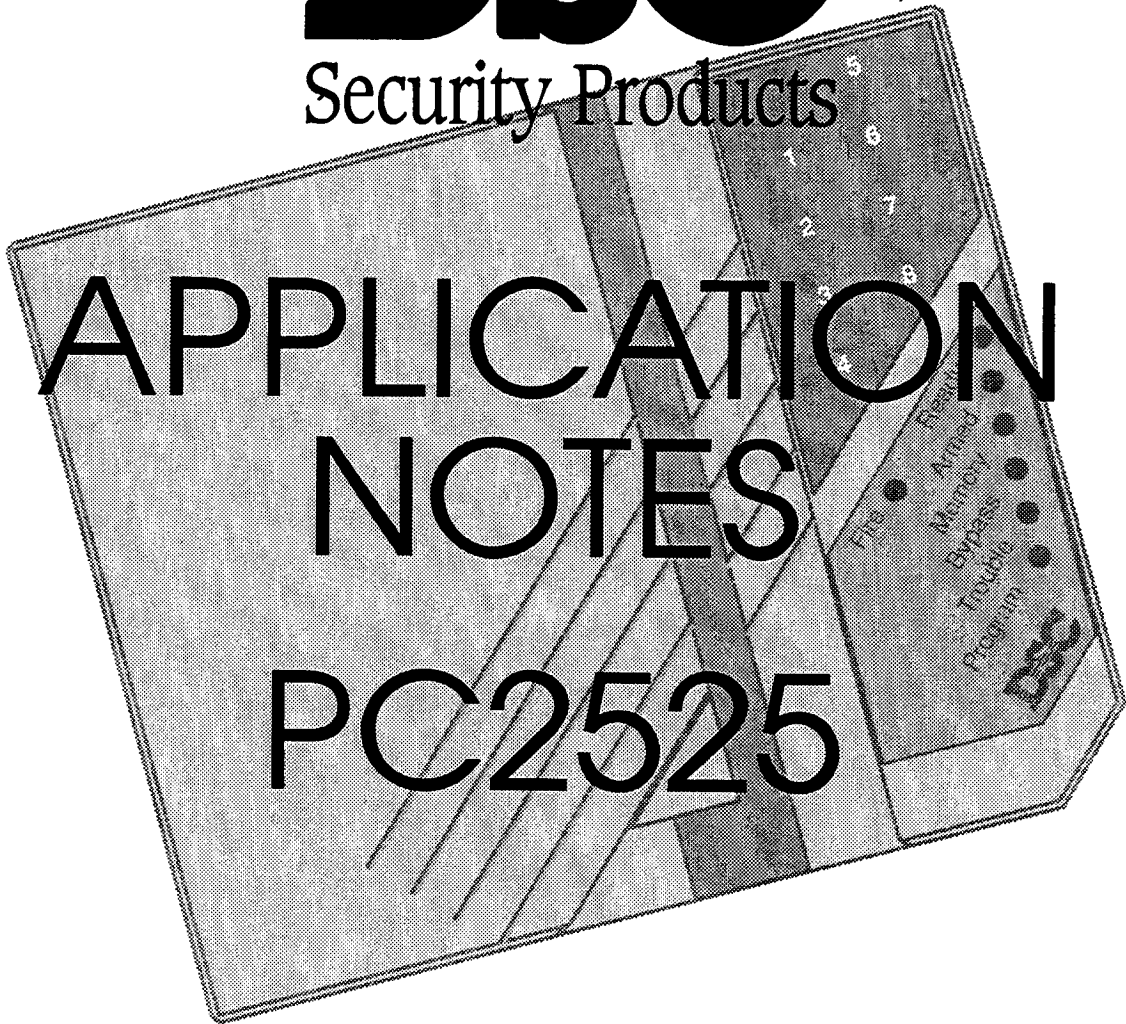
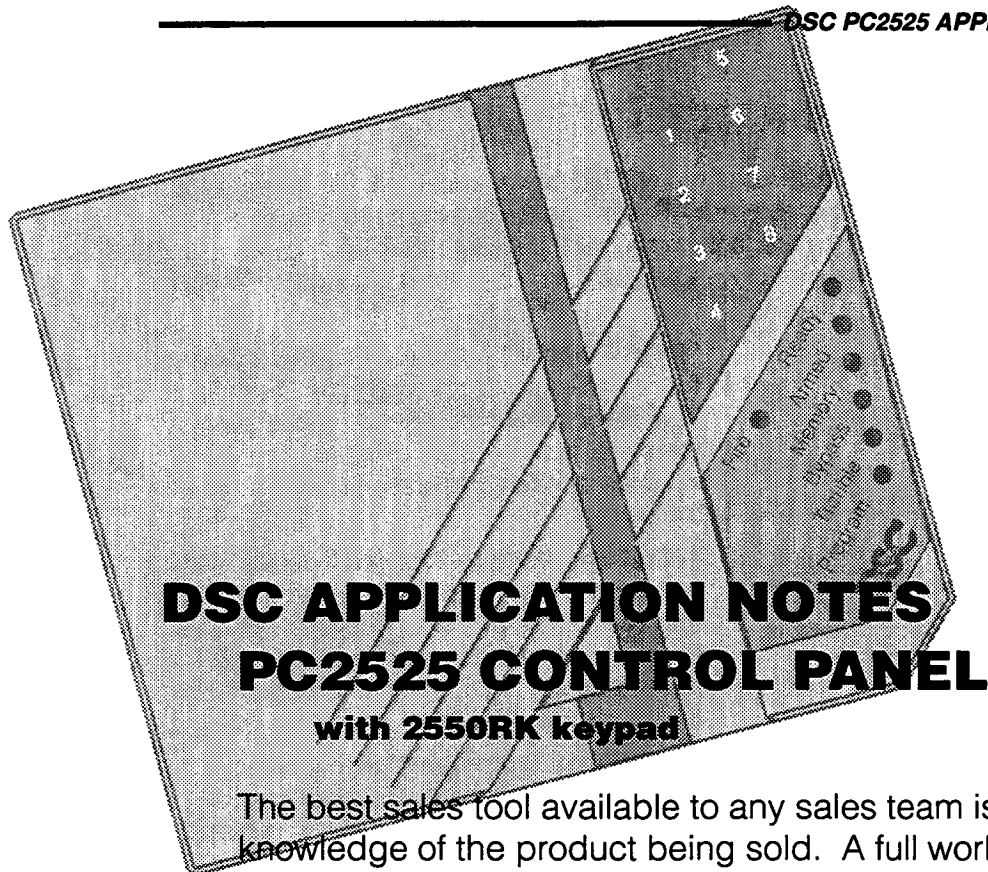




Security Products



# APPLICATION NOTES PC2525



## **DSC APPLICATION NOTES**

### **PC2525 CONTROL PANEL**

**with 2550RK keypad**

The best sales tool available to any sales team is knowledge of the product being sold. A full working knowledge of the product's features, applications and benefits will enhance any presentation, and allow you to better satisfy the customer's needs.

Many of the features described here are exclusive to DSC products and will provide an important advantage over the competition. Being able to describe the benefits of a feature to your customer will help to complete the sale and justify your price. The exclusive DSC features described here will also frustrate the competition, who may be unable to offer the same feature, or will require additional hardware - and therefore additional cost - to accommodate the customer's needs.

These Application Notes describe the operation and programming of 21 different features available on the DSC PC2525 Control Panel. The 21 sections of this booklet provide instructions for enabling each feature on the system. Also, each section details some of the more common applications of each feature, and indicates how the client can use and benefit from each function.

# USING THIS BOOKLET

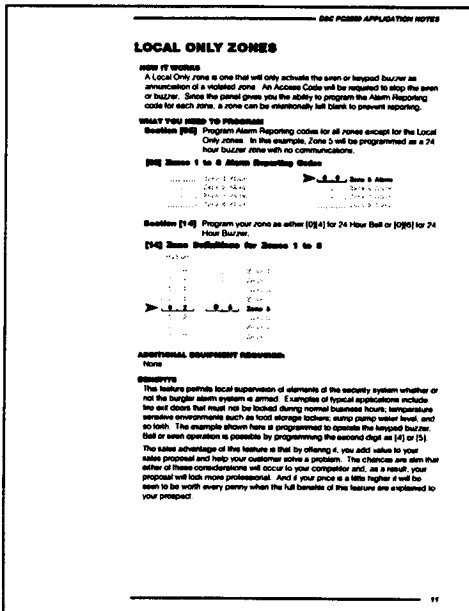
This booklet describes 21 features of the PC2525 alarm control panel that will help you sell the product to your customers. This booklet is organized to help you understand what the features are, how to program and use them, and how to structure your sales pitch around these unique features to make your presentations informed and effective.

