

FA168C / FA168C-CN
FA148CP / FA148CP-CN

Security Systems

User's Guide



LIMITATIONS OF THIS SYSTEM

WARNING! THE LIMITATIONS OF THIS ALARM SYSTEM

While this system is an advanced design security system, it does not offer guaranteed protection against burglary or other emergency. Any alarm system, whether commercial or residential, is subject to compromise or failure to warn for a variety of reasons. For example:

- Intruders may gain access through unprotected openings or have the technical sophistication to bypass an alarm sensor or disconnect an alarm warning device.
- Intrusion detectors (e.g. passive infrared detectors), smoke detectors, and many other sensing devices will not work without power. Battery operated devices will not work without batteries, with dead batteries, or if the batteries are not put in properly. Devices powered solely by AC will not work if their AC power supply is cut off for any reason, however briefly.
- Signals sent by wireless transmitters may be blocked or reflected by metal before they reach the alarm receiver. Even if the signal path has been recently checked during a weekly test, blockage can occur if a metal object is moved into the path.
- A user may not be able to reach a panic or emergency button quickly enough.
- While smoke detectors have played a key role in reducing residential fire deaths in the United States, they may not activate or provide early warning for a variety of reasons in as many as 35% of all fires, according to data published by the Federal Emergency Management Agency. Some of the reasons smoke detectors used in conjunction with this System may not work are as follows. Smoke detectors may have been improperly installed and positioned. Smoke detectors may not sense fires that start where smoke cannot reach the detectors, such as in chimneys, in walls, or roofs, or on the other side of closed doors. Smoke detectors also may not sense a fire on another level of a residence or building. A second floor detector, for example, may not sense a first floor or basement fire. Moreover, smoke detectors have sensing limitations. No smoke detector can sense every kind of fire every time. In general, detectors may not always warn about fires caused by carelessness and safety hazards like smoking in bed, violent explosions, escaping gas, improper storage of flammable materials, overloaded electrical circuits, children playing with matches, or arson. Depending upon the nature of the fire and/or the locations of the smoke detectors, the detector, even if it operates as anticipated, may not provide sufficient warning to allow all occupants to escape in time to prevent injury or death.
- Passive Infrared Motion Detectors can only detect intrusion within the designed ranges as diagrammed in their installation manual. Passive Infrared Detectors do not provide volumetric area protection. They do create multiple beams of protection, and intrusion can only be detected in unobstructed areas covered by those beams. They cannot detect motion or intrusion that takes place behind walls, ceilings, floors, closed doors, glass partitions, glass doors, or windows.

Mechanical tampering, masking, painting or spraying of any material on the mirrors, windows or any part of the optical system can reduce their detection ability. Passive Infrared Detectors sense changes in temperature; however, as the ambient temperature of protected area approaches the temperature range of 90° to 105°F, the detection performance can decrease.

- Alarm warning devices such as sirens, bells or horns may not alert people or wake up sleepers if they are located on the other side of closed or partly open doors. If warning devices sound on a different level of the residence from the bedrooms, then they are less likely to waken or alert people inside the bedrooms. Even persons who are awake may not hear the warning if the alarm is muffled from a stereo, radio, air conditioner or other appliance, or by passing traffic. Finally, alarm warning devices, however loud, may not warn hearing-impaired people or waken deep sleepers.
- Telephone lines needed to transmit alarm signals from a premises to a central monitoring station may be out of service or temporarily out of service. Telephone lines are also subject to compromise by sophisticated intruders.
- Even if the system responds to the emergency as intended, however, occupants may have insufficient time to protect themselves from the emergency situation. In the case of a monitored alarm system, authorities may not respond appropriately.
- This equipment, like other electrical devices, is subject to component failure. Even though this equipment is designed to last as long as 10 years, the electronic components could fail at any time.

The most common cause of an alarm system not functioning when an intrusion or fire occurs is inadequate maintenance. This alarm system should be tested weekly to make sure all sensors and transmitters are working properly.

Installing an alarm system may make one eligible for lower insurance rates, but an alarm system is not a substitute for insurance. Homeowners, property owners and renters should continue to act prudently in protecting themselves and continue to insure their lives and property.

We continue to develop new and improved protection devices. Users of alarm systems owe it to themselves and their loved ones to learn about these developments.

Charts of Your System's Features

Schedules: master code + [#] + [6] [4]. (†FA168C can use schedules 01-16; FA148CP can only use schedules 01-04.)

No.	Event (see list below)	Device No. for "01" events: (see device list below)	Group No. for "02" events: enter 1-8	Partition†† for "04-06" events: enter 1, 2, or 3	Start Time/ Day	Stop Time/ Day	Repeat (yes/no)	Random (yes/no)
00								
01								
02								
03								
04								
05†								
06†								
07†								
08†								
09†								
10†								
11†								
12†								
13†								
14†								
15†								
16†								

Events: 01 = device on/off 04 = forced STAY arm 07 = display "reminder"
 02 = user access 05 = forced AWAY arm
 03 = latch key report 06 = auto disarm †† Partitions apply to the FA168C only.

List of Output Devices

(† FA168C can use devices 01-16; FA148CP can only use devices 01-08; both can use trigger devices 17/18.)

Device†	Description	Schedule No.	Function Key
01			
02			
03			
04			
05			
06			
07			
08			
09			
10			
11			
12			
13			
14			
15			
16			
17			
18			

Charts of Your System's Features

User Setup (continued)

Enter system/partition master code + [8] + user no. + "#" command listed in column heading...

User No.†	User Name	User's Part(s). (system master only) [#] [3] + part(s) + [#]	Security Code enter new code	Auth. Level [#] [1] + level	Access Group [#] [2] + group	RF Zone Number [#] [4] + zone no.	Pager on/off [#] [5] + 0/1
33	partition 2 master	(2)		(4)			(1)
34		(2)		(0)			(1)
35		(2)		(0)			(1)
36		(2)		(0)			(1)
37		(2)		(0)			(1)
38		(2)		(0)			(1)
39		(2)		(0)			(1)
40		(2)		(0)			(1)
41		(2)		(0)			(1)
42		(2)		(0)			(1)
43		(2)		(0)			(1)
44		(2)		(0)			(1)
45		(2)		(0)			(1)
46		(2)		(0)			(1)
47		(2)		(0)			(1)
48		(2)		(0)			(1)
49		(2)		(0)			(1)

Authority Levels: 0 = standard user
 1 = arm only
 2 = guest
 3 = duress
 4 = partition master

Partitions: 0 = clears partition 1 and partition 2 assignments
 1 = partition 1 and common
 2 = partition 2 and common
 3 = common partition only
 Paging: 0 = no paging
 1 = allow paging

† Users 34-49 apply to FA168C only; user 33 is partition 2 master for FA168C, and the last user for FA148CP.

Paging Setup

Pager	Pager Phone Number/ Prefix Characters	Automatically Reports Upon...						Scheduled	Func. Key
		open/close		alarm/trouble		zone list			
		p1	p2	p1	p2	p1	p2		
1									
2									
3†									
4†									

† Pagers 3 and 4 apply to FA168C.

Charts of Your System's Features

User Setup

The following chart will help keep track of system users. Copies should be distributed to the partition 1 and partition 2 (if applicable) masters for their records.

To program a user attribute:

Enter system/partition master code + [8] + user no. + “#” command listed in column heading...

User No.	User Name	User's Part(s).† (system master only) [#] [3] + part(s) + [#]	Security Code enter new code	Auth. Level [#] [1] + level	Access Group [#] [2] + group	RF Zone Number [#] [4] + zone no.	Pager on/off [#] [5] + 0/1
01	installer	(all)		installer			(0)
02	system master	(all)		master			(0)
03	partition 1 master	(1)		(4)			(0)
04		(1)		(0)			(0)
05		(1)		(0)			(1)
06		(1)		(0)			(1)
07		(1)		(0)			(1)
08		(1)		(0)			(1)
09		(1)		(0)			(1)
10		(1)		(0)			(1)
11		(1)		(0)			(1)
12		(1)		(0)			(1)
13		(1)		(0)			(1)
14		(1)		(0)			(1)
15		(1)		(0)			(1)
16		(1)		(0)			(1)
17		(1)		(0)			(1)
18		(1)		(0)			(1)
19		(1)		(0)			(1)
20		(1)		(0)			(1)
21		(1)		(0)			(1)
22		(1)		(0)			(1)
23		(1)		(0)			(1)
24		(1)		(0)			(1)
25		(1)		(0)			(1)
26		(1)		(0)			(1)
27		(1)		(0)			(1)
28		(1)		(0)			(1)
29		(1)		(0)			(1)
30		(1)		(0)			(1)
31		(1)		(0)			(1)
32		(1)		(0)			(1)

† Partitions apply to the FA168C only.

Charts of Your System's Features

† Features marked with a dagger apply to the FA168C only.

Features	Comments				
Exit Delay	Part. 1:		Part. 2†:		
Entry Delay 1	Part. 1:		Part. 2†:		
Entry Delay 2	Part. 1:		Part. 2†:		
Night-Stay Zones	Zones:				
Quick Arm	yes		no		
Quick Bypass	yes		no		
Automatic Paging	yes		no		users:
Keyswitch Arming (circle type of LED lighting)	Arm AWAY:		steady	flash	
	Arm STAY:		steady	flash	
Function Keys	A	B	C	D	Comments
• Single-Button Arming					
• Step Arming					
• Paging (see Paging chart)					
• Time/Date Display					
• Macro Key 1					
• Macro Key 2					
• Macro Key 3†					
• Macro Key 4†					
• Emergency Key††: Personal					
• Emergency Key††: Silent Alarm					
• Emergency Key††: Audible Alarm					
• Emergency Key††: Fire					
• Device Activation					Device:

†† Emergency Keys: A = [1] / [*] B = [*] / [#] C = [3] / [#]

Regulatory Statements (Continued)

Industrie Canada

AVIS: L'étiquette d'Industrie Canada identifie le matériel homologué. Cette étiquette certifie que le matériel est conforme aux normes de protection, d'exploitation et de sécurité des réseaux de télécommunications, comme le prescrivent les documents concernant les exigences techniques relatives au matériel terminal. Le Ministère n'assure toutefois pas que le matériel fonctionnera à la satisfaction de l'utilisateur.

Avant d'installer ce matériel, l'utilisateur doit s'assurer qu'il est permis de le raccorder aux installations de l'entreprise locale de télécommunication. Le matériel doit également être installé en suivant une méthode acceptée de raccordement. L'abonné ne doit pas oublier qu'il est possible que la conformité aux conditions énoncées ci-dessus n'empêche pas la dégradation du service dans certaines situations.

Les réparations de matériel homologué doivent être coordonnées par un représentant désigné par le fournisseur. L'entreprise de télécommunications peut demander à l'utilisateur de débrancher un appareil à la suite de réparations ou de modifications effectuées par l'utilisateur ou à cause de mauvais fonctionnement.

