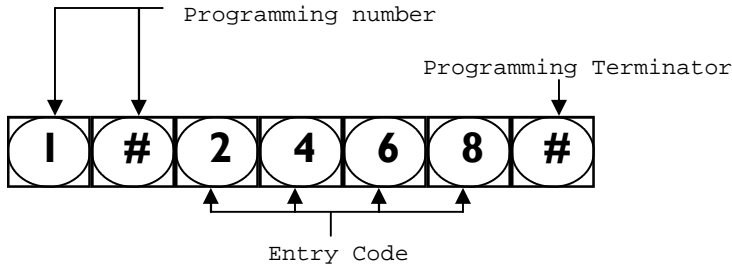
Please Note: This one page Guide is for those users of Trigon's Castlegate line of products. Shown here is the minimum amount of detail needed to make this unit work as desired.

This is, by no means, the limit on this Units abilities. Please read those sections in this manual that fully explain the Options and Commands that are available or relevant to your needs.

**Entry Codes (Enter Program Mode)**

New! Entry Codes are now mixed variable length of 1 to 6 digits per.

Enter: 1# 2468# Assign Entry Code of 2468.

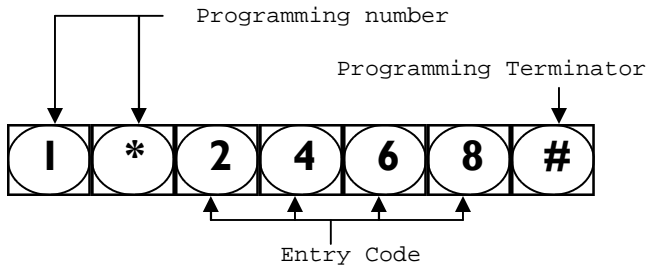


1# 9999\*22# Adds 9999 to Pooled Entry Code database including the time zone set as 22.

Note: From the keypad, or touch tones, duplicate codes can not be installed. However, the following command can be used to change an existing pooled entry code time zone setting:

1# 9999\*22# Sets pre-existing pooled entry code 9999 to time zone 22.

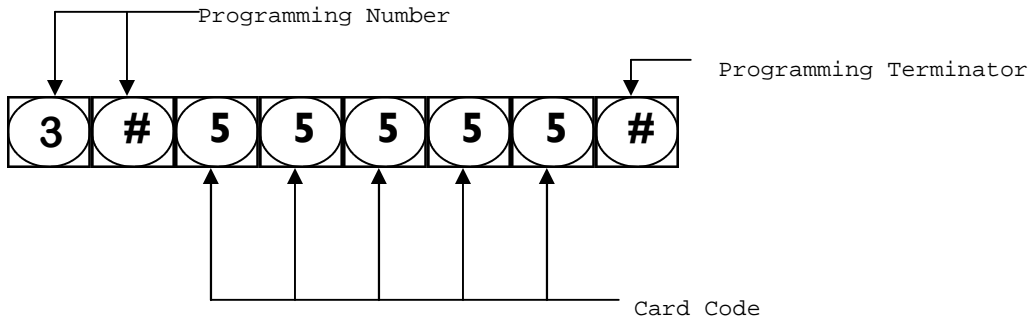
Enter: 1 \* 2468# Deletes Entry Code.



Enter: ## Exits Programming Mode. (For more detail, see page 21 of Programming Manual)

**Card Codes (Castlegate with Prox Reader)(Enter Program Mode)**

3# 55555# Adds card 55555 with site default as 000 and zone default as 00.



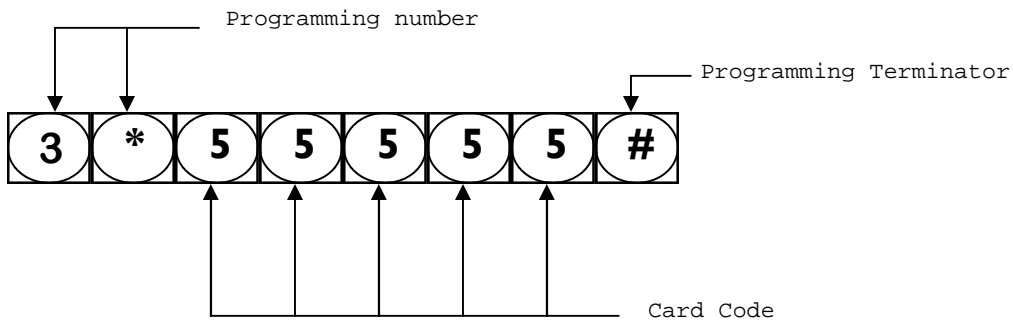
- 3# 111\*55555# Adds card 55555 with site as 111 and zone default as 00.
- 3# 55555\*22# Adds card 55555 with site default as 000 and zone as 22.
- 3# 111\*55555\*22# Adds card 55555 with site as 111 and zone as 22.
- 3# 9999\*22# Sets pre-existing pooled entry code 9999 to time zone 22.