**“How It Works”** presents a brief overview for each feature described in this booklet. This section describes the characteristics of a feature, from its basic programming requirements to its operation as seen by the user.

**“What You Need to Program”** details step-by-step the programming required to enable the features shown here. Sections from the Programming Worksheets for the PC2525 are reproduced here to make programming clear and easy to follow.

**“Additional Equipment”** describes any equipment other than the PC2525 control panel or PC2550RK keypad that is required to make full use of a feature. You will find that for many of the features described here, no additional equipment is needed. This can become an important part of your sales presentation when you describe what extra equipment your competitor needs in order to offer the same versatility as the PC2525.

**“Benefits”** describes the advantages of a feature for both the Installer and the Customer, the ultimate user of the system. Here you will find suggestions for sales tactics and installation examples that help to illustrate the usefulness and versatility of the PC2525. Hints, tips and applications for both residential and commercial installations are included.



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# ALARM DISPLAY WHILE ARMED

## HOW IT WORKS

When an alarm occurs, the panel will indicate which zone caused the alarm condition by illuminating a Zone light on the keypad.

## WHAT YOU NEED TO PROGRAM

**Section [09]** Turn on Light [6] in this Section to enable the feature.

### [09] Second System Option Code

Default	Zone Light	Zone Light On	Zone Light Off
OFF	Zone Light 1	Code 8: One-Time Use	Code 8: Normal Access Code
OFF	Zone Light 2	Master Code not changeable	Master Code changeable
OFF	Zone Light 3	Access Code required for Bypass	Access Code not required for Bypass
ON	Zone Light 4	Access Code to cancel Auto-Arm	No Access Code to cancel Auto-Arm
OFF	Zone Light 5	Access Code for Utility Output	No Access Code for Utility Output
<b>ON</b>	<b>Zone Light 6</b>	<b>Alarms displayed while armed</b>	<b>Alarms displayed while disarmed only</b>
OFF	Zone Light 7	Show bypass status while armed	Bypass status displayed if disarmed only
OFF	Zone Light 8	Show bypassed zones when armed	Bypassed zones displayed if disarmed only

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

Being awakened in the middle of the night by the alarm system can be a very confusing time for the customer. The immediate action usually taken by a customer will be to disarm the system. This is potentially dangerous if the customer disarms the system after a break-in has occurred, and the intruder is still on the premises. With the Alarm Display While Armed feature enabled, the customer can quickly determine that a break-in has occurred, and can also determine where the break-in occurred.

Although the Fire alarm output is pulsed, at three in the morning it may be very difficult to differentiate between the burglar and fire alarm output. Now, with a quick look at the keypad display, the customer can easily see that a Fire alarm has occurred, thus saving precious seconds during evacuation.

# AMBUSH (DURESS) CODE

## HOW IT WORKS

The panel can be programmed to send a duress code when it is disarmed with a special Access Code. This would be used when the customer is being forced by an intruder to disarm the system and pressing the [P] key on the keypad would not be advisable.

Although the panel does not have a reporting code specifically referred to as "ambush" or "duress", it can send Opening Codes programmed for each user. An unused Access Code can be programmed with any 4 digit code which may be defined as a Duress Code. Whenever that Access Code is used to disarm the system, the panel will send the Reporting Code programmed for that User, which would be interpreted as a duress alarm.

## WHAT YOU NEED TO PROGRAM

An Access Code must be programmed with a 4 digit code that will only be used in a duress situation. In this example Access Code 07 is being used.

**Section [37]** Program your Duress Reporting Code for the above Access Code in this section. If Opening and Closing signals are not being used program [0][0] for all other Opening Codes.

### [37] Opening (Disarming) Reporting Codes for Access Codes 1 - 8

_____	Access Code 1
_____	Access Code 2
_____	Access Code 3
_____	Access Code 4
_____	Access Code 5
_____	Access Code 6
➤ <u>  2  0  </u>	<b>Access Code 7</b>
_____	Access Code 8
_____	Opening After Alarm Code

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

Provide your prospect with peace of mind by describing this feature and its uses. While one would hope that the situation never arises, there may come a time when an intruder forces the customer to disarm the system in order to gain access to the premises or to silence an alarm. With the intruder watching, the customer certainly cannot use any of the emergency keypad keys. However, the customer can still call for help by entering a duress code when forced to disarm the panel. More than a convenience feature, the duress code can provide important security protection.

# AUDIBLE EXIT DELAY WITH URGENCY

## HOW IT WORKS

When an Access Code is entered to arm the system, the keypad will beep once every second during the Exit Delay.

During the last 10 seconds of the Exit Delay, the keypad will beep rapidly 3 times every second to alert the user that the Exit Delay is about to expire.

## WHAT YOU NEED TO PROGRAM

Enable the Audible Exit Delay with Urgency option in Programming Section [11] Fourth System Option Code

### [11] Fourth System Option Code

Default	Zone Light On	Zone Light Off
OFF	Zone Light 1	Bell pulses always
OFF	Zone Light 2	Bell Squawk on Exit Delay
OFF	Zone Light 3	Bell Squawk on Entry Delay
ON	Zone Light 4	Audible Exit Fault enabled
➤ <b>ON</b> <b>ON</b>	<b>Zone Light 5</b>	<b>Audible exit with urgency</b>
ON	Zone Light 6	Urgency on Entry Delay
OFF	Zone Light 7	TLM disabled
OFF	Zone Light 8	TLM silent (trouble)
		Bell pulses on Fire Alarm only
		No Bell Squawk
		No Bell Squawk
		Audible Exit Fault disabled
		<b>Standard Exit Delay</b>
		Standard Entry Delay
		TLM enabled
		TLM audible if armed

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

This is one of the SIA-suggested false alarm prevention features. With false alarms always being a concern and an inconvenience for both the home owner and the dealer, this feature will help alert the system user of the end of the Exit Delay and the need to leave the premises immediately or to turn the system off and start the arming procedure again.

## AUDIBLE EXIT FAULT

### HOW IT WORKS

If a Delay Zone is open when the Exit Delay expires, the system will sound the pre-alert tone through both the keypad and the siren. If the user turns the alarm off before the Entry Time expires, there will be no communication to the monitoring station. If the system is not turned off, the alarm will be reported normally.

### WHAT YOU NEED TO PROGRAM

Enable the Audible Exit Fault option in Programming Section [11] Fourth System Option Code

#### [11] Fourth System Option Code

Default		Zone Light On	Zone Light Off
OFF	Zone Light 1	Bell pulses always	Bell pulses on Fire Alarm only
OFF	Zone Light 2	Bell Squawk on Exit Delay	No Bell Squawk
OFF	Zone Light 3	Bell Squawk on Entry Delay	No Bell Squawk
<b>ON, ON</b>	<b>Zone Light 4</b>	<b>Audible Exit Fault enabled</b>	<b>Audible Exit Fault disabled</b>
ON	Zone Light 5	Audible exit with urgency	Standard Exit Delay
ON	Zone Light 6	Urgency on Entry Delay	Standard Entry Delay
OFF	Zone Light 7	TLM disabled	TLM enabled
OFF	Zone Light 8	TLM silent (trouble)	TLM audible if armed

### ADDITIONAL EQUIPMENT REQUIRED:

None.

### BENEFITS

This is one of the SIA-suggested false alarm prevention features. With false alarms always being a concern and an inconvenience for both the home owner and the dealer, this feature will help alert the system user if they have armed the system with zones remaining open.

If the pre-alert is only heard through the keypad sounder, it may be possible for a customer to leave the premises without being aware that the system has been armed improperly. By the time the alarm sounds through the siren, the user may have left the premises completely and would not be aware of the false alarm. With the pre-alert tone on both the siren and the keypad sounder, the user will immediately be aware that the system has not been armed properly and will know to re-enter the premises and disarm the system before an alarm is reported.