Pour sa propre protection, l'utilisateur doit s'assurer que tous les fils de mise à la terre de la source d'énergie électrique, de lignes téléphoniques et des canalisations d'eau métalliques, s'il y en a, sont raccordés ensemble. Cette précaution est particulièrement importante dans les régions rurales.

Avertissement : L'utilisateur ne doit pas tenter de faire ces raccordements lui-même; il doit avoir recours à un service d'inspection des installations électriques, ou à un électricien, selon le cas.

AVIS : L'indice d'équivalence de la sonnerie (IES) assigné à chaque dispositif terminal indique le nombre maximal de terminaux qui peuvent être raccordés à une interface. La terminaison d'une interface téléphonique peut consister en une combinaison de quelques dispositifs, à la seule condition que la somme d'indices d'équivalence de la sonnerie de tous les dispositifs n'excède pas 5.

Regulatory Statements and Warnings

NOTE: This is a "Grade A" Residential System

RADIO FREQUENCY EMISSIONS

Federal Communications Commission (FCC) Part 15

This device complies with part 15 of the FCC rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Industry Canada

This Class B digital apparatus complies with Canadian ICES-003.
Cet Appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

TELEPHONE/MODEM INTERFACE

FCC Part 68

This equipment complies with Part 68 of the FCC rules. On the front cover of this equipment is a label that contains the FCC registration number and Ringer Equivalence Number (REN). You must provide this information to the telephone company when requested.

This equipment uses the following USOC jack: RJ31X

This equipment may not be used on telephone-company-provided coin service. Connection to party lines is subject to state tariffs. This equipment is hearing-aid compatible.

Industry Canada

NOTICE: The Industry Canada Label identifies certified equipment. This certification means that the equipment meets telecommunications network protective, operational and safety requirements as prescribed in the appropriate Terminal Equipment Technical Requirements document(s). The Department does not guarantee the equipment will operate to the user's satisfaction.

Before installing this equipment, users should ensure that it is permissible to be connected to the facilities of the local telecommunications company. The equipment must also be installed using an acceptable method of connection. The customer should be aware that compliance with the above conditions may not prevent degradation of service in some situations.

Repairs to certified equipment should be coordinated by a representative designated by the supplier. Any repairs or alterations made by the user to this equipment, or equipment malfunctions, may give the telecommunications company to request the user to disconnect the equipment.

Users should ensure for their own protection that the electrical ground connections of the power utility, telephone lines and internal metallic water pipe system, if present, are connected together. This precaution may be particularly important in rural areas.

Caution: Users should not attempt to make such connections themselves but should contact appropriate electric inspection authority, or electrician, as appropriate.

Ringer Equivalence Number Notice:

The **Ringer Equivalence Number** (REN) assigned to each terminal device provides an indication of the maximum number of terminals allowed to be connected to a telephone interface. The termination on an interface may consist of any combination of devices subject only to the requirement that the sum of the Ringer Equivalence Numbers of all the devices does not exceed 5.

Summary of Audible/Visual Notifications

Alpha Display Keypads

SOUND	CAUSE	DISPLAY
LOUD, INTERRUPTED* Keypad & Ext.	FIRE ALARM.	FIRE is displayed; descriptor of zone in alarm is displayed. If a fire alarm is manually activated, zone number 95 will be displayed.
LOUD, CONTINUOUS* Keypad & Ext.	BURGLARY/AUDIBLE EMERGENCY ALARM.	ALARM is displayed. If programmed, descriptor of zone in alarm is also displayed
ONE SHORT BEEP (not repeated) Keypad only	a. SYSTEM DISARM. b. SYSTEM ARMING ATTEMPT WITH AN OPEN ZONE. c. BYPASS VERIFY.	a. DISARMED/READY TO ARM is displayed. b. Number and descriptor of open protection zone is displayed. c. Numbers and descriptors of the bypassed zones are displayed (One beep is heard for each zone displayed). Subsequently, the following is displayed: DISARMED BYPASS /Ready to Arm.
ONE SHORT BEEP (once every 40 secs) Keypad only	a. SYSTEM IS IN TEST MODE. b. LOW BATTERY AT A TRANSMITTER.	a. Opened Zone identifications will appear. b. LO BAT displayed with description of transmitter.
TWO SHORT BEEPS Keypad only	ARM AWAY or MAXIMUM.	ARMED AWAY or MAXIMUM displayed. Red ARMED indicator lit.
THREE SHORT BEEPS Keypad only	a. ARM STAY, NIGHT-STAY, OR INSTANT. b. ZONE OPENED WHILE SYSTEM IS DISARMED.	a. ARMED STAY or ARMED INSTANT displayed. Red ARMED indicator lit. b. CHIME displayed, descriptor of open protection zone will be displayed if the [*] key is pressed.
RAPID BEEPING Keypad only	a. TROUBLE. b. MEMORY OF ALARM. c. SYSTEM LOW BATTERY. d. EXT. SOUNDER WIRE FAIL.	a. CHECK displayed. Descriptor of troubled protection zone is displayed. b. FIRE or ALARM is displayed; descriptor of zone in alarm is displayed. c. SYSTEM LO BAT displayed. d. BELL FAILURE is displayed.
SLOW BEEPING Keypad only	a. EXIT DELAY WARNING (if programmed). b. ENTRY DELAY WARNING.	a. ARMED AWAY OR MAXIMUM is displayed along with You May Exit Now . b. DISARM SYSTEM OR ALARM WILL OCCUR is displayed. Exceeding the delay time without disarming causes an alarm.

* If a bell is used as external sounder, fire alarm is *pulsed ring*; burglary/audible emergency is *steady ring*.

Summary of Audible/Visual Notifications

Fixed-Word Display Keypads

SOUND	CAUSE	DISPLAY
LOUD, INTERRUPTED* Keypad & Ext.	FIRE ALARM	FIRE is displayed; zone number of zone in alarm is displayed. If a fire alarm is manually activated, zone number 95 will be displayed.
LOUD, CONTINUOUS* Keypad & Ext.	BURGLARY/AUDIBLE EMERGENCY ALARM	ALARM is displayed. Zone number of zone in alarm is also displayed.
ONE SHORT BEEP (not repeated) Keypad only	a. SYSTEM DISARM b. SYSTEM ARMING ATTEMPT WITH AN OPEN ZONE. c. BYPASS VERIFY	a. READY indicator light comes on. b. Number of the open protection zone displayed. c. Zone numbers of the bypassed protection zones are displayed (one beep is heard for each zone displayed). Subsequently, BYPASS is displayed.
ONE SHORT BEEP (once every 40 secs) Keypad only	a. SYSTEM IS IN TEST MODE b. LOW BATTERY AT A TRANSMITTER	a. Opened zone numbers will appear. b. BAT displayed with zone number of transmitter.
TWO SHORT BEEPS Keypad only	ARM AWAY or MAXIMUM	AWAY is displayed. Red ARMED indicator is lit.
THREE SHORT BEEPS Keypad only	a. ARM STAY, NIGHT-STAY, OR INSTANT b. ZONE OPENED WITH SYSTEM IN CHIME MODE.	a. STAY or INSTANT is displayed. Red ARMED indicator is lit. b. CHIME displayed; zone number of open protection zone will be displayed if the [*] key is pressed.
RAPID BEEPING Keypad only	a. TROUBLE b. MEMORY OF ALARM c. SYSTEM LOW BATTERY d. EXT. SOUNDER WIRING FAIL	a. CHECK displayed. Zone number of troubled protection zone is displayed. b. FIRE or ALARM is displayed; zone number of zone in alarm is displayed c. BAT displayed with no zone ID number. d. CHECK 70 is displayed.
SLOW BEEPING Keypad only	a. EXIT DELAY WARNING b. ENTRY DELAY WARNING	a. AWAY is displayed. b. Exceeding the entry delay time without disarming causes alarm.

* If a bell is used as external sounder, fire alarm is *pulsed ring*; burglary/audible emergency is *steady ring*.

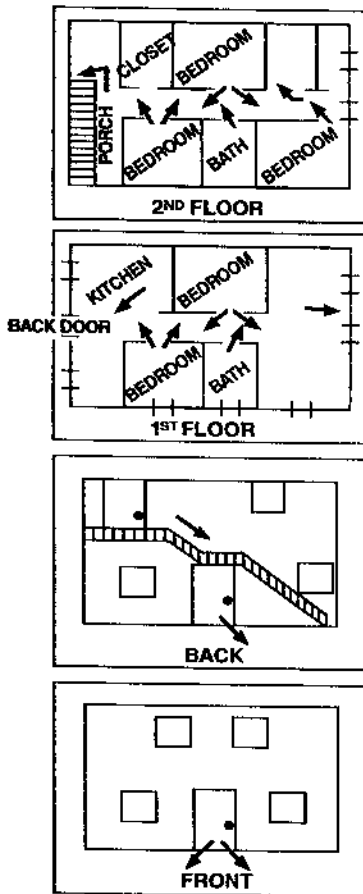
Quick Guide to Basic System Functions

FUNCTION	PROCEDURE	COMMENTS
Check Zones	Press READY key.	View faulted zones when system not ready.
Arm System	Enter code. Press arming key desired: (AWAY, STAY, NIGHT-STAY, MAXIMUM, INSTANT)	Arms system in mode selected.
Quick Arm (if programmed)	Press #. Press arming key desired: (AWAY, STAY, MAXIMUM, INSTANT)	Arms system in mode selected, quickly and without use of a code.
Bypass Zone(s)	Enter code. Press BYPASS key. Enter zone number(s) to be bypassed (use 2-digit entries).	Bypassed zones are unprotected and will not cause an alarm if violated.
Quick Bypass (if programmed)	Enter code. Press BYPASS key + [#].	Bypasses all faulted zones automatically.
Silence Sounders Burglary:	Enter code. Press OFF key.	Also disarms system. Memory of alarm remains until cleared.
Fire: "Check":	Press OFF key. Press any key.	Memory of Alarm remains until cleared. Determine cause.
Disarm System	Enter code. Press OFF key.	Also silences sounders. Memory of alarm remains until cleared.
Clear Alarm Memory	After disarming, enter code again. Press OFF key again.	Keypad beeps rapidly on entry if alarm has occurred while absent. Alarm display will remain upon disarming until cleared.
Duress (if active and connected to Central Station)	Arm or disarm "normally", but use your 4-digit Duress code to do so.	Performs desired action and sends silent alarm to Central Station.
Panic Alarms (as programmed)	Press key [A], [B], or [C] for at least 2 seconds.	See the <i>Panic Keys</i> section for emergency functions programmed for your system. Note: Keys "A", "B", and "C" may have been programmed for other functions.
Chime Mode	<i>To turn ON or OFF:</i> Enter code. Press CHIME key.	The keypad will sound if doors or windows are violated while system is disarmed and chime mode is ON.
Test Mode	<i>To turn ON:</i> Enter code. Press TEST key. <i>To turn OFF:</i> Enter code. Press OFF key.	Tests alarm sounder and allows sensors to be tested.
Phone Access if applicable	Consult <i>Phone Access User's Guide</i> that accompanies the Phone Module.	Permits system access remotely, via Touch-tone phone.