For more detail, such as batch loading, see page 22 of Programming Manual

**(Enter Program Mode)**

Note: From the keypad, or touch tones, duplicate codes can not be installed. However, the following command can be used to change an existing pooled entry code time zone setting:

Enter: 3\* 2468# Deletes Card Code.



Enter: ## Exits Programming Mode.

For more detail, see page 21 of Programming Manual

### Detail Programming System Clock

This unit employs an accurate digital clock that includes Year, Month, Date and Day of the week. As per ISO-8601 standards, the 1st day of the week is Monday. This plays a key roll if you have time zone restrictions enabled, as one can then restrict access based on the day of the week. The clock will continue accurate time keeping without system power for about 4 days. After that, the clock will need to be set. This unit doesn't use clock batteries as they eventually fail someday and are expensive. The clock itself employs 24 hour military standard time keeping. This eliminates confusion regarding AM and PM settings.

The day begins at midnight at 00:00 (Hours:Minutes) rather than 12:00 AM. The day ends before midnight at 23:59 (Hours:Minutes) rather than 11:59 PM.

- 00:00 is midnight (12:00 AM)
- 02:00 is two o'clock (2:00 AM)
- 12:00 is noon (12:00 PM)
- 18:00 is six o'clock (6:00 PM)

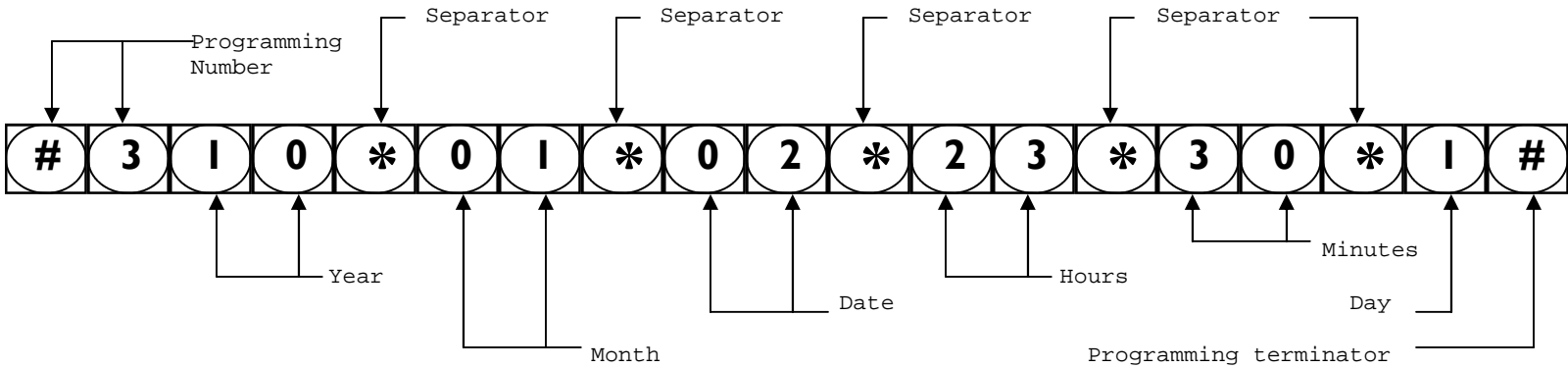
**View the Clock** via unit display by going into programming mode and use command:

\*#3            Display current time as Year/Month/Date, Hours:Minutes, Day-week, Seconds

**Set the Clock** using this command while in programming mode:

#3 YY\*MM\*DD\*HH\*mm\*D#    As Year/Month/Date, Hours:minutes, Day-week, Terminate command.

#3 10\*01\*02\*23\*30\*1#    As Year=10, Month=Jan, Date=2nd, Hours=23, Minutes=30, Day=Monday



Leap year is automatically adjusted for and Daylight Savings time is computed and automatically adjusted for if Time Zones are enabled. Time Zones 98 and 99 are dedicated to Daylight Savings Time. This DST is calculated when the year changes. The DST rules observed are based on the previous years rules deduced from the settings in the Time Zone database. If the rules change then set Time Zones 98 and 99 to match the new rules and the new rules will be applied automatically from then on. See Time Zoning for greater details. (Page 27 in the manual)

**Detail Programming Tone Functions**

This unit has a new feature that allows you to decide what touch tones are used to perform different functions. For example, all our previous units granted access using tone zero "0" issued from the resident or security desk when they received a call from the unit.