# AUTOMATIC ARMING

## HOW IT WORKS

The panel can be programmed to automatically arm itself at a specific time every day. If the panel is already armed it will not perform the function. When the auto-arming sequence begins, the keypad buzzer will beep for one minute prior to the actual arming. At your option the siren may also sound once every 10 seconds.

The panel can be programmed to abort the auto-arming process if a user presses a key or enters a valid Access Code before the one minute warning tone expires.

If not cancelled, the panel will be armed immediately following the 1-minute pre-alert period. If Opening and Closing reporting codes are programmed, the panel will send a Closing by User #1 code. Any zones that were open at this time will be temporarily bypassed until they are closed. Once secured, they are added back into the system. At your option, a Partial Closing code may be sent if the panel auto-armed with zones in violation.

## WHAT YOU NEED TO PROGRAM

The internal 24 hour clock in the panel must be set. This is done by using the [\*][6] User Function command.

- Press [\*][6][Master Code] to enter User Functions
- Press [1] to select 24 hour clock
- Enter [H][H][M][M] to program the time; use 24-hour format
- Press [2] to select auto-arm time
- Enter [H][H][M][M] to program the auto-arm time; use 24-hour format
- Press [5] to enable/disable auto-arming function: 3 short beeps indicates the feature has been enabled; 1 long beep indicates the feature has been disabled
- Press [#] to return to the Ready mode

If you would like to send a Partial Closing code if the panel temporarily bypasses zones because they were violated, program the following:

**Section [36]** Program a Partial Arming Reporting Code.

### [36] Closing (Arming) Reporting Codes for Access Codes 1 - 8

.....	Access Code 1
.....	Access Code 2
.....	Access Code 3
.....	Access Code 4
.....	Access Code 5
.....	Access Code 6
.....	Access Code 7
.....	Access Code 8
➤ [ 9 ] [ 9 ]	<b>Partial Closing Code</b>
.....	Auto-Arm Cancellation Code

**Section [09]** If an Access Code is to be required to cancel the auto-arming sequence, turn on Zone Light [4] in Section [09]. With Zone Light [4] off, any key press will cancel the arming sequence.

### [09] Second System Option Code

Default	Zone Light On	Zone Light Off
[OFF] .....	Code 8: One-Time Use	Code 8: Normal Access Code
[OFF] .....	Master Code not changeable	Master Code changeable
[OFF] .....	Access Code required for Bypass	Access Code not required for Bypass
➤ [ON] [ON] .....	<b>Access Code to cancel Auto-Arm</b>	<b>No Access Code to cancel Auto-Arm</b>
[OFF] .....	Access Code for Utility Output	No Access Code for Utility Output
[ON] .....	Alarms displayed while armed	Alarms displayed while disarmed only
[OFF] .....	Show bypass status while armed	Bypass status displayed if disarmed only
[OFF] .....	Show bypassed zones when armed	Bypassed zones displayed if disarmed only

**Section [10]** To have the Bell/Siren sound during the Auto-Arm sequence, turn off Zone Light [7] in Section [10]. With Zone Light [7] on, the Bell/Siren will not sound to warn of Auto-Arming.

**[10] Third System Option Code**

<i>Default</i>	<i>Zone Light On</i>	<i>Zone Light Off</i>
<input type="checkbox"/> OFF Zone Light 1	2-minute Keypad Timeout	No Keypad Timeout
<input type="checkbox"/> OFF Zone Light 2	[F] Key disabled	[F] Key enabled
<input type="checkbox"/> ON Zone Light 3	[P] Key silent buzzer	[P] Key audible buzzer
<input type="checkbox"/> OFF Zone Light 4	[P] Key audible bell	[P] Key silent bell
<input type="checkbox"/> OFF Zone Light 5	Bell shutdown enabled	Bell shutdown disabled
<input type="checkbox"/> OFF Zone Light 6	Bell Squawk enabled	Bell Squawk disabled
➤ <input checked="" type="checkbox"/> <b>ON</b> <input checked="" type="checkbox"/> <b>OFF</b> Zone Light 7	<b>No bell during Auto-Arm</b>	<b>Bell during Auto-Arm</b>
<input type="checkbox"/> OFF Zone Light 8	<i>For Future Use Zone Light 8 must be OFF at all times</i>	

**Section [08]** Turn on Light [4] to send a Partial Closing code when the panel automatically arms with zones violated.

**[08] First System Option Code**

<i>Default</i>	<i>Zone Light On</i>	<i>Zone Light Off</i>
<input type="checkbox"/> OFF Zone Light 1	N/C Loops	End-of-line Resistor Loops
<input type="checkbox"/> ON Zone Light 2	60 second bypass on power-up	Zones active on power-up
<input type="checkbox"/> OFF Zone Light 3	Force Arm on Auxiliary Delays	No Force Arm on Auxiliary Delays
➤ <input checked="" type="checkbox"/> <b>OFF</b> <input checked="" type="checkbox"/> <b>ON</b> Zone Light 4	<b>Partial close on Auto-Arm</b>	<b>No partial close reported</b>
<input type="checkbox"/> OFF Zone Light 5	Quick-Exit enabled	Quick-Exit disabled
<input type="checkbox"/> OFF Zone Light 6	PC16OUT enabled	PC16OUT disabled
<input type="checkbox"/> OFF Zone Light 7	AC excluded from Trouble	AC included in Trouble
<input type="checkbox"/> OFF Zone Light 8	<i>For Future Use Zone Light 8 must be OFF at all times</i>	

**ADDITIONAL EQUIPMENT REQUIRED:**

None.

**BENEFITS**

This is a convenience feature that will have strong appeal in many sales situations. A common problem with alarm systems is that people forget to turn them on. This can be a minor annoyance or a serious oversight depending on circumstances. The simple solution is automatic arming.

An example is the store or business that wants to be sure that an employee has not left for the day without arming the system. This particular situation is frequently the only reason why some security systems are monitored. Automatic arming can be programmed to turn on at any time needed and is accurate to the second. It has the advantage over monitoring in that the system arms itself automatically, thus sparing the owner or manager great inconvenience when the monitoring station gets around to notifying him to go to the premises to set the alarm. Another important advantage is that the customer is spared the additional monthly charge for monitoring openings and closings.

Automatic arming has a place in residential protection as well. The couple who both go off to work every day are frequently bothered by the uncertainty of whether the alarm has been set by one or the other. Automatic arming set for, say, 8:00 am, puts their minds at ease, and can be the little difference that makes the buying decision go your way.

# AUXILIARY DELAY

## HOW IT WORKS

The Auxiliary Delay zone can have a delay of up to 255 seconds (4 minutes and 15 seconds) without affecting the delay times for the regular delay zone. This zone can also be force armed; that is, the panel can be armed with this zone open. This will allow the user the convenience of arming without having to close the zone first. If the zone is still open when the auxiliary exit delay expires, it will be bypassed until it is secured. When it becomes secure, the zone will be added back into the system.

## WHAT YOU NEED TO PROGRAM

**Section [01]** Program the zone(s) as [0][7] for Auxiliary Delay.

### [01] Zone Definitions

Default		
2	0	Zone 1
<b>2</b>	<b>1</b>	<b>Zone 2</b>
<b>2</b>	<b>1</b>	<b>Zone 3</b>
2	1	Zone 4
0	2	Zone 5
0	2	Zone 6
0	2	Zone 7
0	2	Zone 8

**Section [08]** Turn on Light [3] for the ability to force arm the Auxiliary Delay zone(s).

### [08] First System Option Code

Default	Zone Light On	Zone Light Off
OFF	N/C Loops	End-of-line Resistor Loops
ON	90 second bypass on power-up	Zones active on power-up
<b>OFF</b> <b>ON</b>	<b>Force Arm on Auxiliary Delays</b>	<b>No Force Arm on Auxiliary Delays</b>
OFF	Partial close on Auto-Arm	No partial close reported
OFF	Quick-Exit enabled	Quick-Exit disabled
OFF	PC16OUT enabled	PC16OUT disabled
OFF	AC excluded from Trouble	AC included in Trouble
OFF	<i>For Future Use Zone Light 8 must be OFF at all times</i>	

**Section [02]** Program the entry/exit delays for the zone.

### [02] System Times

Default			
0	3	0	Entry Delay (seconds)
1	2	0	Exit Delay (seconds)
<b>0</b>	<b>4</b>	<b>5</b>	<b>Auxiliary Entry Delay (seconds)</b>
<b>1</b>	<b>8</b>	<b>0</b>	<b>Auxiliary Exit Delay (seconds)</b>
0	0	4	Bell Cut-off Time (minutes)
0	5	0	Loop Response Time ( x 10 ms)

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

There are many applications for this feature. A customer accustomed to leaving their home from the garage in their car would have to change their way of doing things without this feature. With this feature, the customer can arm the system with the garage door open. The time provided by the Auxiliary Delay allows them to enter the garage, drive out, and then close the garage door. When the garage door closes, it becomes part of the system. This feature could also be used for a window that is frequently left open for ventilation. When the system is armed, the window will be bypassed after the Auxiliary Delay. When the window is closed, it is automatically incorporated into the alarm system.