Fire Alarm System (Continued)

THIS SECTION APPLIES ONLY TO RESIDENTIAL SYSTEMS

Emergency Evacuation



Establish and regularly practice a plan of escape in the event of fire. The following steps are recommended by the National Fire Protection Association:

1. Position your detector or your interior and/or exterior sounders so that they can be heard by all occupants.
2. Determine two means of escape from each room. One path of escape should lead to the door that permits normal exit from the building. The other may be a window, should your path be unpassable. Station an escape ladder at such windows if there is a long drop to the ground.
3. Sketch a floor plan of the building. Show windows, doors, stairs and rooftops that can be used to escape. Indicate escape routes for each room. Keep these routes free from obstruction and post copies of the escape routes in every room.
4. Assure that all bedroom doors are shut while you are asleep. This will prevent deadly smoke from entering while you escape.
5. Try the door. If the door is hot, check your alternate escape route. If the door is cool, open it cautiously. Be prepared to slam the door if smoke or heat rushes in.
6. When smoke is present, crawl on the ground. Do not walk upright, since smoke rises and may overcome you. Clearer air is near the floor.
7. Escape quickly; don't panic.
8. Establish a common meeting place outdoors, away from your house, where everyone can meet and then take steps to contact the authorities and account for those missing. Choose someone to assure that nobody returns to the house — many die going back

Fire Alarm System (Continued)

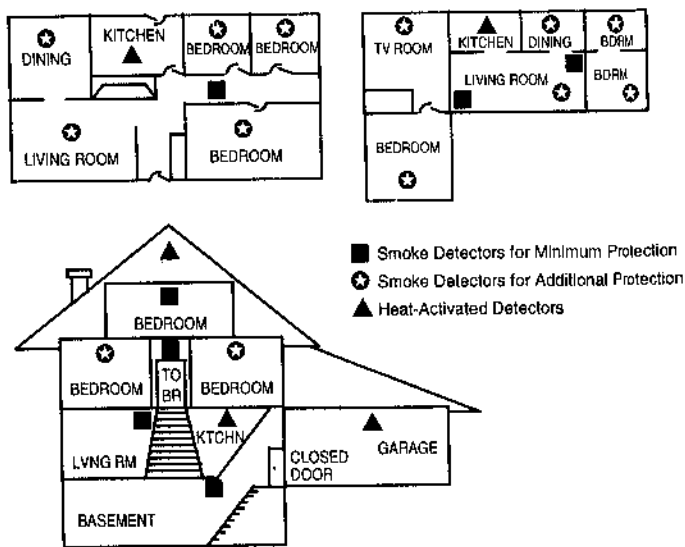
THIS SECTION APPLIES ONLY TO RESIDENTIAL SYSTEMS

National Fire Protection Association Recommendations on Smoke Detectors

With regard to the number and placement of smoke/heat detectors, we subscribe to the recommendations contained in the National Fire Protection Association's National Fire Alarm Code (NFPA 72) noted below.

Early warning fire detection is best achieved by the installation of fire detection equipment in all rooms and areas of the household as follows: A smoke detector installed outside of each separate sleeping area, in the immediate vicinity of the bedrooms and on each additional story of the family living unit, including basements and excluding crawl spaces and unfinished attics.

In addition, the NFPA recommends that you install heat or smoke detectors in the living room, dining room, bedroom(s), kitchen, hallway(s), attic, furnace room, utility and storage rooms, basements and attached garages.



Fire Alarm System (Continued)

THIS SECTION APPLIES ONLY TO RESIDENTIAL SYSTEMS

Manually Initiating a Fire Alarm

1. Should you become aware of a fire emergency before your smoke or heat detectors sense the problem, go to your nearest keypad and manually initiate an alarm by pressing the panic key assigned for FIRE emergency for 2 seconds. If a key pair has been assigned for fire, press both keys at the same time. See the *Using the Panic Keys* section below for further details.
2. Evacuate all occupants from the premises.
3. If flames and/or smoke are present, leave the premises and notify your local Fire Department immediately.
4. If no flames or smoke are apparent, investigate the cause of the alarm. The zone number(s) of the zone(s) in an alarm condition will be displayed at the keypad.

Using the Panic Key(s) Assigned for FIRE Emergency

A key or key pair may have been assigned for manually initiating a FIRE alarm. See the *Panic Keys* section for key assignments. For convenience, indicate the key or key pair assigned for fire below.

Individual Keys

A B C

 Press the individual key assigned for fire for 2 seconds.

OR

Key Pairs

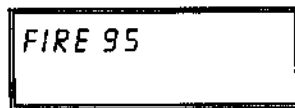
 1 OFF and ***READY**

 ***READY** and **#**

 3 STAY and **#**

Press the key pair assigned for fire at the same time.

DISPLAYS FOLLOWING MANUAL INITIATION OF A FIRE ALARM



ALPHA DISPLAY KEYPAD



FIXED-WORD KEYPAD

Fire Alarm System (If Installed)

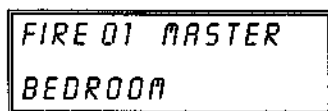
THIS SECTION APPLIES ONLY TO RESIDENTIAL SYSTEMS

General Your fire alarm system (if installed) is on 24 hours a day, for continuous protection. In the event of an emergency, the strategically located smoke and heat detectors will sound their alarms and automatically send signals to your system, triggering a loud, interrupted pulsed sound* from the Keypad(s) and any external sounders. A FIRE message will appear at your Keypad and remain on until you silence the alarm (see below for silencing fire alarms).

* Temporal pulse sounding is produced for Fire alarms, as follows:

3 pulses—pause—3 pulses—pause—3 pulses—pause. . . , repeated.

TYPICAL FIRE EMERGENCY DISPLAYS



ALPHA DISPLAY KEYPAD



FIXED-WORD KEYPAD

Silencing Fire Alarms and Clearing Memory of Alarm

1. You can silence the alarm at any time by pressing the **OFF** key (the security code is not needed to silence fire alarms). To clear the display, enter your code and press the **OFF** key again (to clear Memory of Alarm).
2. If the Keypad's FIRE display does not clear after the second **OFF** sequence, smoke detectors may still be responding to smoke or heat producing objects in their vicinity. Investigate, and should this be the case, eliminate the source of heat or smoke.
3. If this does not remedy the problem, there may still be smoke in the detector. Clear it by fanning the detector for about 30 seconds.
When the problem has been corrected, clear the display by entering your code and pressing the **OFF** key.

Smoke Detector Reset

Depending on the type of smoke detectors in your system, it may be necessary to "reset" the smoke detectors after a fire alarm has been turned off. Check with your installer. This "reset" is accomplished at a keypad, as follows:

Enter User Code*, then press the [1] key (* except "arm only" user).

Maintaining Your System

Taking Care of Your System

The components of your security system are designed to be as maintenance-free as possible. However, to make sure that your system is in reliable working condition, do the following:

1. Test your system weekly.
2. Test your system after any alarm occurs.

Silencing Low Battery Warning Tones at the Keypad

You can silence the keypad's warning tones by pressing the OFF key, but the keypad's low battery message display will remain on as a reminder that you have a low battery condition in one or more of your wireless sensors. When you replace the weak battery with a fresh one, the sensor sends a "good battery" signal to the control as soon as the sensor is activated (opening/closing of door, window, etc.), causing the low battery display to turn off. If the sensor is not activated, the display will automatically clear within approximately 1 hour.

Replacing Batteries in Wireless Sensors

Wireless sensors may not have been used in your security system

IMPORTANT:
Use only batteries recommended by your installer as replacement.

Each wireless sensor in your system has a 9-volt or 3-volt battery. The system detects a low battery in wireless sensors, including smoke detectors, the personal emergency transmitter, and the portable wireless keypad and displays a low battery message*. (A low battery in a portable wireless keypad is detected as soon as one of its keys is pressed, and displayed as **00**.) Battery-operated smoke detectors with a low battery also emit a single "chirp" sound approximately once every 20–30 seconds.

Alkaline batteries provide a minimum of 1 year of operation, and in most units and applications, provide 2–4 years of service. 3-volt lithium batteries provide up to 4 or more years of operation. Actual battery life will depend on the environment in which the sensor is used, the number of signals that the transmitter in the sensor has had to send, and the specific type of sensor. Factors such as humidity, high or low temperatures or large swings in temperature, may all lead to the reduction of actual battery life in an installation.

* The low battery message comes on as a warning that battery replacement in indicated sensor(s) is due within 30 days. In the meantime, a sensor causing a low battery indication is still fully operational.

Routine Care

- Treat the components of your security system as you would any other electrical equipment. Do not slam sensor-protected doors or windows.
- Keep dust from accumulating on the keypad and all protective sensors, particularly on motion sensors and smoke detectors.
- The keypad and sensors should be cleaned carefully with a dry soft cloth. **Do not spray water or any other fluid on the units.**

Trouble Conditions (Continued)

**Other Trouble
Displays
(Continued)**

**AC LOSS
(or NO AC)**

The system is operating on battery power only due to an AC power failure. If only some lights are out on the premises, check circuit breakers and fuses and reset or replace as necessary. If AC power cannot be restored and a "low system battery" message appears (see previous page), **CALL FOR SERVICE.**

**Busy-Standby
(or dI)**

If this message remains displayed for more than 1 minute, system is disabled. **CALL FOR SERVICE.**

**OPEN CIRCUIT
(or OC)**

The keypad is not receiving signals from the control. **CALL FOR SERVICE.**

**Long Rng Trbl
(or bF)**

If part of your system, back-up Long Range Radio communication has failed. **CALL FOR SERVICE.**

**TELCO FAULT
(or CHECK 94)**

The telephone line has a problem. **CALL FOR SERVICE.**

Total Power Failure If there is no keypad display at all, and the **READY** indicator is not lit, operating power (from AC and back-up battery) for the system has stopped and the system is inoperative. **CALL FOR SERVICE.**

In The Event Of Telephone Operational Problems

In the event of telephone operational problems, disconnect the control from the phone line by removing the plug from the phone wall jack. We recommend that your installer demonstrate this disconnection on installation of the system. Do not attempt to disconnect the phone connection inside the control. Doing so will result in the loss of your phone lines. If the regular phones work correctly after the control has been disconnected from the phone wall jack, the control has a problem and you should immediately call for service. If upon disconnection of the control, there is still a problem on the phone line, notify the Telephone Company that they have a problem and request prompt phone repair service. The user may not under any circumstances attempt any service or repairs to the security system. Repairs must be made only by authorized service (see the **LIMITED WARRANTY** statement for information on how to obtain service).

Trouble Conditions (Continued)

Words or letters in parentheses () are those that are displayed on Alpha Display keypads.

Other Trouble Displays

COMM. FAILURE (or **FC**)

Indicates that a failure has occurred in the telephone communication portion of your system.
CALL FOR SERVICE.

SYSTEM LO BAT (or **BAT** with no zone No.)

Indicates that a low system battery condition exists. Display is accompanied by "beeping"* at the keypad. If this condition persists for more than one day (with AC present),
CALL FOR SERVICE.