This is now done via a table with functions assigned various touch tones as follows:

**Unit Dials Resident:**

| <b>Function:</b>                    | <b>Tone:</b> |
|-------------------------------------|--------------|
| CYCLE-1 & HANGUP 0=>9:              | 0            |
| SET SWITCH-1 0=>9:                  | 1            |
| SET SWITCH-2 0=>9:                  | 2            |
| SET SWITCH-3 0=>9:                  | 3            |
| ENABLE VOICE 0=>9:                  | 4            |
| ENGAGE RELAY 2 0=>9:                | 5            |
| FORCED HANGUP 0=>9:                 | 7            |
| CYCLE-2 & HANGUP 0=>9:              | 8            |
| * FOR SITE ID MESSAGE               |              |
| # FOR SITE ID OR REPLAY TED MESSAGE |              |

**Unit is Called by the Resident:**

| <b>Function:</b>                            | <b>Tone:</b>               |
|---|----------------------------|
| CYCLE-1 & HANGUP 0=>9:                      | 0                          |
| SET SWITCH-1 0=>9:                          | 1                          |
| SET SWITCH-2 0=>9:                          | 2                          |
| SET SWITCH-3 0=>9:                          | 3                          |
| LATCH-1 TOGGLE 0=>9:                        | 4 (1 BEEP=ON, 2 BEEPS=OFF) |
| LATCH-2 TOGGLE 0=>9:                        | 5 (1 BEEP=ON, 2 BEEPS=OFF) |
| FORCED HANGUP 0=>9:                         | 7                          |
| CYCLE-2 & HANGUP 0=>9:                      | 8                          |
| *NNNN => FOR ENTERING PROGRAMMING MODE NNNN |                            |
| *(PAUSE) => FOR SITE ID                     |                            |
| # MICROPHONE AND SPEAKER SET ACTIVE         |                            |

These are the Factory Default settings unless specified otherwise on the purchase order.

"Cycle-n and hang up" refers to doing a gate access granted cycle on relay 1,2, or 3. "Set Switch-n" refers to Macro Usage where the Switch can be defined to other functions. "Engage Relay" simply sets the relay active until the end of the call. "Enable Voice" is for modes such as "TED" that usually maintain silence at the speaker. "Latch-n" Toggles Relay (n=1,2,3) into latch mode and holds forever until toggled off. The "\*" and "#" tones usually control audio/message playing with the exception of when a call is placed to the unit, the "\*2468" is used for placing the unit into program mode.

**Note: The unit has slightly different behaviors dependent on if the unit was called or did the dialing itself (dialed out status).**

You can assign a different tone control scheme to these functions. You must also remember that the functions are processed in the order shown. This means that if you use the tone zero "0" to Cycle Gate-1, then tone zero "0" can't be used for any function beyond that point. This is actually rather useful because you can then define all other functions as tone zero "0" and the program will never get to process those functions. This effectively masks those functions that you want disabled. This did however create a minor issue that was resolved by processing the "Forced Hangup" first.

Put simply: Define a tone for "Forced Hangup" such as the default seven "7" tone and use it for every function you want disabled.

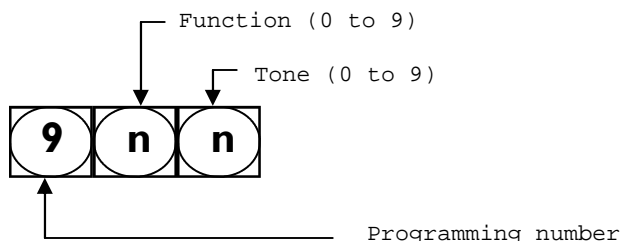


Why disable a function? Some folks have Caller ID and may see the source phone number of the line the unit is attached to. They may call the unit. They may latch a gate open. So put a Seven everywhere that you want a function disabled. A better option is to specify that the line attached to the unit has "Caller Id Blocked" set active for that line on all calls placed by the unit. That way the owners or managers may still call the unit, because they know the private phone number, and latch or unlatch the gate, or do special functions without the worry of having residents fooling around with their gate controls, etc. This paragraph is only useful if the unit is in the call forwarding mode.

As always, you must be in programming mode to issue **programming commands**.