# DELAY BEFORE TRANSMISSION

## HOW IT WORKS

The panel will delay communications of any burglary alarm signal from 0 to 99 seconds. If the alarm is shut off in this delay time, no communication will be sent to the central station. If the alarm is not shut off in this time, the alarm will be transmitted normally.

Note that Fire zones and 24 hour zones cannot be delayed.

## WHAT YOU NEED TO PROGRAM

**Section [42]** Program the time to delay burglary transmissions, 0-99 seconds.

### [42] Communication Variables

Default		
0	3	Swinger Shutdown (number of transmissions)
0	0	<b>Delay Before Transmission (Burglary Zones)</b>
3	0	AC Failure Communication Delay (minutes)
3	0	Test Transmission Cycle (days)

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

New customers will often create false alarms while becoming familiar with their alarm system. Several companies will not enable the communications to the central station for the first month of operation to allow the customer to get familiar with the system without worrying about false alarms. Enabling the Delay Before Transmission feature will allow you to enable communications as soon as the security system is installed, thus sparing your customer the risks involved in going for a month without system monitoring. Inform your customer that a delay period has been programmed so that false alarms due to system unfamiliarity may be silenced before they communicate.

Once the customer is familiar with the system, the Delay Before Transmission feature can be disabled on-site through Installer Programming or remotely via the DLS-1 Downloading software.

# DOOR CHIME

## HOW IT WORKS

The keypad will beep 5 times every time a zone programmed for the Door Chime function is tripped or restored. Note that a zone that is manually bypassed will not activate the door chime.

## WHAT YOU NEED TO PROGRAM

The feature must be enabled using the [\*][4] User Function command.

- Press [\*][4] to turn the Door Chime on or off
- Three short beeps indicate the Door Chime feature is enabled; one long beep indicates the Door Chime feature is disabled.

**Section [01]** Select which zones will work with the Door Chime function by programming either 2 or 3 as the first digit in the Zone Definitions.

### [01] Zone Definitions

*Default*

➤	<u>2</u>   <u>0</u>	<u>2</u>   <u>1</u>	<b>Zone 1</b>
➤	<u>2</u>   <u>1</u>	<u>3</u>   <u>1</u>	<b>Zone 2</b>
	2   1		Zone 3
	2   1		Zone 4
	0   2		Zone 5
	0   2		Zone 6
	0   2		Zone 7
	0   2		Zone 8

### ADDITIONAL EQUIPMENT REQUIRED:

None.

### BENEFITS

It may be required that a sounder activates to draw attention to the fact that a zone has been violated. In a commercial application, the keypad can be made to sound to indicate that the store's front door has been opened. In a residence, the door chime may be used to indicate audibly that the patio door leading to the pool has been opened.

A piezoelectric sounder can be located in areas that do not have a keypad, such as a stock room or a basement. Refer to PGM OUTPUT - REMOTE SOUNDER for the connection procedure.

# FIRE ZONE

## HOW IT WORKS

Any zone on the panel may be programmed as a Fire Zone. The zone is a Class "B" loop; this means a Trouble signal is displayed at the keypad and transmitted to the monitoring station when the loop goes open, and a Fire signal occurs when the loop is shorted. In its normal state, the resistance of the loop measures as 5600 ohms.

When the Fire Zone goes into alarm, it will activate the Bell output on the panel. The Bell output will pulse one second on and then one second off. In order to help prevent false alarm, the Fire communication will be delayed for 30 seconds. If any key on the keypad is pressed within the 30 second delay, the panel will shut off the Bell output and delay the Fire communication for another 90 seconds. If the Fire zone is still in alarm after the 90 second delay expires, the alarm sequence will begin again: the Bell output will pulse and pressing any key on the keypad will shut off the Bell output and delay communication for 90 seconds. This process can be repeated indefinitely, and is designed to prevent false Fire alarms - for example, those caused by cooking smoke - from being transmitted.

If the Fire Zone goes into alarm for 30 seconds, it will latch the alarm and communicate to the monitoring station. An Access Code will then be required to silence the alarm.

The fire detection device - for example, a smoke detector - can be reset by entering the [\*][7] command. For this feature to be operational, the detector must be powered from the control panel's PGM output. The PGM is normally at ground and will switch open for 5 seconds when the [\*][7] keypad command is entered.

## WHAT YOU NEED TO PROGRAM

**Section [34]** Program your Fire Zone Alarm code in this section (in this example, Zone 1 is being used as the Fire Zone).

**Section [35]** Program the Fire Zone Restoral reporting code.

### [34] Alarm Reporting Codes, Zones 1 - 8

➤	<u>1</u> <u>A</u>	<b>Zone 1 Alarm</b>
	.....	Zone 2 Alarm
	.....	Zone 3 Alarm
	.....	Zone 4 Alarm
	.....	Zone 5 Alarm
	.....	Zone 6 Alarm
	.....	Zone 7 Alarm
	.....	Zone 8 Alarm

**Section [39]** Program Fire Zone Trouble code.

### [35] Restoral Reporting Codes, Zones 1 - 8

➤	<u>9</u> <u>9</u>	<b>Zone 1 Restoral</b>
	.....	Zone 2 Restoral
	.....	Zone 3 Restoral
	.....	Zone 4 Restoral
	.....	Zone 5 Restoral
	.....	Zone 6 Restoral
	.....	Zone 7 Restoral
	.....	Zone 8 Restoral

**Section [40]** Program the Fire Zone Trouble Restoral code.

**[39] Maintenance Alarm Reporting Codes**

- ..... Battery Trouble Alarm
- ..... AC Failure Trouble Alarm
- ..... Bell Circuit Trouble Alarm
- **F 1** **Fire Trouble Alarm**
- ..... Auxiliary Power Supply Trouble Alarm
- ..... Periodic Test Transmission
- ..... System Test

**Section [01]** Define the desired zone as a Fire Zone.

**[40] Maintenance Restoral Reporting Codes**

- ..... Battery Trouble Restoral
- ..... AC Failure Trouble Restoral
- ..... Bell Circuit Trouble Restoral
- **F 9** **Fire Trouble Restoral**
- ..... Auxiliary Power Supply Trouble Restoral
- ..... Auxiliary Power Supply Trouble Restoral
- ..... TLM Restoral