LO BAT **+ zone descriptor** (or **BAT** with zone No.)

Indicates that there is a low battery condition in the wireless transmitter** number displayed (00 is RF keypad). Accompanied by a single "beep"* (once every 40 seconds) at the keypad. Either replace the battery yourself, or **CALL FOR SERVICE.** If the battery is not replaced within 30 days, a **CHECK** display may occur.

Rcvr Jam (or **CHECK 90**)

Wireless part of the system is experiencing RF interference which may impede reception from wireless sensors.**

MODEM COMM (or **CC**)

Indicates that the control is on-line with the Central Monitoring Station's remote computer. The control will not operate while on-line. Wait a few minutes — the display should disappear.

BELL FAILURE (or **CHECK 70**)

Indicates that the wiring connection to the external sounder is at fault (open or shorted). Accompanied by "beeping" at the keypad. **CALL FOR SERVICE.**

* Any "beeping" that accompanies a trouble display can be stopped by depressing any key on the keypad or by entering an OFF sequence (code + OFF)

** Not all systems use wireless sensors.

Trouble Conditions

"Check" and "Battery" Displays

The word **CHECK** on the keypad's display, accompanied by a "beeping" at the keypad, indicates a trouble condition in the system.

To silence the beeping for these conditions, press any key.

1. **A display of "CHECK" and one or more zone numbers** indicates that a problem exists with the displayed zone(s) and requires your attention. Determine if the zone(s) displayed are intact and make them so if they are not. If the problem has been corrected, the display can be cleared if you enter the OFF sequence (security code plus OFF key) twice. If the display persists, **CALL FOR SERVICE**.

Note: A display of **CHECK 70** on Alpha Display keypads indicates that the wiring connection to the external sounder is at fault (opened or shorted), and you should **CALL FOR SERVICE**. See "BELL FAILURE" on next page. A display of **CHECK 90** indicates that RF interference may be impeding the operation of wireless sensors* in the system. See "Rcvr Jam" on next page.

2. **If there are wireless sensors* in your system**, the **CHECK** condition may also be caused by some change in the environment that prevents the wireless receiver from hearing a particular sensor. **CALL FOR SERVICE** if this occurs.

* Not all systems use wireless sensors.

IF YOU CANNOT CORRECT A "CHECK" DISPLAY, CALL FOR SERVICE.

TYPICAL "CHECK" DISPLAYS



FIXED-WORD DISPLAY KEYPAD



ALPHA DISPLAY KEYPAD

Testing the System (To Be Conducted Weekly)

About Testing the System

The **TEST** key puts your system into the Test mode, which allows each protection point to be checked for proper operation.

- The keypad sounds a single beep every 40 seconds as a reminder that the system is in the Test mode.
- Alarm messages are not sent to your Central Station while Test mode is on.

1. Disarm the system and close all protected windows, doors, etc. The **READY** indicator light should come on if all zones are intact (i.e., all protected windows, doors, etc. are closed).

Alpha Displays:

DISARMED
READY TO ARM

2. + 5 then [0] (walk)
(Security Code) **TEST**

The Dial test (option "1") is intended for the installer and should not be used unless directed to do so by your Security System Representative.

1 = DIAL
Ø = WALK

3. Listen. The external sounder should sound for 1 second and then turn off. If the sounder does not sound, **CALL FOR SERVICE**.

TEST IN
PROGRESS

4. Fault zones. Open each protected door and window in turn and listen for three beeps from the keypad. Identification (zone number or zone description) of each faulted protection point should appear on the display. The display clears when the door or window is closed.
5. Walk in front of any interior motion detectors (if used) and listen for three beeps. The identification of the detector should appear on the display when it is activated. The display clears when no motion is detected.

Note that if wireless motion detectors are used, there is a 3-minute delay between activations. This is to conserve battery life.

6. Test all smoke detectors, following the manufacturer's instructions. The identification of each detector should appear on the display when each is activated. If a problem is experienced with any protection point (no confirming sounds, no display), call for service immediately.
When all protection points have been checked and are intact (closed), there should be no zone identification numbers displayed on the keypad.

7. Exit test mode: + [1]
(Security Code)

If the test mode is inadvertently left active, it automatically turns off after 4 hours.

Event Logging Procedures

About Event Logging

The system records various events in a history log, which can be viewed by the master user using an Alpha Display keypad.

- The Event Log holds up to 100 (FA168C) or 50 (FA148CP) events.
- Events are displayed in chronological order, from most recent to oldest.
- When the log is full, the oldest event is replaced by the logging of any new event.

Viewing the Event Log

1. + [#] + 6 + 0
(Master Code)

Alpha Displays:

```
DISARMED
READY TO ARM
```

2. The system displays the most recent event as follows:
 - event number
 - type of event, identified by its corresponding code (see your installer for the meaning of each code)
 - zone or user number (depending on type of event)
 - partition in which event occurred
 - time and date of the event's occurrence.
3. Pressing [*] displays previous events (back in time).
Pressing [#] displays events forward in time.
4. Exit the event log by pressing any key other than [*] or [#].

```
001 E441 U001 P1
12:34AM 01/02/00
```

Scheduling (continued)

5. For event number "02," enter the access group number. Otherwise, this prompt is skipped.
Press [*] to continue to the "Start" prompt below.
6. For event numbers "03-07," enter the partition number to be armed or disarmed.
0 = arm all; 1 = partition 1; 2 = partition 2;
3 = arm common
Otherwise, this prompt is skipped.
Press [*] to continue to the "Start" prompt.
7. Enter the event's start time and days of week.
Hour = 00-23; minute = 00-59
AM = 0; PM = 1
Days = Position the cursor under the desired days using the [*] key to move forward, then press "1" to select the day.
Press [*] to continue.
8. Enter the event's stop time, AM/PM and days of week.
Refer to step 7 for available entries.
Press [*] to continue.
9. Enter the desired repeat option.
0 = no repeat
1 = repeat schedule weekly
2 = repeat schedule biweekly (every other week)
3 = repeat schedule every third week
4 = repeat schedule every fourth week
e.g., To make a schedule that happens everyday you would select all days with a repeat count of 1. To make a schedule that runs for one week then stops, select everyday with a repeat count of 0.
10. Select the randomize option, if desired.
0 = no; 1 = yes
If selected, the schedule times will vary within 60 minutes of the "hour" time. For example, if a schedule is set to start at 6:15pm, it will do so the first time 6:15pm arrives, but on subsequent days it will start anytime between 6:00 and 6:59 p.m.
Press [*] to continue.

GROUP NUMBER

X

PARTITION

X

START SMTWTFS

HH:MMAM 1000000

STOP SMTWTFS

HH:MMAM 1000000

REPEAT OPTION

0-4 X

RANDOMIZE

0=NO 1=YES X

Scheduling

About Scheduling

The system provides end-user schedules (programmable by master/installer only), which can control various types of events.

- Each schedule causes a defined event to start and stop (when appropriate) at a specified time.
- Schedules can be set to automatically repeat at various intervals.
- Schedules can be set for random starting, if desired.
- FA168C provides up to 16 user schedules; FA148CP provides up to 4 user schedules.

Creating Schedules

1. + [#] + [6] [4]

(Master Code)

Alpha Displays:

1 DISARMED
READY TO ARM

2. Enter a 2-digit schedule number from:
01-16 (FA168C) or 01-04 (FA148CP).

Press [*] to continue.

ENTER SCHED NO.
00=QUIT 00

3. Enter the desired 2-digit event number from the following list.

00 = clear the scheduled event

01 = turn a programmed output on or off

(see **Using Device Commands** section for a list of output device numbers used in your system)

02 = set a user access schedule for one or more users

(see **Security Codes** section for an explanation of access groups)

03 = send a "latch-key" report to a pager if the system is not disarmed by a specified time; message sent is "777-7777."

04 = automatically arm the system in STAY mode at a specified time

05 = automatically arm the system in AWAY mode at a specified time

06 = automatically disarm the system at a specified time

07 = Display the word "REMINDER" at a specified time

Press [*] to continue.

ENTER EVENT

4. For event number "01," enter the output number associated with this schedule.

Otherwise, this prompt is skipped.

Press [*] to continue to the "Start" prompt below.

DEVICE NUMBER
XX

Accessing Other Partitions (Continued)

Common Zone Operation

Ask your installer if a "common zone" was assigned. If so, check this box

Your system may have been set up to use a common zone, which is an area shared by users of both partitions, such as a foyer or lobby. If so, please note the following:

- The common zone will sound and report alarms only when **both** partitions are armed. If only one partition is armed, the system ignores faults on the common zone.
- Either partition may arm its system if the common zone is faulted, but once armed, the other partition **will not** be able to arm unless the common zone is first bypassed or the fault is corrected.
- Faults on the common zone are displayed on common zone keypads, and will also appear on another partition's keypad when that partition is armed.
- Either partition can clear and restore the common zone after an alarm.
- Entry/exit time for the common zone is the same as for partition 1.

Accessing Other Partitions (Continued)

Using the GoTo Command

If the user is authorized, a keypad in one partition can be used to perform system functions in the other partition by using the **GOTO** command.

- You must use an Alpha keypad to access another partition.
- Keypads automatically return to their original partition after 2 minutes with no keypad activity.

1. + [*] + partition number (0,1,2,3)
(Security Code)
0 = return to keypad's original partition.
1 = partition 1; 2 = partition 2; 3 = common zone
The keypad beeps to confirm the partition change.

Alpha Display:




1 DISARMED
READY TO ARM

Fixed-Word Display: Green LED lit

2. The keypad remains in the new partition until directed to go to another partition, or until it automatically returns to the original partition.
The active partition number is displayed in the upper left portion of screen, if the option is programmed.

Alpha Display:



2 DISARMED
READY TO ARM

Fixed-Word Display: Green LED lit

Multi-Partition Arming

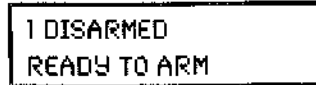
Some users can be given Multi-Partition arming ability by being assigned to both partitions when programming user attributes.

When attempting to arm multi-partitions:

- You must use an Alpha keypad.
- The system arms only if all partitions are "ready to arm."
- If any partition is "not ready," the system does not arm at all.
- You can use the GOTO command to bypass open zones before arming.
- If any partition is already armed when global arming is attempted, that partition remains in its existing armed state.

- + [0] + arm command (see list below)
(Security Code)

Alpha Display:



1 DISARMED
READY TO ARM

Fixed-Word Display: Green LED lit

Multi-Partition Arming Commands

- 2 = arms all partitions AWAY
- 3 = arms all partitions STAY
- 33 = arms all partitions NIGHT-STAY
- 4 = arms all partitions MAXIMUM
- 7 = arms all partitions INSTANT
- 1 = disarms all partitions

Accessing Other Partitions (FA168C) (GOTO Command and Multi-Partition Arming)

About Accessing Partitions

Each keypad is assigned a default partition for display purposes, and will show only that partition's information.