**Assign a Function to a Tone** using command **9:** (out going calls placed from the unit)

9ft            Set function f (0 to 9) to tone t (0 to 9) for out going calls from unit.

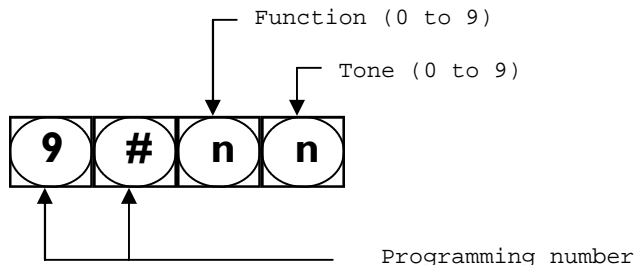


Ie: 905            Sets function "0" (Cycle Gate-1 & Hangup) to Tone 5.

**Assign a Function to a Tone** using command **9#:** (incoming calls answered by the unit)

9#ft            Set function f (0 to 9) to tone t (0 to 9) for calls answered by the unit.

Ie: 9#05           Sets function "0" (Cycle Gate-1 & Hangup) to Tone 5.



**Default "door" settings for resident.**

"0" key grants entry to visitor.  
 "7" key denies entry to visitor.  
 "4" key allows resident to talk to visitor when T.E.D. is activated.  
 "#" key replays TED message if desired.

## Basic Installation Instructions

Normally the Castlegate-4 has two Telco connections. One normally goes to a Standard Phone line (Telco) and the other goes to the Residents house (Resident). The standard telephone service (dial tone) is passed through the Castlegate-4

The Resident receives outside calls normally on this line. If a visitor pushes the call button, then the Castlegate-4 moves into a test mode to determine if the Resident is currently using their line. If not, then the Castlegate-4 disconnects standard Telco service and generates ring signal into the Residents home. The Resident can answer this Gate Call from any touch tone phone. If the Resident was using the line first, then the Castlegate-4 inserts Gate-Waiting chirp tones into the on-going conversation. When ready, the Resident sends a touch-tone "\*" Star Key. This places the original call on hold and answers the incoming call from the gate.

Now the Resident chooses their action to allow or deny Entry. Or, may use a Tone-4 to enable voice communication if the TED option has been employed. Once the Resident completes the action desired they either hang up or stay online, if they had placed an original caller on hold. The original caller will be restored and the Castlegate-4 resets and is ready for the next visitor. See page #5 and page #24 for greater details.

To setup this unit, it is programmed to be a single button dialer (HF2 Mode) with no phone number in List-A. This normally indicates Ring-Down operation, but in the case of the Castlegate-4, Ring-Down operation is replaced with the "No Phone Charge" operation.

The Resident may call the Castlegate-4 directly from inside by lifting any inside phone and dialing "\*\*\*\*" (three Star tones) quickly. The Castlegate-4 will disconnect from the normal Telco service and enter into Answer Mode with a little melody. This is as if the Resident had called the unit and it will respond as if it was called. From this point the Resident may latch/unlatch the gate or enable lights or even go into programming mode.

See the Primary Manual for remote programming via touch tones. Page-24 for tone commands.

## moves from Programming Mode to Answer Mode. Tone 7 (Seven) or just hang up, to reset the Castlegate-4 back to an Idle Mode.

If the Castlegate-4 is to be used as an intercom only system then just don't connect any Telco service to it's Telco input. It will still generate high voltage ring signal into the Residents house, usually to a special phone that's been dedicated to serve as an intercom only phone, or sometimes, the Telco line input to a household PBX system. If the Resident wishes to use the Castlegate-4 as strictly an intercom but also wishes to be able to control (or program) from the intercom phone then the unit can be setup for this application. Simply go into program mode (at the keypad) and enter the following:

#5 01\*99# (beep-beep)

Then exit the program mode with the ## key sequence as usual.

This Macro Instruction forces the unit to supply loop current to the Residents line at all times. The Resident will not get dial tone but will still have an active dedicated intercom phone. They lift the handset and dial "\*\*\*\*" to get the Castlegate-4 attention. It will answer with the answer melody and the Resident can proceed as usual.

To disengage this feature go into programming mode and enter the following:

#5 01# (beep-beep)

Then exit program mode with the ## key sequence as usual.

This releases (unlatches) the relay supplying the 24 volt phone loop current.

If any questions arise, please call Trigon Electronics at 1-800-842-7444.