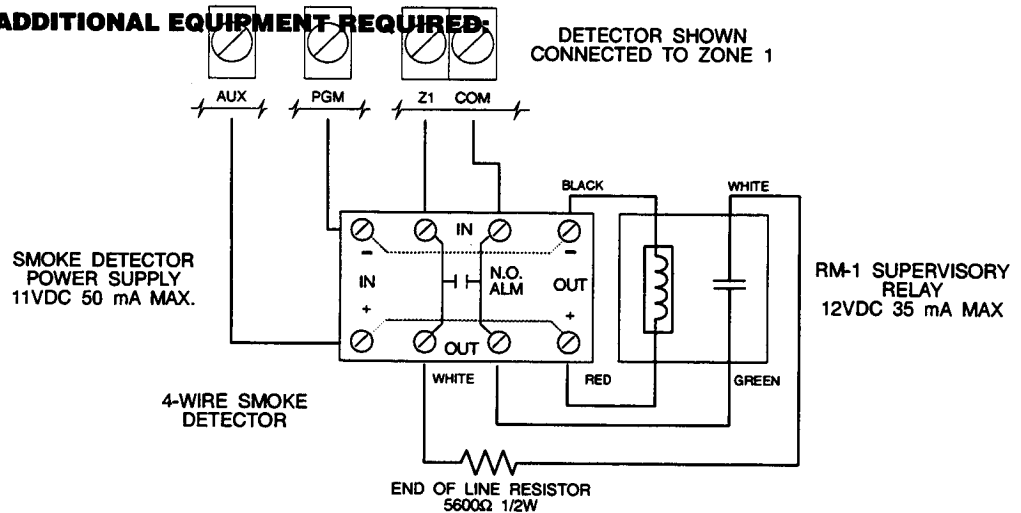
**TYPICAL FIRE ALARM ZONE CONNECTIONS**

**[01] Zone Definitions**

*Default*

- **2 0** **0 8** **Zone 1**
- ..... 2 1 ..... Zone 2
- ..... 2 1 ..... Zone 3
- ..... 2 1 ..... Zone 4
- ..... 0 2 ..... Zone 5
- ..... 0 2 ..... Zone 6
- ..... 0 2 ..... Zone 7
- ..... 0 2 ..... Zone 8

**ADDITIONAL EQUIPMENT REQUIRED:**



4-wire smoke detector and RM-1 Supervisory Relay

**BENEFITS**

Many potential users of supervised smoke detectors forego the safety benefits of this service out of fear of having the fire department respond to an alarm caused by burnt toast or similar carelessness. The keypad-activated transmission delay addresses this concern simply and effectively.

# HOME/AWAY ZONES

## HOW IT WORKS

Any zone defined as Home Away will automatically bypass if the panel is armed and no Delay zones are violated during the exit delay. If a Delay zone is violated, all Home Away zones will be armed after the exit delay has expired.

When armed, Home Away zones can be programmed to act as an Interior or Delay type. When the panel is armed and the Home Away zones were automatically bypassed, pressing [\*][1] will reactivate the Home Away zones. This works for Home/Away zones only. If the panel is Instant Armed using [\*][9][Access Code], the Home Away zones will be automatically bypassed even if a Delay zone is violated. They can still be added back into the system by pressing [\*][1].

The panel also has a Quick Exit feature. When enabled, enter [\*][0] when the panel is armed; the panel will allow one violation of any Delay zone without changing the status of the system. The panel will remain armed and the Home Away zones will remain bypassed. This feature is useful when you want to exit the premises but leave the Home Away zones bypassed.

## WHAT YOU NEED TO PROGRAM

**Section [01]** Program the Interior Zones you want to be Home Away or Home Away with Delay.

### [01] Zone Definitions

Default		
2 0		Zone 1
2 1		Zone 2
2 1		Zone 3
2 1		Zone 4
0 2		Zone 5
➤ 0 2	0 3	Zone 6
➤ 0 2	0 3	Zone 7
➤ 0 2	0 3	Zone 8

**Section [08]** Turn on Light [5] if you want to enable the Quick Exit feature.

### [08] First System Option Code

Default	Zone Light On	Zone Light Off
OFF	N/C Loops	End-of-line Resistor Loops
ON	60 second bypass on power-up	Zones active on power-up
OFF	Force Arm on Auxiliary Delays	No Force Arm on Auxiliary Delays
OFF	Partial close on Auto-Arm	No partial close reported
➤ OFF ON	<b>Quick-Exit enabled</b>	<b>Quick-Exit disabled</b>
OFF	PC16OUT enabled	PC16OUT disabled
OFF	AC excluded from Trouble	AC included in Trouble
OFF	<i>For Future Use Zone Light 8 must be OFF at all times</i>	



**ADDITIONAL EQUIPMENT REQUIRED:**

None.

**BENEFITS**

Automatic Home/Away is a great convenience feature, particularly for residential alarm users. Circuits that provide interior protection, commonly using motion detectors, may be defined at the time of installation as "Home/Away" zones. This means that devices connected to such circuits will be operational only if a certain condition is met. This condition is provided by the delay zone which must be tripped during the exit delay period in order for the "Home/Away" zones to become active. This means that if the user arms the system without leaving the premises, the detectors connected to the "Home/Away" zone will not become active. This can also be described as Automatic by-passing.

While this feature will be welcomed by people who don't want to worry about having to bypass zones at the keypad, it will also be of interest as a convenience feature by those who wish to maintain security while they are occupying the premises, as well as when they are away. At bedtime, the bypassed zones may be easily reactivated by entering a simple keypad command.

The Quick Exit feature is designed to allow the user to exit the premises without having to disarm, manually bypass the interior zones, and then rearm the system.

A good example of this would be the person who leaves for work at 6:00 am while their spouse and children are still sleeping. They can enter [\*][0] on the keypad and then leave the premises without affecting the status of the system. The interior zones will remain bypassed, while the delay zones protecting the entrance and exterior windows will remain active.

If these features are sold and properly presented, your prospect will expect to find them in your competitors' presentation as well. Your prospect may find the features there, but not likely; and if they do, they won't find the special features that DSC has included to make them easier and more convenient to use.

# INSTALLER LOCKOUT

## HOW IT WORKS

The panel can be locked out to prevent reprogramming by another installer from a competing firm - essentially, this feature prevents "hostile takeovers" of your installations. If Installer Lockout is enabled, the Installer Code will not be restored to the factory default setting if a "Reset to Factory Defaults" is performed. All other Sections will be restored to the default program.

After the code is locked out, it can only be changed in Installer Programming or with the DLS-1 Downloading software.

When the panel is powered up after having both AC and battery power disconnected, the line seizure relay will click 10 times to indicate the Installer Lockout feature is enabled. Otherwise, the relay will only click once.

## WHAT YOU NEED TO PROGRAM

**Section [03]** Enter your new 4 digit Installer Code.

### **[03] Installer's Code**

*Default*

2 5 2 5

**Section [90]** No data needs to be entered. Enter [90][Installer's Code][90] to enable the Installer's Lockout feature.

**Section [91]** No data needs to be entered. Enter [91][Installer's Code][91] to disable the Installer's Lockout feature.

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

This feature will help prevent a hostile takeover of your installation as the panel cannot be programmed without the Installer Code. Even if the panel is restored to the factory default settings, your Installer Code will not be erased. While preventing "hostile takeovers", enabling the Installer Lockout will also thwart any criminal elements familiar with security systems from reprogramming your installation.

# LOCAL ONLY ZONES

## HOW IT WORKS

A Local Only zone is one that will only activate the siren or keypad buzzer as annunciation of a violated zone. An Access Code will be required to stop the siren or buzzer. Since the panel gives you the ability to program the Alarm Reporting code for each zone, a zone can be intentionally left blank to prevent reporting.

## WHAT YOU NEED TO PROGRAM

**Section [34]** Program Alarm Reporting codes for all zones except for the Local Only zones. In this example, Zone 5 will be programmed as a 24 hour buzzer zone with no communications.

### [34] Alarm Reporting Codes, Zones 1 - 8

.....	Zone 1 Alarm
.....	Zone 2 Alarm
.....	Zone 3 Alarm
.....	Zone 4 Alarm
➤ <u>0 0</u>	<b>Zone 5 Alarm</b>
.....	Zone 6 Alarm
.....	Zone 7 Alarm
.....	Zone 8 Alarm

**Section [01]** Program your zone as [04] for 24 Hour Bell, [05] for 24 Hour Bell/Buzzer, or [06] for 24 Hour Buzzer.

### [01] Zone Definitions

*Default*

2 0	.....	Zone 1
2 1	.....	Zone 2
2 1	.....	Zone 3
2 1	.....	Zone 4
➤ <u>0 2</u> <u>0 6</u>		<b>Zone 5</b>
0 2	.....	Zone 6
0 2	.....	Zone 7
0 2	.....	Zone 8

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

This feature permits local supervision of elements of the security system whether or not the burglar alarm system is armed. Examples of typical applications include: fire exit doors that must not be locked during normal business hours; temperature sensitive environments such as food storage lockers; sump pump water level, and so forth. The example shown here is programmed to operate the keypad buzzer. Bell or siren operation is possible by programming the second digit as [4] or [5].