- If the user is authorized, a keypad in one partition can be used to perform system functions in the other partition by using the **GOTO** command. Refer to the GOTO section.
- If the user is authorized, that user can arm other partitions. Refer to the Multi-Partition Arming section.

The following table shows the relationship of the keypads in each partition when system is armed and disarmed.

	PARTITION 1		PARTITION 2		COMMON ZONE (LOBBY, etc.)	
	Arming State	Keypad Status	Arming State	Keypad Status	Arming State	Keypad Status
Condition 1 ⇒	Disarmed	Partition 1 Only	Disarmed	Partition 2 Only	Disarmed	Common Zone Only
Condition 2 ⇒	Disarmed	Partition 1 and Common Zone	Armed	Partition 2 Only	Disarmed	Common Zone Only
Condition 3 ⇒	Armed	Partition 1 Only	Disarmed	Partition 2 and Common Zone	Disarmed	Common Zone Only
Condition 4 ⇒	Armed	Partition 1 Only	Armed	Partition 2 Only	Armed	Common Zone Only

When both partitions are disarmed, the keypad in each partition displays zone status for its partition only. The common zone keypad shows the status in that zone only. See Condition 1 above.

When partition 1 is disarmed and partition 2 is armed, the keypad in partition 1 shows the status of partition 1 **and** the common zone. Partition 2 will display the status of partition 2 **only**. See Condition 2 above.

When partition 1 is armed and partition 2 is disarmed, the keypad in partition 1 shows the status of partition 1 **only**. Partition 2 will display the status of partition 2 **and** the common zone. See Condition 3 above.

As long as any one of the two partitions is disarmed, the common zone will always be disarmed. The common zone will be armed only when both partition 1 and 2 are armed. See Condition 4 above.

Security Codes & Authority Levels (Cont.)

How to Assign User Codes and Attributes

The following lists the various command strings for adding user codes and attributes.

Refer to the User Setup chart at the back of this manual for factory assignments of user attributes and to keep a record of user programming.

NOTE: Partition Master codes (FA168C only) apply only to those user numbers previously assigned (by the system master/installer) to the partition master's partition.

Add User Code:

(Users 03/33 are preset to partition programmers, but can be changed.)

System/Partition Master code + [8] + user no. + new user's code

User 01 = installer User 03 = partition 1 master
User 02 = master User 33 = partition 2 master
The Keypad beeps once to confirm that new user was added.

Delete User Code:

System/Partition Master code + [8] + [user no.] + [#] [0]

The user code and all attributes* programmed for this user number, including any associated RF keys, are erased from the system.
(*except assigned partition)

Authority Level:

Factory Assignments:
users 04-32/34-49 = 0
users 03/33 = 4

System/Partition Master code + [8] + [user no.] + [#] [1] + auth. level

Authority Levels (see definitions on previous page):
0 = standard user 3 = duress
1 = arm only 4 = partition master (FA168C only)
2 = guest

Access Group:

Factory Assignments: none

System/Partition Master Code + [8] + [user no.] + [#] [2] + group (1-8)

You can assign users to a group, then set an access schedule that defines the times this group of users can operate the system. The system ignores these users outside the scheduled times.

User's Partition:

(FA168C only)

Factory Assignments:
Part. 1 = users 03-32
Part. 2 = users 33-49

System Master Code + [8] + [user no.] + [#] [3] + [0] + partition(s) + [#]

This command assigns the partitions the user can access. If more than one, enter partition numbers sequentially, then press [#] to end. E.g., master code + [8] + [user no.] + [#] [3] + [0] + [1] [2] + [#] gives the user access to partitions 1 and 2 and the common partition.
Partition Entries: 1 = partition 1 and common
2 = partition 2 and common
3 = common partition only

RF User Number:

Factory Assignments: none

Master/Part. Prog. Code + [8] + [user no.] + [#] [4] + zone no.

Use this command to assign a wireless button device (keyfob) to this user (keyfob must be enrolled in system first; see installer).
Zone number: enter the zone number assigned to a button on the keyfob that will be used for arming/disarming by this user.

Pager On/Off:

Factory Assignments:
users 01-04 = 0 (off)
users 05-49 = 1 (on)

Master/Part. Prog. Code + [8] + [user no.] + [#] [5] + 0 or 1

You can program a user so that a message is sent to a pager whenever this code is used to arm or disarm the system.
Paging On/Off: 1 = allow paging; 0 = no paging for this user

Security Codes & Authority Levels

About Security Codes

Your installer assigned a master code that is used to perform all system functions. In addition, you can assign different security codes for use by other users (FA168C provides 46 additional codes; FA148CP provides 30 additional codes).

- Only the System Master and Partition Master can assign user codes to users.
- Users are identified by 2-digit user numbers and are pre-assigned to either partition 1 or partition 2 (FA168C).
- Only the Installer or System Master can change user partitions.
- In addition to a security code, each user is assigned various system attributes.
- User codes can be used interchangeably within a partition when performing system functions (a system armed with one user's code can be disarmed by another user's code), with the exception of the guest code described below.
- User code programming involves these steps:
 1. Choose a user number from the set of users assigned to the partition in which the user will be operating, and assign a 4-digit security code.
 2. Assign an authority level to that user.
 3. Assign other attributes as necessary (see attributes on the next page).

NOTE: The factory settings are designed to meet most normal user situations. Therefore, the only step you usually need to do when adding users is assign a user number (from the partition's pre-assigned user numbers) and a security code.

Authority Level Definitions

Authority levels define the system functions a particular user can/cannot perform.

Level	Title	Explanation
N/A	System Master	Reserved for user 02; Can perform all system functions and assign codes in both partitions; can change its own code as follows: Master code + [8] + 02 + new master code + new master code again
0	Standard User	Can only perform security functions in assigned partition. Cannot perform other system functions.
1	Arm Only	Can only arm the system. Cannot disarm or do other functions.
2	Guest	Can arm the system in assigned partitions, but cannot disarm the system unless the system was armed with this code. This code is typically assigned to someone (e.g., babysitter or cleaner) who has a need to arm/disarm the system only at certain times. The user of this code should not use the "Quick Arming" feature.
3	Duress Code	Intended for use when you are forced to disarm or arm the system under threat. When used, the system will act normally, but can silently notify the Central Monitoring Station of your situation, if that service has been provided.
4	Partition Master	(FA168C) Can do everything a standard user can do, and can assign user codes to users in their partition.

Paging Feature

Manual Paging

Your system may be set up so you can manually send a message to up to four (FA168C) or two (FA148CP) pagers.

- Your installer programs the paging function key and the pager phone numbers.
- Pressing the paging keys sends the message **999-9999** to the selected pager.
- This message could mean “call home”, “call your office”, or any other prearranged meaning.
- See the Paging chart at the back of this manual for details of the paging setup for your system.

1. Hold **pager key** 2 seconds then press pager no. (1-4).

Press and hold the programmed Paging Key for at least 2 seconds (wait for beep), then press the pager number* representing the pager intended to receive the message.

2. The recipient, on seeing the 999-9999 message, will understand the prearranged meaning of this signal.

* If no number is pressed, the message is sent to pager 1.

Alpha Display:

DISARMED
READY TO ARM

English Display: READY

999-9999

Pager Display

Latch Key Paging

You can program a schedule that causes a pager report to be sent if the system is not DISARMED by the scheduled time (see **Scheduling** section, event “03”). For example, a working parent might want a message to be sent to a pager if their child did not arrive home from school and disarm the system by a certain time.

If programmed, the message that is sent is: **777-7777**.

Paging Feature

About Automatic Paging

Your system may be set up to automatically send alert messages to several pagers (up to four for FA168C, up to two for FA148CP) as certain conditions occur in your system.

- The following events can be programmed by your installer to be sent to the pagers: arming and disarming†, alarms, and trouble conditions. († reports when arming/disarming from a keypad using a security code; auto-arming/disarming, arming with assigned button, and keyswitch arming do not send pager messages.)
- You can also program the system to send an automatic pager message to alert you in the event that someone has not arrived home (disarmed the system) within a defined period of time (see the **Scheduling** section for details on programming a "latch key report").
- Your installer programs the pager phone numbers and reporting events.
- The pager message consists of a 7-digit system status code that indicates the type of condition that has occurred.
- An optional, predefined 16-digit character string can precede the 7-digit system status code; these characters can consist of a PIN no., subscriber account no., or any additional data that you may wish to have sent to the pager.
- The pager display format is as follows:

3-digit Event Code

↓

Optional 16 digits → **AAAAAAAAAAAAAAAA** – **BBB** – **CCCC** ← 4-digit User or Zone No.

A =	B =	C =
Optional 16-digits for Account numbers, PIN numbers, or any other data; programmed by the installer, if required.	A 3-digit code that describes the event that has occurred in your system (see for event codes table below)	A 4-digit User or Zone number, depending on the type of event that has occurred, where: <ul style="list-style-type: none"> • alarms and troubles display zone number • arming/disarming (opens/closes) display user number The first 2 digits are always "00" (e.g., 0004 represents zone or user number 4), and, single-digit user or zone numbers are always preceded by a zero.

The 3-digit Event Codes (BBB) that can be displayed are:

911 =	811 =	101 =	102 =
Alarms. The 4-digit number (CCCC) following this code is the <i>zone number</i> that has caused the alarm.	Troubles. The 4-digit number (CCCC) following this code is the <i>zone number</i> that has caused the trouble.	Open (system disarmed). The 4-digit number (CCCC) that follows this code is the <i>user number</i> that has disarmed the system.	Close (system armed). The 4-digit number (CCCC) that follows this code is the <i>user number</i> that has armed the system.

Examples of typical 7-digit pager displays follow.

Ex. 1. 911-0004 = Reporting of an alarm (911) caused by a fault on zone 4 (0004).

Ex. 2. 102-0005 = Reporting of a closing-system arming (102)– by user 5 (0005).

Using Device Commands

About Device Commands

Your system may be set up so that it can control certain lights or other devices.

- Some devices may be automatically turned on or off by the system.
- You may be able to override automatically controlled devices using the commands described below.
- Some devices can be manually turned on or off using the commands described below.
- See your installer for a list of devices that may be set up for your system. A list of these devices is provided at the back of this manual for you to fill out.

To Activate Devices:

+ [#] + [7] + 2-digit device number
(Security Code)

Devices associated with that device number activate.

To Deactivate Devices:

+ [#] + [8] + 2-digit device number
(Security Code)

Devices associated with that device number deactivate.

Alpha Display:

DISARMED READY TO ARM

Fixed-Word Display: READY

Macro Key Programming & Usage (cont.)

The keypad beep to acknowledge your input and displays the command you entered (followed by "F").

4. Enter the next command, followed by press/holding the "D" key for at least two seconds. The keypad beeps and displays the keystrokes entered so far.
5. Repeat until all the desired commands (up to 16 characters including the "F"s) have been entered. Be sure to check your keystrokes before continuing. If you made a mistake, you must start over.
6. To exit, press/hold the "D" key for at least two seconds. The display returns to system status and indicates system is ready.