**Complete List of Program Codes and Manual Page Numbers**

0n Play recorded message n where n = 1 to 8. (Page-30)  
0#n Record message n where n = 1 to 8. Max = 14 seconds per message. (Page-30)  
0\*n Delete message n where n = 1 to 8. (Page-30)  
1nnnn Set site ID code. (Default = 1234) (Page-14)  
1#n-n Add a Keypad Entry Code to pool memory. (Page-21)  
1\*n-n Delete a Keypad Entry Code from pool memory. (Page-21)  
2n Set a Phone Number in List-A. (Page-23)  
2#n Set the Volume Level Control. (Default = 0 = Automatic) (Page-13)  
2\*n Set the Ring Rollover Limit on placed calls. (Default = 6) (Page-12)  
3nnnn Set the Programming Access Code. (Default = 2468) (Page-14)  
3#n-n Add a Card Code to pool memory. (Batch loading is allowed) (Page-22)  
3\*n-n Delete a Card Code from pool memory. (Page-22)  
4n Set Automatic Message Options. (Default = 2) (Page-16)  
4#n Set TED, Dial Looping and Button Modes. (Default = 2) (Page-14)  
4\*n Set Code Range Functions. (Default as all disabled) (Page-29)  
5n Set Rings Counted before unit Auto Answers. (Default = 3) (Page-11)  
5#nn Set Modem Extension Code. (Default = 99) (Page-13)  
5\*n Set Touch Tone Extension Code. (Default = 00) (Page-13)  
6n Set Dialout Modes. (Default = 0) (Page-12)  
6#n Set Keypad Options. (Default = 0) (Page-15)  
6\*n Set Security Mode. (Default = 0) (Page-12)  
7n Set Gate1 Cycle Interval in 5 second periods. (Default = 3) (Page-10)  
7#n Set Gate2 Cycle Interval in 5 second periods. (Default = 3) (Page-10)  
7\*n Set Gate3 Cycle Interval in 5 second periods. (Default = 3) (Page-10)  
7n Set Phone Number in List-B. (in TA3 mode only) (Page-23)  
8nnn Set Call Length Limit in seconds. (Default = 180) (Page-13)  
8#n Set Alarm Interval in 5 second periods. (Default = 3) (Page-10)  
8\*n Set MG3/HF3/TA3 & Passback options. (Default = 0) (Page-15)  
9nn Assign a Tone to a Function for when unit dials out normally. (Page-24)  
9#nn Assign a Tone to a Function for when unit has been called remotely. (Page-24)  
9\* Activate Tone Echo Test if unit called. (use # tone to exit this test) (Page-34)  
9\* Force unit into a Standard Touch Tone Phone test mode. (Page-34)  
\*n View a Phone Number in List-A. (Page-23)  
\*\*n View a Phone Number in List-B. (Page-24)  
\*#0 View Setup Assignments. (Page-16)  
\*#1 View Database Structure and Capacities. (Page-16)  
\*#2n# View Residence Data. (n = Resident Code to start at or omit n = 1st) (Page-17)  
\*#3 View the System Clock. (Page-20)  
\*#4n# View Pooled Entry Codes. (n = Entry Code to start at or omit n = 1st) (Page-21)  
\*#5n# View Pooled Card Codes. (n = Card Code to start at or omit n = 1st) (Page-22)  
\*#6 View all active Code Ranges. (Page-29)  
\*#7n# View Time Zone Tables. (n = Zone Code to start at or omit n = 1st) (Page-28)  
\*#8 View Macro Code Tables. (Page-32)  
\*#9 View Function Tone Assignments. (Page-24)  
\*\* View Greeting Screens 1 and 2. (Page-26)  
\*\*# View Custom Prompt Lines 1 to 8. (Page-26)  
\*\*\* View Embedded Programming Guide. (this page embedded) (Page-34)  
#0 Set Residence Phone Numbers. (Page-17)  
#1 Set Residence Entry Codes and Card Codes. (Page-18,19)  
#2 Delete Residence Entry Code and Card Codes. (Page-18,19)  
#3 Set System Clock. (Page-20)  
#4 Set Time Zones. (Page-27)  
#5 Set Macro Commands. (Page-33)  
#6 Edit Custom Greeting Screen 1. (if enabled and local only) (Page-26,9)  
#7 Edit Custom Greeting Screen 2. (if enabled and local only) (Page-26,9)  
#8 Edit Prompting Messages. (if enabled and local only) (Page-26,9)  
#9 Edit Residence Names. (if enabled and local only) (Page-3,9)  
\*#n Master Erase Commands. (use extreme caution here) (Page-34)  
## Exit Programming Mode.