The sales advantage of this feature is that by offering it, you add value to your sales proposal and help your customer solve a problem. The chances are slim that either of these considerations will occur to your competitor and, as a result, your proposal will look more professional. And if your price is a little higher it will be seen to be worth every penny when the full benefits of this feature are explained to your prospect.

# PGM OUTPUT KEYPAD ACTIVATED

## HOW IT WORKS

The PGM Output can be activated by pressing [\*][7]. The PGM Output will switch to ground and can be used to activate a relay or turn on a low current device. The PGM Output can sink up to 50 mA. If more than 50 mA will be needed, a relay will be required.

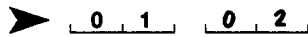
When the keypad sequence is entered, the keypad buzzer will sound for 5 seconds and the PGM Output will switch to ground for that amount of time.

## WHAT YOU NEED TO PROGRAM

**Section [06]** Program [02] for the PGM Output option.

### [06] Programmable Output Options

Default

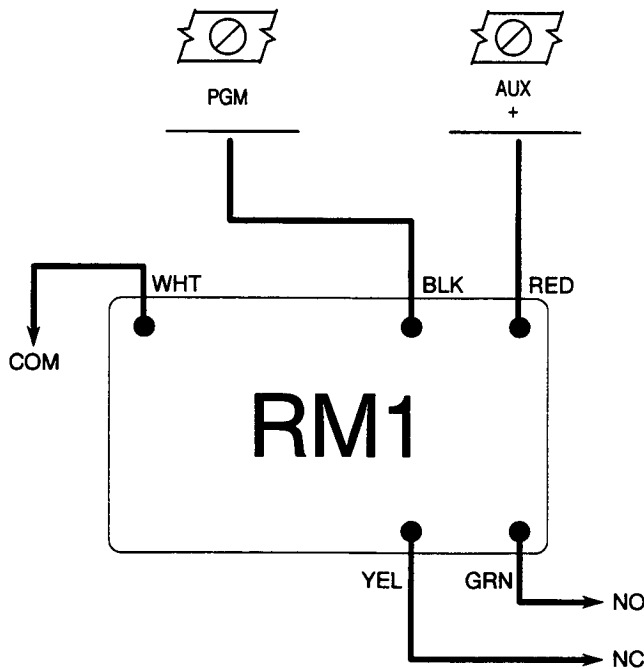


**Section [09]** If you want an Access Code to be required to activate the PGM Output, turn ON Zone Light 5 in Section [09]. With Section [09] Zone Light 5 ON, the user will have to enter [\*][7][Access Code] to activate the PGM Output.

### [09] Second System Option Code

Default	Zone Light On	Zone Light Off
OFF	Zone Light 1	Code 8: One-Time Use
OFF	Zone Light 2	Master Code not changeable
OFF	Zone Light 3	Access Code required for Bypass
ON	Zone Light 4	Access Code to cancel Auto-Arm
➔ OFF <b>ON</b>	<b>Zone Light 5</b>	<b>Access Code for Utility Output</b>
ON	Zone Light 6	Alarms displayed while armed
OFF	Zone Light 7	Show bypass status while armed
OFF	Zone Light 8	Show bypassed zones when armed
		Code 8: Normal Access Code
		Master Code changeable
		Access Code not required for Bypass
		No Access Code to cancel Auto-Arm
		<b>No Access Code for Utility Output</b>
		Alarms displayed while disarmed only
		Bypass status displayed if disarmed only
		Bypassed zones displayed if disarmed only

## TYPICAL PGM OUTPUT RELAY WIRING



**ADDITIONAL EQUIPMENT REQUIRED:**

RM-1 relay if more than 50 mA is required to operate a device.

**BENEFITS**

This feature has many strong applications and can make the sales proposal virtually bulletproof against the competition when properly presented under the right circumstances.

In commercial applications, the need for controlled access is frequently encountered in addition to and separate from burglary protection. The PC2525 can provide that service at a fraction of the cost which would normally be the case with standard access control products.

To ensure an effective sales presentation, obtain from two or three full service locksmiths flat-rate prices for installing 12 volt DC-operated door strikes. Armed with this information, the sales person can offer the prospective alarm user remote door access control from any keypad on the burglar alarm system, or from any keypad specifically installed for that purpose. It is becoming more common, for example, that in high crime neighborhoods many retail establishments use remote door operators to admit customers. Many businesses have computer installations where access is permitted only to certain personnel. The alert sales person will spot these and many other needs which, when properly satisfied, will almost guarantee sales success. By including in your sales proposal a door control system limiting access to those authorized to use the burglar alarm system, you create serious problems for your competitor. And just as important, by including the cost of installing the electronic door strike and associated hardware in your proposal, you can increase your profit margin and still be way below the price of the same system offered by a conventional access control supplier.

## PGM OUTPUT REMOTE SOUNDER

### HOW IT WORKS

By connecting a sounding device (a piezoelectric buzzer, for example) the PGM Output can be used to remotely annunciate the keypad buzzer for the following 5 functions:

- door chime
- pre-alert
- 24 hour buzzer zones
- audible exit delay: steady output
- audible entry delay: pulsed output

### WHAT YOU NEED TO PROGRAM

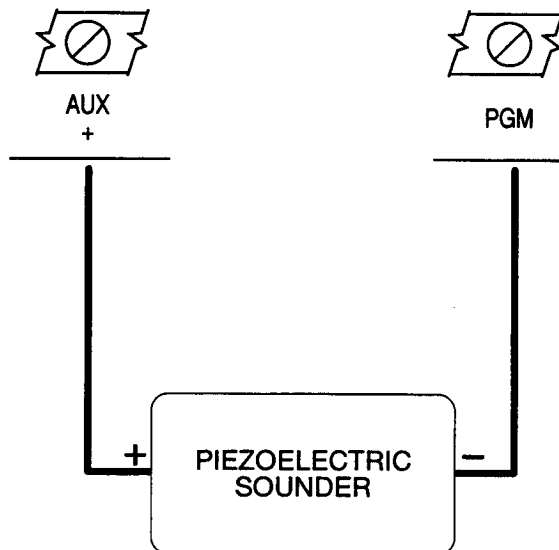
**Section [06]** Program [05] to enable the "Keypad Buzzer Follow Mode" PGM option.

#### [06] Programmable Output Options

Default

➤ 0 1 0 5

### TYPICAL CONNECTIONS FOR PIEZOELECTRIC SOUNDERS



### ADDITIONAL EQUIPMENT REQUIRED:

- piezoelectric sounder (12 volt) or a relay to switch bells or sirens

### BENEFITS

It is occasionally necessary to alert personnel in other parts of a protected area or, because of ambient noise, provide higher sound levels for these functions. It may also be the case that an individual has a hearing impairment and cannot hear the pre-alert warning tone. This feature facilitates the operation of other devices when this requirement is present.

# SIREN SUPERVISION

## HOW IT WORKS

The panel always monitors the load on the Bell output of the panel. If the loop goes open, the panel will immediately indicate a trouble on the keypad and beep the keypad buzzer twice every 10 seconds. The trouble will remain as long as the siren loop is open. A siren trouble may be transmitted to the central station. When the circuit is returned to normal, a restoral code may be transmitted.

If no siren is connected to the control panel, as in a silent alarm installation, connect a 1000 ohm resistor across the BELL+ and BELL- terminals. If a siren driver is being used, the panel will only monitor the connection from the panel to the driver.

Occasionally you will find the siren supervision current may cause the siren to hum. To prevent this, connect a 1000 ohm resistor across the + and - terminals at the siren. If the resistor is connected to the panel's terminals, it will defeat the supervision of the loop.