Typical Macro Alpha Display:

```
MACRO PGM
60203F#701F2F
```

Example of Macro Programming

Suppose you want to (1) bypass the two upstairs window zones, then (2) turn on an exterior light, and then (3) arm the security system in the AWAY mode. The procedures in the table that follows show you how you would program this macro:

Function	Keystrokes Required	Keypad Display
1. Bypass zones 02 & 03	Press BYPASS [6] key, then 2-digit zone numbers 02 & 03.	60203
2. Insert terminator.	Press the "D" key for at least 2 seconds.	60203F
3. Turn light on (device 01).	Press [#] and 7 keys for "device ON", and [01] key for selecting device 1.	60203F#701
4. Insert terminator.	Press the "D" key for at least 2 seconds.	60203F#701F
5. Arm system AWAY	Press AWAY [2] key.	60203F#701F2
6. Insert terminator.	Press the "D" key for at least 2 seconds.	60203F#701F2F

Using a Programmed Macro Key

System must be disarmed before performing a macro function.

```
DISARMED
READY TO ARM
```

```
ENTER USER CODE
* * * *
```

1. Press the Macro key programmed for the desired series of commands for at least 2 seconds. The "Enter User Code" prompt appears. The prompt remains displayed for up to 10 seconds.
2. Enter your 4-digit user code. The programmed macro sequence begins automatically after the user code is entered.

Macro Key Programming & Usage

About Macro Keys

The "A", "B", "C" or "D" keys can be used to automatically activate a series of commands of up to 16 keystrokes, if programmed for this function. These keystrokes, as a group, are called "macros" and are stored in the system's memory.

- Typical macro functions can include:
 - Arming sequences: STAY, Night-STAY, INSTANT, or AWAY
 - Bypassing particular zone(s)
 - Activating relay(s) for turning on (or off) lights, fans, etc.
- Up to four (FA168C) or two (FA148CP) macros can be assigned – but no more than one macro to a key.
- Macros can be activated only by users with authority levels authorized to perform the macro's function.
- Macros function only when the system is disarmed.

NOTE: The installer must activate the desired function key before macros can be assigned. See the chart at the back of this manual for the key(s) assigned for macros.

1. + [#] + [6] + [6]

(Security Code)

Alpha Displays:

DISARMED
READY TO ARM

2. Enter the macro number (1-4 for FA168C; 1-2 for FA148CP) to be programmed at the "Select Macro?" prompt. Remember, only one macro can be assigned to each key.

SELECT MACRO
1-4 0

3. If a macro has been previously defined, the keystrokes are shown on the bottom line of the display, otherwise the display is blank.

MACRO DISPLAY

To exit this mode (and keep the existing macro definition), press any key except the [*] key. The system returns to normal mode.

To define a macro for the selected key, press [*] and continue with the next prompt.

Enter the first of the series of desired commands, (do not include your user code), then press/hold the "D" key for at least two seconds to complete the first command. This key terminates each command, and appears as an "F" in the keypad display.

MACRO PGM

Panic Keys

Using Panic Keys

Your system may have been programmed to use special keys to manually activate emergency (panic) functions as follows:

This Function	Sends this signal*	With This Sounding...
Silent Alarm	silent alarm	no audible alarm or any visual display indicating that a silent alarm has been initiated.
Audible Alarm	audible alarm	a loud, steady alarm at keypad(s) and at any external sounders that may be connected.
Personal Alarm	auxiliary alarm	steady alarm sound at keypad(s), but not at external bells or sirens.
Fire Alarm	fire alarm	temporal (pulsing) sound at external bells and sirens.

*All panic functions send signals to the Central Monitoring Station, if connected.

To active a Panic Function:

Press and hold down for at least 2 seconds whichever lettered key on the keypad has been programmed for the desired emergency function.

OR

Press both keys of the assigned key pair at the same time.

Alpha Display:

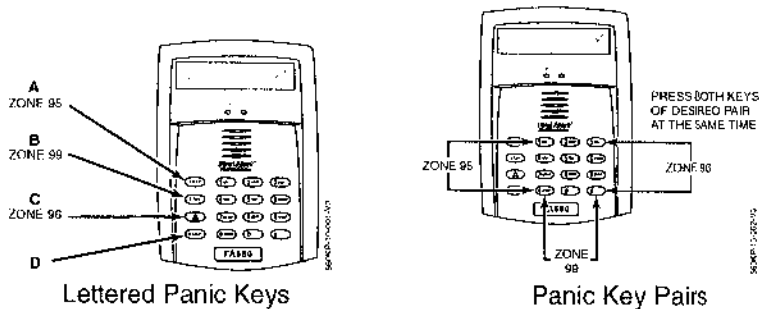
DISARMED
READY TO ARM

Fixed-Word Display: READY

Typical Panic Alpha Display:

ALARM 99

Fixed-Word Display: 99 and ALARM



See your installer and use the chart provided in the **Features Programmed in Your System** section to note the functions that have been programmed for your system.

Viewing Current Date and Time

Viewing the Current Date and Time

The system lets you view its time and date setting on alpha keypad.

+[#] + [6] [3]

(Security Code)

OR, press the function key (A, B, C, or D) for viewing current date and time, if programmed.

A typical time/date display is shown.

The display will remain on for about 30 seconds.

Alpha Display:

```
DISARMED
READY TO ARM
```

```
TIME/DATE  SAT
12:05AM 05/09/00
```

“A” “B” “C” “D”

If one of the above keys has been programmed for the date/time display feature, place a check mark in the box beneath that key.

Setting the Date and Time

You can set the time and date by doing the following:

1. +[#] + [6] [3]

(Security Code)

2. Press [*] when the time/date is displayed.

A cursor appears under the first digit of the hour.

To move cursor ahead, press []. To go back, press [#].*

- Enter the 2-digit hour setting.
- Enter the 2-digit minute setting.
- Press [1] for PM or [2] for AM.
- Enter the last two digits of the current year.
- Enter the 2-digit month setting.
- Enter the 2-digit day setting.

3. To exit, press [*] when cursor is at the last digit, or wait 10 seconds.

Alpha Display:

```
DISARMED
READY TO ARM
```

```
TIME/DATE  SAT
04:04PM 10/17/00
```

Current time display

```
TIME/DATE  SAT
04:04P2000/10/17
```

Time/date editing display

Bypassing Protection Zones

Quick Bypass

If programmed, "Quick Bypass" allows you to easily bypass all open (faulted) zones without having to enter zone numbers individually. This feature is useful if, for example, you routinely leave certain windows open when arming at night.

1. + 6 + [#]

(Security Code) **BYPASS**

In a few moments, all open zones will be displayed and automatically bypassed. Make sure that only those zones that you wish to leave unprotected are bypassed, and that there are no other zones unintentionally left open.

2. Wait for all bypassed zones to be displayed, then arm the system as desired.

Ask your installer if "Quick Bypass" is active for your system, and if so, check here:

Alpha Display:

DISARMED - PRESS
* TO SHOW FAULTS

Fixed-Word Display: NOT READY

Alpha Display:

DISARMED BYPASS
READY TO ARM

Fixed-Word Display: BYPASS

Chime Mode

CHIME mode alerts you to the opening of a perimeter door or window while the system is disarmed.

When Chime mode is activated:

- Three tones sound at the keypad whenever a perimeter door or window is opened.
- Interior zones do not produce a tone when they are faulted.
- Pressing the **READY** key will display the open protection points.
- Chime mode can be used only while the system is disarmed.

To turn Chime Mode on:

+ 9

(Security Code) **CHIME**

The CHIME message will appear. Perimeter zones will cause a tone when faulted.

To turn Chime Mode off:

+ 9 again

(Security Code) **CHIME**

The CHIME message will disappear.

Alpha Display:

DISARMED
READY TO ARM

Fixed-Word Display: READY

Alpha Display:

DISARMED CHIME
READY TO ARM

Fixed-Word Display: CHIME

Bypassing Protection Zones

Using the BYPASS Key

Use this key when you want to arm your system with one or more zones intentionally unprotected.

Vent Zones: Your system may have certain windows set as "vent" zones, which are automatically bypassed if left open when arming the system (you do not need to manually bypass them). However, if a vent zone window is closed **after** arming, it becomes protected and will cause an alarm if opened again while the system is armed.

When bypassing zones:

- The system must be disarmed before you can bypass zones.
- Bypassed zones are unprotected and will not cause an alarm if violated.
- The system will not allow fire zones to be bypassed.
- Zones are automatically unbypassed when the system is disarmed.

1. + 6 + zone numbers (see below)

(Security Code) **BYPASS**

Enter the 2-digit zone number(s) for the zone(s) to be bypassed (e.g., 06, 10, 13, etc.). Single digit zone numbers must be preceded by a zero (e.g. 05, 06).

2. When finished, the keypad will momentarily display a "Bypass" message for each bypassed zone number. Wait for all bypassed zones to be displayed.

Arm the system as usual. When armed, the arming message is displayed with "ZONE BYPASSED."

To display bypassed zones prior to arming, enter your security code and press the [6] BYPASS key.

Alpha Display:

DISARMED - PRESS
* TO SHOW FAULTS

Fixed-Word Display: NOT READY

Alpha Display:

DISARMED BYPASS
READY TO ARM

Fixed-Word Display: BYPASS

ARMED: STAY
ZONE BYPASSED

Typical armed alpha display after bypassing zones.

Disarming and Silencing Alarms

Using the [OFF] key

The **OFF** key is used to disarm the system, silence alarm and trouble sounds, and clear alarm memories.

IMPORTANT: If you return and the main burglary sounder is on, DO NOT ENTER, but CONTACT THE POLICE from a nearby safe location.

If you return after an alarm has occurred and the main sounder has shut itself off, the keypad will beep rapidly upon your entering, indicating that an alarm has occurred during your absence.

LEAVE AT ONCE, and CONTACT THE POLICE from a nearby safe location.

1. +

(Security Code) **OFF**

The "READY" indicator light will be lit if all zones are secure, and the keypad will emit a single tone to confirm that the system is disarmed.

Alpha Display:

DISARMED
READY TO ARM

Fixed-Word Display: **READY**

2. To Silence a Burglary Alarm and Clear a Memory of Alarm

Enter your **security code** and press the **OFF** key to silence the alarm (or warning tones of a Memory of Alarm).

Note the zone in alarm on the keypad display, and make that zone intact (close door, window, etc.). Now enter the security code plus **OFF** sequence *again* to clear the keypad's **Memory of Alarm** display.

3. To Silence a Fire Alarm and Clear Memory of Alarm

Simply press the **OFF** key to silence the alarm. Then enter the **security code** plus **OFF** sequence to clear the keypad's **Memory of Alarm** display. See the *Fire Alarm System* section.

Using the Keyswitch

Using the Keyswitch

Your system may be equipped with a keyswitch for use when arming and disarming. Red and green lights on the keyswitch plate indicate the status of your system as follows:

Green Light: Lights when the system is **disarmed and ready** to be armed (no open zones). If the system is disarmed and the green light is off, it indicates the system is not ready (one or more zones are open).