## WHAT YOU NEED TO PROGRAM

**Section [39]** Program the reporting code for Bell Circuit failure.

### [39] Maintenance Alarm Reporting Codes

.....	Battery Trouble Alarm
.....	AC Failure Trouble Alarm
➤ <b>F 3</b>	<b>Bell Circuit Trouble Alarm</b>
.....	Fire Trouble Alarm
.....	Auxiliary Power Supply Trouble Alarm
.....	Periodic Test Transmission
.....	System Test

**Section [40]** Program the reporting code for Bell Circuit restoral.

### [40] Maintenance Restoral Reporting Codes

.....	Battery Trouble Restoral
.....	AC Failure Trouble Restoral
➤ <b>F 6</b>	<b>Bell Circuit Trouble Restoral</b>
.....	Fire Trouble Restoral
.....	Auxiliary Power Supply Trouble Restoral
.....	Auxiliary Power Supply Trouble Restoral
.....	TLM Restoral

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

A very important part of any security system is the siren or bell output. The audible device will both frighten any intruder as well as draw attention to the break in. Therefore, it is of utmost importance to ensure that the bell or siren circuit is functional at all times.

If fire protection is being utilized with the panel, the siren plays an extremely important role in that protection. Early detection and clear, audible warnings in order to allow escape is the whole point of having fire protection enabled on the security system. If the wire run to the siren has been cut or disconnected, there will be no audible indication that a fire has broken out. Without ample warning, the home owner is in greater danger of being overcome by smoke or fumes. Because of the importance of the sounding device, the PC2525 constantly monitors the siren circuit and will immediately indicate a specific trouble if the siren circuit goes open, and will report this condition to the central station.

Once the home owner has been informed as to the importance of siren supervision, they will look for it in your competition. The advantage will be yours if your competitor cannot offer the same feature.

# SPLIT REPORTING

## HOW IT WORKS

The panel can be programmed to call phone number 1 and report using account number 1. The panel can also be programmed to call phone number 2 and report using account number 2. Events can be directed to the first, second or both phone numbers.

The second number can be used to back up the first number in the event of a failure.

A different format can be selected for each number.

## WHAT YOU NEED TO PROGRAM

**Section [30]** Enter the phone number of the central station followed by the [#] sign. Additional spaces are available for special commands to disable call waiting or get around a PBX system. The following hex digits perform the following functions:

- [B] - panel will simulate the [\*] key
- [C] - panel will pause 4 seconds
- [D] - panel will search for dial tone
- [E] - panel will simulate the [#] key
- [F] - end of phone number marker

For example, assume you have to disable a call waiting feature and then wait for a dial tone. The command to disable the call waiting feature is, in this example, \*70. You would enter the phone number as follows, in HEX format:

- [B][7][0][D][phone number]
- Actual keyed entry: [\*2\*][7][0][\*4\*][PHONE NUMBER]

Enter [#] to exit the Section when done

### [30] First Telephone Number

5 5 5 1 2 3 4

**Section [31]** Enter the account number. You must enter 4 digits. For a 3 digit account, the fourth digit must be [0]. If a [0] is present in the account number, you must enter a hex [A] in its place ([\*1\*]).

### [31] First Account Code

8 7 2 4

**Section [32]** Enter the phone number of the central station using the same format as described in Section [30].

### [32] Second Telephone Number

1 9 0 5 5 5 5 1 2 3 4

**Section [33]** Enter the account number using the same format as described in Section [31].

### [33] Second Account Code

9 7 2 4



**Section [46]** Turn off Light [4] if the second number will be used to backup the first number. DO NOT turn the light off unless the second number has been programmed.

**[46] First Communicator Option Code**

Default		Zone Light On	Zone Light Off
OFF	Zone Light 1	Communicator disable	Communicator enabled
OFF	Zone Light 2	Restorals on Bell Timeout	Restorals follow zone
ON	Zone Light 3	DTMF dialing	Pulse dialing
➤ ON, OFF	<b>Zone Light 4</b>	<b>Call First Telephone Number only</b>	<b>Back-up to Second Telephone Number</b>
OFF	Zone Light 5	Partial close identified	Partial close not identified
OFF	Zone Light 6	1400 Hz Radionics	2900 Hz Radionics
OFF	Zone Light 7	Transmission limited to 24-hour period	Transmission limited to arming
OFF	Zone Light 8	Close confirmation enabled	Close confirmation disabled

**Section [44]** Select the format to be used with each phone number. The format need not be the same. Four digits must be entered in this Section even if the second number is not being used. In this example, the First Telephone Number is formatted for option [00] Silent Knight/ Ademco slow and the Second Telephone Number is formatted for option [05] Sescoa super speed.

**[44] Communicator Format Options**

Default				
<u>0</u>	<u>1</u>	<u>0</u>	<u>0</u>	First Telephone Number
<u>0</u>	<u>1</u>	<u>0</u>	<u>5</u>	Second Telephone Number

**Section [45]** Select which phone number the events will report to. The options are:

- [1] call first phone number
- [2] call second phone number
- [3] call both phone numbers
- [0] call no phone number

**[45] Communicator Call Direction**

Default			
<u>1</u>	<u>1</u>	<b>Zone Alarms and Restorals</b>	
<u>1</u>	<u>2</u>	<b>Access Code Openings and Closings</b>	
<u>1</u>	<u>1</u>	<b>Priority Alarms and Restorals</b>	
<u>1</u>	<u>2</u>	<b>Maintenance Alarms and Restorals</b>	

**ADDITIONAL EQUIPMENT REQUIRED:**

None.

**BENEFITS**

Communication with the central station is the most important feature you offer your customer. It is your source of recurring revenue and the customer's source of peace of mind.

Programming the second phone number and account number identical to the first and selecting the second phone number as a back-up will give you, in effect, 16 calling attempts to the central station. Even at the busiest times, the panel should be able to communicate.

Finally, all events can be reported to both numbers, allowing you to connect your own receiver to back-up the central station. This will allow you to immediately contact the customer in the event of a false alarm or trouble report without waiting to be contacted by the central station.

# SWINGER SHUTDOWN

## HOW IT WORKS

When an alarm occurs, the panel will communicate the alarm and trigger a counter. When the zone goes into alarm a programmed number of times within a programmed time frame, the panel will no longer communicate the alarm for that zone, effectively shutting it down. If any other zone goes into alarm, that alarm will communicate if it has not yet shut down.

The panel also has the option to shut down the siren activation for a zone that has shut down.

The programmable time frame for the shutdown can be either a 24 hour period or an armed period. If the 24 hour period option is selected, the panel will reset the counters at midnight. For the armed period option, it will reset the counters every time the panel is armed.

Note that Fire zones never shut down.

## WHAT YOU NEED TO PROGRAM

**Section [46]** Turn on Light [7] to reset the shutdown variables every night at midnight, or turn Light [7] off to reset the shutdown variables every time the system is armed.

### [46] First Communicator Option Code

Default	Zone Light On	Zone Light Off
OFF Zone Light 1	Communicator disable	Communicator enabled
OFF Zone Light 2	Restorals on Bell Timeout	Restorals follow zone
ON Zone Light 3	DTMF dialing	Pulse dialing
ON Zone Light 4	Call First Telephone Number only	Back-up to Second Telephone Number
OFF Zone Light 5	Partial close identified	Partial close not identified
OFF Zone Light 6	1400 Hz Radionics	2300 Hz Radionics
➤ OFF <b>ON</b> Zone Light 7	<b>Transmission limited to 24-hour period</b>	<b>Transmission limited to arming</b>
OFF Zone Light 8	Close confirmation enabled	Close confirmation disabled

**Section [10]** With Light [5] turned on, the Bell output will not activate if a zone that is shutdown trips again. With Light [5] turned off, the Bell output will activate every time a zone goes into alarm.

### [10] Third System Option Code

Default	Zone Light On	Zone Light Off
OFF Zone Light 1	2-minute Keypad Timeout	No Keypad Timeout
OFF Zone Light 2	[F] Key disabled	[F] Key enabled
ON Zone Light 3	[P] Key silent buzzer	[P] Key audible buzzer
OFF Zone Light 4	[P] Key audible bell	[P] Key silent bell
➤ OFF <b>ON</b> Zone Light 5	<b>Bell shutdown enabled</b>	<b>Bell shutdown disabled</b>
OFF Zone Light 6	Bell Squawk enabled	Bell Squawk disabled
ON Zone Light 7	No bell during Auto-Arm	Bell during Auto-Arm
OFF Zone Light 8	<i>For Future Use Zone Light 8 must be OFF at all times</i>	

**Section [42]** Program the maximum number of transmissions before the shut down for a zone occurs. Programming [0][0] disables the shutdown, therefore allowing unlimited transmissions. In this example, 5 transmissions have been specified as the maximum.