Red Light: Lights or flashes when system is armed in AWAY or STAY mode. See your installer for the meanings of the lit red light:

- Lit Steady = system armed AWAY or
system armed STAY and exit delay has expired
- Flashing = system armed STAY and exit delay timer active
- Rapid flashing = an alarm has occurred (memory of alarm).

Before arming, close all perimeter doors and windows.

To arm in the AWAY mode:

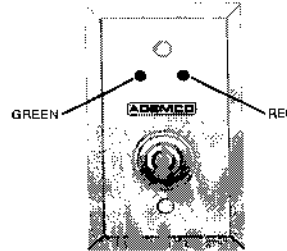
Turn the key to the right for 1/2 second and release. Keypads beep twice and the red indicator lights or flashes.

To arm in the STAY mode:

Turn the key to the right and hold for longer than 1 second, then release. Keypads beep three times and the red indicator lights or flashes.

To disarm the system:

Turn the key to the right and release. The red light turns off



Arming the System

Single Button Arming

The "A", "B", "C", and/or "D" keys on your keypad may have been programmed for single-button arming. Note that while it will not be necessary to use a security code for arming, a security code must always be used to disarm the system.

If Single-Button Arming is programmed:

- A function key has been assigned to a specific type of arming: STAY mode, Night-STAY mode, AWAY mode, or STEP-ARMING (see Step-Arming paragraph).
- You DO NOT need to enter your user code before pressing the function key (you always need your user code to DISARM the system).

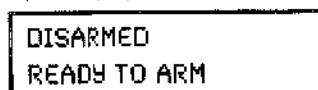
Before arming, close all perimeter doors and windows.

1. Press and hold the assigned function key for 2 seconds (no code is required). Function keys are shown below.



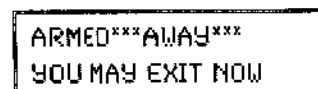
2. The keypad begins beeping and displays the armed message. The red ARMED indicator also lights.

Alpha Display:



Fixed-Word Display: READY

Alpha Display:



Fixed-Word Display: AWAY

Step Arming Feature

Single-Button "Step" arming may have been programmed into one of the lettered keys (A, B, C, or D). Check with your installer to see if this has been done in your system.

If Step-Arming is programmed:

- The assigned key provides a choice of three levels of security.
- The selected key can be pressed once, twice, or three times, increasing the level of security with each press, as follows

Key	First Press	Second Press	Third Press
↓	↓	↓	↓
A, B, C, D	Armed-STAY	Armed Night-STAY (if programmed)	Armed-AWAY

Arming the System

Arming Commands

Before arming, close all perimeter doors and windows and make sure the Ready to Arm message is displayed.

Mode	Press these keys...	Keypad Confirms By...
Stay	security code + [3] (STAY)	<ul style="list-style-type: none">• three beeps• armed STAY message displayed• red ARMED indicator lights
Night-Stay	security code + [3] + [3]	<ul style="list-style-type: none">• three beeps• NIGHT-STAY message displayed• red ARMED indicator lights
Instant	security code + [7] (INSTANT)	<ul style="list-style-type: none">• three beeps• armed STAY message displayed• red ARMED indicator lights Note that entry delay is turned off.
Away	security code + [2] (AWAY)	<ul style="list-style-type: none">• two beeps, or, if programmed, beeping for duration of exit delay• armed AWAY message displayed• red ARMED indicator lights Leave the premises through an entry/exit door during the exit delay period to avoid causing an alarm. The keypad beeps rapidly during the last 5 seconds of the exit delay to warn you that it is ending.
Maximum	security code + [4] (MAXIMUM)	<ul style="list-style-type: none">• same as Away (described above) Note that entry delay is turned off.

Quick Arming

If "Quick Arming" was programmed by the installer, the [#] key can be pressed in place of the security code when arming the system. However, **the security code must always be used to disarm the system.**

Function Key Arming

For any arming command, a function key may have also been programmed for your system. If so, you can press and hold the appropriate function key for 2 seconds to arm the system. See your installer for the designated functions (see *Single Button Arming* section).

Refer to the *Accessing Other Partitions* section for information on multi-partition arming (FA168C).

Arming the System

Stay Mode: Arms Perimeter Only, Entry Delay On

- Used when you want to arm the system with persons staying inside (or if you have pets that are moving throughout the premises).
- The perimeter sensors are armed, but interior sensors are left disarmed.
- Exit delay begins (you can leave through the entry/exit door, if desired).
- An alarm sounds if any protected window or non-entry/exit door is opened.
- You may otherwise move freely within the premises.
- Persons entering later can enter through an entry/exit door, but they must disarm the system within the *entry* delay period to avoid sounding an alarm.

Night-Stay Mode: Arms Perimeter Only, Plus Selected Zones

- Use Night-Stay mode to provide increased security while staying inside.
- Arms same as Stay mode, but also arms pre-selected interior sensors (programmed by your installer), while other interior sensors are left disarmed.
- Persons entering later can use an entry/exit door **but** must not violate any of the programmed interior zones to avoid sounding an alarm.
- **IMPORTANT:** When Night-Stay mode is on, the selected interior zones are armed and cause an alarm if anyone enters those areas (e.g., waking in the middle of the night). To avoid sounding an alarm, you must disarm the system before any activity takes place in those interior zones.

Instant Mode: Arms Perimeter Only, Entry Delay Off

- Used when staying inside and do not expect anyone to use an entry/exit door.
- Arms same as Stay mode.
- An alarm sounds immediately if any protected perimeter window or any door is opened, including entry/exit doors.
- **IMPORTANT:** Arming in this mode greatly increases the chance of false alarms. Use extreme care in selecting this mode of arming.

Away Mode: Arms Entire System, Entry Delay On

- Used when nobody will be staying inside (including pets).
- The entire system (interior and perimeter) is armed.
- Exit delay begins letting you leave through the entry/exit door.
- An alarm sounds if a protected window or any door is opened, or if any movement is detected inside your premises.
- You can reenter through an entry/exit door, but you must disarm the system within the *entry* delay period to avoid sounding an alarm.

Maximum Mode: Arms Entire System, Entry Delay Off

- Used when leaving the premises for extended periods (e.g., vacation).
- Arms same as Away mode, but entry delay is off.
- An alarm sounds same as Away mode, and sounds upon opening entry/exit doors.

Entry/Exit Delays (Continued)

Exit Alarms

Whenever you arm the system, the exit delay begins. If an entry/exit door or interior zone is faulted when the exit delay ends (e.g., exit door left open), the system sounds an alarm and starts the entry delay timer. If you disarm the system before the entry delay ends, the alarm sound stops and the message "CANCELED ALARM" or "CA" is displayed on the keypad, along with a zone number indicating the faulted zone. No message is sent to the Central Monitoring Station.

To clear the exit alarm condition, the open zone must be made intact; to clear the display, enter your code plus OFF.

If you do not disarm the system before the entry delay ends, and an entry/exit door or interior zone is still open, the alarm sound continues and an "exit alarm" message is sent to the Central Monitoring Station. The message "'EXIT ALARM" or "EA" is displayed on the keypad, along with a zone number indicating the faulted zone. To stop the alarm, the system must be disarmed (your code plus OFF); to clear the display, enter your code plus OFF a second time.

An "exit alarm" also results if an entry/exit door or interior zone is faulted within two minutes after the end of the exit delay.

Your system may have been programmed for this feature to minimize false alarms sent to the Central Monitoring Station. Ask your installer if "Exit Alarm" is active in your system. If so, check this box.

Checking For Open Zones

Using the [*] Key

Before arming your system, all protected doors, windows and other protection zones must be closed or bypassed, otherwise the keypad will display a "Not Ready" message.

Use the READY key to display all faulted zones, making it easier for you to identify and secure any open zone.

1. Press [*] (do not enter code first) to display faulted zones.
2. Secure or bypass the zones displayed.
3. The keypad's READY indicator lights when all protection zones have been either closed or bypassed.
4. Arm the system as desired.

Alpha Display:

DISARMED - PRESS *
TO SHOW FAULTS

Fixed-Word Display:

Zone no. and "NOT READY"

Entry/Exit Delays

Your system has preset time delays, known as exit delay and entry delay.

Exit Delay

Exit delay gives you time to leave through the designated exit door without setting off an alarm. Exit delay begins immediately after arming your system in any arming mode and Alpha Display keypads display the message "You May Exit Now." When "You may exit now" disappears, the system is fully armed. If programmed, a slow beeping will sound during the exit delay period until the last 5 seconds, which then changes to fast beeping (alerting you to the end of exit delay). If you cannot leave by this time, you should stop, disarm the system, and start over to avoid a false alarm.

Exit Delay Restart. If you wish to open the entry/exit door to let someone in after arming STAY, you can re-start the *exit* delay at any time – **simply press the [*] key**, then let that person in. The system automatically re-arms when exit delay expires, which avoids having to disarm the system and then re-arm it again. In addition, when the system is armed AWAY, re-entering the premises (e.g., forgot a wallet) through the entry/exit door before exit delay time expires will reset the exit delay time.

Entry Delay

Entry Delays give you time to disarm the system when you re-enter through the designated entrance door. You must disarm the system before the entry delay period ends, or an alarm will occur. The keypad beeps during the entry delay period, reminding you to disarm the system. There are two entry delays (if programmed). The first is for your primary entrance and the second can be used for a secondary entrance, where a longer delay is required to walk to the keypad to disarm the system.

You can also arm the system with no entry delay at all by using the INSTANT or MAXIMUM arming mode. This mode provides greater security while on the premises or while away for extended periods of time.

See your installer for your delay times.

Partition 1 _____

Exit Delay: seconds

Entry Delay 1: seconds

Entry Delay 2: seconds

NOTE: Entry/Exit times set for partition 1 also apply to the common zone (FA168C).

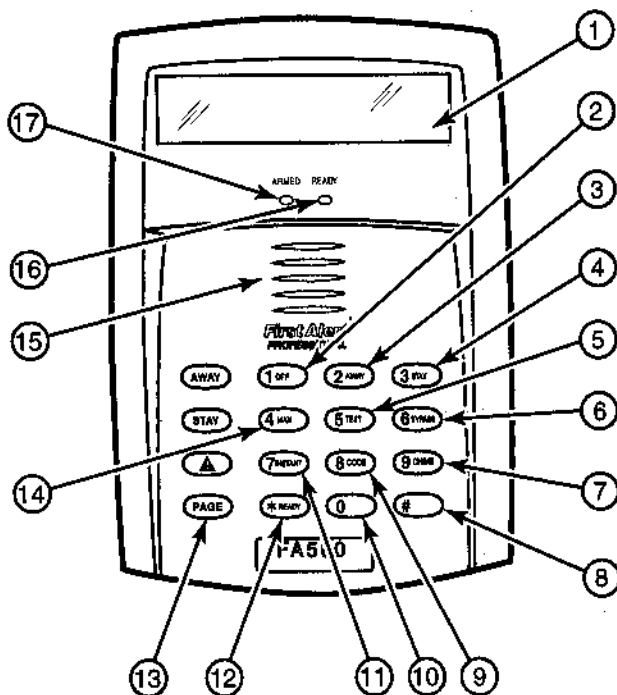
Partition 2 (FA168C) _____

Exit Delay: seconds

Entry Delay 1: seconds

Entry Delay 2: seconds

Functions of the Keypads (Continued)



FA168C-001-V0

(Keypads shown with typical function key labels)

IMPORTANT!

- When entering codes and commands, sequential key depressions must be made within 4-5 seconds of one another. If 4-5 seconds elapse without a key depression, the entry will be aborted and must be repeated from its beginning. Be sure to observe this precaution when performing any of the procedures in this manual.
- If you make a mistake while entering a security code, stop, press the [*] key, and then start over. If you stop in the middle while entering a code, and then immediately start the entry over, an erroneous code might be entered.

Functions of the Keypads

1. DISPLAY WINDOW.

Alpha Display Keypads: 2-line, 32-character Liquid Crystal Display (LCD) keypads that display protection point identification, system status, and messages.

Fixed-Word Display Keypads: Display protection zone ID and system status messages using pre-designated words in the LCD display.

2. **1 OFF** Disarms burglary portion of the system, silences alarms and audible trouble indicators, and clears visual display after problem's correction.
3. **2 AWAY** Arms the entire burglary system, perimeter and interior.
4. **3 STAY** Arms perimeter portion of burglary system only. Interior protection is not armed, allowing movement within premises without causing an alarm.
5. **5 TEST** Tests the system and alarm sounder if disarmed. Refer to *Testing The System* section for test procedures.
6. **6 BYPASS** Removes individual protection zones from being monitored by the system.
7. **9 CHIME** Turns CHIME mode on and off. When on, the opening of windows or doors while the system is disarmed will sound 3 beeps at the keypad(s).
8. **#** This key can be used for "Quick Arming" of the system without use of a security code (if programmed).
9. **8 CODE** Used to assign additional user codes for other users of the system.
10. **KEYS 0-9:** Used to enter your security code(s) and to perform their associated system functions after the security code has been entered.
11. **7 INSTANT** Arms in manner similar to the STAY mode, but without the entry delay feature. Entering via an entry/exit door will cause an alarm.
12. *** READY** Used to display all open protection zones.
13. **FUNCTION KEYS:** Keys A, B, C, D may have been programmed for a variety of functions, including panic (emergency) functions. For details, see the *Function Keys* section.
14. **4 MAXIMUM** Arms the entire burglary system, perimeter and interior, but without entry delay feature. Entering via an entry/exit door will cause an alarm.
15. **INTERNAL SOUNDER:** The built-in sounder mimics the alarm sounder during alarms, and will also "beep" during certain system functions.
16. **READY INDICATOR: (GREEN)** Lit when the system is ready to be armed (no faults present). While the system is disarmed, this indicator will go on and off as protection zones are closed and opened.
17. **ARMED INDICATOR: (RED)** Lit when the system has been armed.

About The Keypads (Continued)

Fixed-Word Display Keypad

- AWAY:** All burglary zones, interior and perimeter, are armed.
- STAY:** Perimeter burglary zones, such as protected windows and doors, are armed.
- INSTANT:** Entry delay is turned off:
Lit with STAY = Instant mode
Lit with AWAY = Maximum mode
- BYPASS:** This appears when one or more burglary protection zones have been bypassed.
- NOT READY:** Appears when burglary portion of the system is not ready for arming (due to open protection zones). The system is ready to arm when this message disappears and the READY indicator light comes on.
- NO AC:** Appears when AC power has been cut off. System is operating on backup battery power.
- AC:** Appears when AC power is present.
- CHIME:** Appears when the CHIME feature is activated.
- BAT:** Low battery condition in a wireless sensor (if zone number displayed) or low system battery (if no zone number displayed).
- ALARM:** Appears when an intrusion has been detected and the system is armed (also appears during a fire alarm or audible emergency alarm). Accompanied by the protection zone in alarm.
- CHECK:** Appears when a malfunction is discovered in the system at any time or if an open is detected in a FIRE zone at any time or a fault in a DAY/NIGHT burglary zone during a disarmed period. Accompanied by a display of zone number in trouble.
- FIRE:** Appears when a fire alarm is present. Accompanied by a display of the zone in alarm.
A FIRE display also appears when a fire alarm is manually activated, accompanied by a display of emergency key zone number programmed for fire.



TYPICAL FIXED-WORD DISPLAY
(FA260KP shown)

About The Keypads

General Information

Your keypads allow you to control all system functions. The keypads feature the following:

- A telephone style (digital) keypad
- Liquid Crystal Display (LCD) which shows the nature and location of all occurrences
- Built-in sounder which will sound during alarms and troubles. The sounder also "beeps" during certain system functions and when depressing any of the keys (to acknowledge the key press).
- Backlighting of the LCD display windows. Backlighting turns on when entering the premises through any assigned entry/exit door, or when any key is pressed. This feature is helpful when a keypad is located in a dimly lit area.

IMPORTANT: If the keypad beeps rapidly upon entering the premises, it indicates that an alarm has occurred during your absence and an intruder may still be on the premises. LEAVE IMMEDIATELY and CONTACT THE POLICE from a nearby safe location.

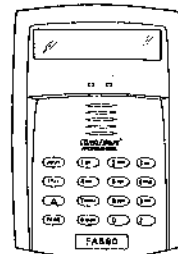
There are two basic types of keypads which are functionally the same, but they have different types of displays.

Alpha Display 2-line alpha display keypads feature a 2-line, 32-character alphanumeric LCD which can display system messages in friendly English. These keypads can also be programmed with custom zone descriptors.

Fixed-Word Display Fixed-Word display keypads are functionally identical to Alpha display keypads, but the LCD display uses pre-designated words to identify the nature and location of occurrences.



FA260KP FIXED-WORD KEYPAD



FA560KP ALPHA KEYPAD

System Overview (Continued)

Phone Access

- If included, a phone module permits you to access the system via a touch-tone phone, either on-premises or by calling-in when away.
- You can receive synthesized voice messages over the telephone regarding the status of the security system.
- You can arm and disarm the system and perform most function commands remotely via the telephone, with voice confirmation provided after each command entry.
- Complete information regarding the use of this feature is provided in a separate manual entitled "Phone Access User's Guide" that is supplied with the voice module.

Paging Feature

- If programmed, the system can automatically send certain system condition messages to up to four (FA168C) or two (FA148CP) pagers.
- The display consists of code numbers that indicate the type of condition that has occurred.

Function Keys

- The "A", "B", "C", and "D" keys on the keypad can be programmed to perform various functions.
- Functions include: activate a Panic alarm; arm the system; provide step arming; switch lights on/off; send a message to a pager; display Time/Date; start a Macro

Scheduling

- Your system can be programmed to automatically perform certain functions (e.g., arm the system) at a predetermined time each day.

System Overview (Continued)

Zones and Partitions

- The system sensing devices have been assigned to various “zones,” which are specific areas of protection (e.g., front door, kitchen window, etc.).
- Zone numbers are displayed at the keypad when an alarm or trouble condition occurs on a sensor.
- Partitions (FA168C) provide two independent areas of protection, with each partition containing a group of zones that can be armed and disarmed without affecting other zones or users.
- Partitioned systems (FA168C) can include a common zone area, which is an area shared by users of both partitions (such as a lobby in a building).

Arming, Step-Arming and Disarming Burglary Protection

- The system must be armed before the burglary protection can sense intrusions.
- To arm your system, enter your user code followed by the desired arming key.
- If programmed, the [#] key can be pressed instead of entering the security code when arming the system.
- You can also use the step-arming key, if programmed, to arm the system, which lets you use a function key to arm the system in one of three modes by simply pressing the key repeatedly.
- To disarm the system, enter your user code then press the [OFF] key.

Alarms

- When an alarm occurs, both the keypad and external sounders will sound, and the keypad will display the zone(s) causing the alarm.
- If your system is connected to a Central Monitoring Station, an alarm message will also be sent.
- To stop the alarm sounding, simply disarm the system.

Memory of Alarm

- When an alarm condition occurs, the keypad displays the number(s) of the zone(s) that caused the problem, and displays the type of alarm.
- The message remains displayed even after disarming the system, but can be cleared with another “off” sequence.

System Overview

Introduction

Congratulations on your ownership of a First Alert Professional Security System. You've made a wise decision in choosing it, for it represents the latest in security protection technology today. This system provides:

- Three forms of protection: burglary, fire* and emergency
- At least one keypad which provides control of system and displays system status
- Various sensors for perimeter and interior burglary protection
- Smoke or combustion detectors* designed to provide early warning in case of fire.

Your system may also have been programmed to automatically send alarm or status messages over the phone lines to a Central Monitoring Station.

** Commercial installations and some residential systems may not include fire protection – check with your installer.*

NOTE: The features and procedures described in this manual apply to both the FA168C and FA148CP security systems. Differences are noted where applicable.

System Basics

Burglary Protection

- Several modes of burglary protection: Stay, Night-Stay, Away, Instant, Maximum.
STAY: arms perimeter zones only and entry delay is on
INSTANT: same as STAY, except entry delay is off
NIGHT-STAY: arms perimeter zones and selected interior zones; entry delay on
AWAY: arms perimeter and all interior zones, entry delay is on
MAXIMUM: same as AWAY, except entry delay is off
- You can BYPASS selected zones while leaving the rest of the system armed.
- CHIME mode alerts you to the opening of protected doors and windows while the system is disarmed.

Fire Protection

- Fire protection is always active (if installed) and an alarm sounds if a fire condition is detected
- If necessary, you can manually initiate a fire alarm using the keypad (if programmed).
- Refer to the Fire Alarm System section for information regarding fire protection, smoke detectors and planning emergency exit routes.

Security Codes

- You were assigned a 4-digit security code during system installation.
- Use your security code when arming and disarming the system, and when performing other system functions.
- Other users can be assigned different security codes, each with different authority levels, which define the system functions a particular user can perform.

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IMPORTANT!

PROPER INTRUSION PROTECTION

For proper intrusion coverage, sensors should be located at *every possible point of entry* to a home or commercial premises. This would include any skylights that may be present, and the upper windows in a multi-level building.

In addition, we recommend that radio backup be used in a security system so that alarm signals can still be sent to the Central Monitoring Station in the event that the telephone lines are out of order (alarm signals are normally sent over the phone lines).

EARLY WARNING FIRE DETECTION

Early warning fire detection is important in a home. Smoke and heat detectors have played a key role in reducing fire deaths in the United States. With regard to the number and placement of smoke/heat detectors, we subscribe to the recommendations contained in the National Fire Protection Association's National Fire Alarm Code (NFPA 72). These recommendations can be found on page 43 of this manual.

About This Manual

This manual is a step-by-step guide that will acquaint you with the system's features and benefits. It defines the components and their functions, describes their operation, and provides clear step-by-step instructions for normal and emergency procedures. Keep this manual in a convenient place so that you can refer to it as necessary.

ONE YEAR LIMITED WARRANTY

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