### [42] Communication Variables

Default		
<u>0 3</u> <u>0 5</u>	<b>Swinger Shutdown (number of transmissions)</b>	
0 0	Delay Before Transmission (Burglary Zones)	
3 0	AC Failure Communication Delay (minutes)	
3 0	Test Transmission Cycle (days)	

## ADDITIONAL EQUIPMENT REQUIRED:

None.

# TELEPHONE LINE MONITOR (TLM)

## HOW IT WORKS

TLM is built into the PC2525 control panel. TLM checks the phone line for voltage only: the voltage on the line must drop below 1 volt for 30 to 40 seconds for the panel to activate a telephone line trouble.

The TLM can act in three different ways: it can be disabled for a local system; it can be programmed to activate a trouble indication at the keypad only; or it can activate a trouble indication when disarmed and activate the Bell output if armed.

A reporting code can be programmed to be sent when the phone line has been restored. The phone will restore within 30 seconds of the phone line being reconnected.

## WHAT YOU NEED TO PROGRAM

**Section [11]** Turn Light [7] on to disable the TLM in a local system. Turn Light [8] on if you only want a Trouble indication at the keypad. If Light [8] is off, the panel will activate the alarm if the phone line drops and the panel is armed.

### [11] Fourth System Option Code

Default		Zone Light On	Zone Light Off
OFF	Zone Light 1	Bell pulses always	Bell pulses on Fire Alarm only
OFF	Zone Light 2	Bell Squawk on Exit Delay	No Bell Squawk
OFF	Zone Light 3	Bell Squawk on Entry Delay	No Bell Squawk
ON	Zone Light 4	Audible Exit Fault enabled	Audible Exit Fault disabled
ON	Zone Light 5	Audible exit with urgency	Standard Exit Delay
ON	Zone Light 6	Urgency on Entry Delay	Standard Entry Delay
➤ OFF	<b>Zone Light 7</b>	<b>TLM disabled</b>	<b>TLM enabled</b>
➤ OFF	<b>Zone Light 8</b>	<b>TLM silent (trouble)</b>	<b>TLM audible if armed</b>

**Section [40]** Program the reporting code to indicate the phone line has been restored.

### [40] Maintenance Restoral Reporting Codes

.....	Battery Trouble Restoral
.....	AC Failure Trouble Restoral
.....	Bell Circuit Trouble Restoral
.....	Fire Trouble Restoral
.....	Auxiliary Power Supply Trouble Restoral
.....	Auxiliary Power Supply Trouble Restoral
➤ <b>6 6</b>	<b>TLM Restoral</b>

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

An important part of any security system is its connection to the outside world. The PC2525 monitors electrical characteristics of the telephone line to ensure its continued presence. If the line is cut or otherwise disconnected and the system is armed, the local bell or siren will operate as if a burglary had been detected. If the system is disarmed, such a condition will display locally at all of the system keypads as a system trouble. This feature may be programmed to display as a trouble only whether the system is armed or disarmed, or it may be shut off entirely. Once the prospect fully understands the importance of this feature to their security, they will want it and will look for it from your competitor.

# TEST TRANSMISSION

## HOW IT WORKS

The panel can be programmed to send a test signal to the central station at a programmable time every 1 to 99 days.

## WHAT YOU NEED TO PROGRAM

First you must set the 24 hour clock in the panel. Do the following:

- [\*][6][Master Code] to enter User Function programming
- [1] to select the set 24 hour clock option
- [H][H][M][M] to program the time; use 24 hour format
- Press [#] to return to the Ready mode

**Section [39]** Program the code you want to send as a test signal.

### [39] Maintenance Alarm Reporting Codes

	Battery Trouble Alarm
	AC Failure Trouble Alarm
	Bell Circuit Trouble Alarm
	Fire Trouble Alarm
	Auxiliary Power Supply Trouble Alarm
	<b>Periodic Test Transmission</b>
	System Test



6 6

**Section [42]** Program the number of days between test transmissions.

### [42] Communication Variables

*Default*

		Swinger Shutdown (number of transmissions)
		Delay Before Transmission (Burglary Zones)
		AC Failure Communication Delay (minutes)
		<b>Test Transmission Cycle (days)</b>

**Section [43]** Program the time you want the panel to send the test transmission.

### [43] Test Transmission Time-of-Day

*Default*

9 9 9 9

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

The PC2525 may be programmed to transmit a signal to the monitoring station at a precisely timed interval varying between once every 24 hours to once every 99 days. This is used with computerized monitoring stations, and the absence of the test signal is displayed as a fault condition. It is the central station's assurance that they are receiving signals from their panel properly and will be able to act accordingly in case of a break-in.

As with most other features available in DSC panels, its value to your prospect can't be known until it has been pointed out and discussed. Your doing so will set you apart from the majority of the people engaged in selling security systems, and thereby give you an important edge.

## URGENCY ON ENTRY DELAY

### HOW IT WORKS

Normally, when the system is armed and a Delay Zone is activated, the keypad will sound a steady tone to alert the user that the Entry Delay is in progress and that the system should be disarmed.

When the Urgency on Entry Delay feature is enabled, the keypad sounder will beep rapidly during the last 10 seconds of the Entry Delay to alert the user that the Entry Delay is about to expire.

### WHAT YOU NEED TO PROGRAM

Enable the Urgency on Entry Delay option in Programming Section [11] Fourth System Option Code

#### [11] Fourth System Option Code

Default	Zone Light On	Zone Light Off
[OFF] <input type="checkbox"/>	Zone Light 1	Bell pulses always
[OFF] <input type="checkbox"/>	Zone Light 2	Bell Squawk on Exit Delay
[OFF] <input type="checkbox"/>	Zone Light 3	Bell Squawk on Entry Delay
[ON] <input type="checkbox"/>	Zone Light 4	Audible Exit Fault enabled
[ON] <input type="checkbox"/>	Zone Light 5	Audible exit with urgency
➤ [ON] <input checked="" type="checkbox"/> [ON] <input checked="" type="checkbox"/>	<b>Zone Light 6</b>	<b>Urgency on Entry Delay</b>
[OFF] <input type="checkbox"/>	Zone Light 7	Standard Entry Delay
[OFF] <input type="checkbox"/>	Zone Light 8	TLM disabled
		TLM enabled
		TLM silent (trouble)
		TLM audible if armed

### ADDITIONAL EQUIPMENT REQUIRED:

None.

### BENEFITS

This is one of the SIA-suggested false alarm prevention features. With false alarms always being a concern and an inconvenience for both the home owner and the dealer, this feature will help alert the system user of the end of the Entry Delay and the need to disarm the system before an alarm is generated.

# USER INITIATED BELL TEST

## HOW IT WORKS

The customer can activate a bell test which will perform the following 5 functions simultaneously:

- sound the keypad buzzer for two seconds
- sound the siren output for 2 seconds
- light all the lights on the keypad for 2 seconds
- activate a battery test
- send a signal to the central station

All functions are automatic except for the report to the central station. The panel will only communicate if a valid reporting code has been programmed.

## WHAT YOU NEED TO PROGRAM

The function does not have to be enabled. Any time the customer enters the following sequence the panel will activate the test:

Press [\*][6][Master Code][8]

**Section [39]** Program the reporting code to indicate the customer has activated a test.

### [39] Maintenance Alarm Reporting Codes

- ..... Battery Trouble Alarm
- ..... AC Failure Trouble Alarm
- ..... Bell Circuit Trouble Alarm
- ..... Fire Trouble Alarm
- ..... Auxiliary Power Supply Trouble Alarm
- ..... Periodic Test Transmission
- **A A System Test**

## ADDITIONAL EQUIPMENT REQUIRED:

None.

## BENEFITS

This feature will reassure the customer that their security system is functioning properly. It should also be stressed that the panel performs a battery test when the bell test is initiated, thus ensuring that the vital backup supply will operate properly in the event of a power failure. And when the central station receives the reporting code indicating that a bell test is being performed, it is their assurance that their client is testing the system on a regular basis as specified in the monitoring contract.

