

SYSTEM PROGRAMMING WORKSHEET

XL-21

Name: _____

Address: _____

01	Primary Tele #	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	234AAAAAAAAA
02	Secondary Tele #	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	AAAAAAAAAAAA (none)
03	Callback Tele #	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	AAAAAAAAAAAA (none)
04	Dialer Options	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Touch Tone, 20PPS, 2300Hz, No Parity, 3x1, Audible Panic								
05	Keypad Options	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Keypad Panic & Auto unbypass enabled, HW Panic Audible, Restore follows Bell								
06	System Timeouts	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Entry Delay 1 - 90 sec, Exit Delay - 90 sec, Burg Bell - 15 min, Fire Bell - No Timeout								
07	Misc Sys Options	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Entry Delay 2- 20 sec, RingCount = 12, CS Test = 7 days (weekly), Euro Ring off, Smoke not Trigger								
08	Account #1	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = 1234								
09	Account #2	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = AAAA (null)								
10	Zone #1	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Delay (20)			Code = 31					
11	Zone #2	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Interior (41)			Code = 32					
12	Zone #3	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Perimeter (10)			Code = 33					
13	Zone #4	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Perimeter (10)			Code = 34					
14	Zone #5	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Perimeter (10)			Code = 35					
15	Zone #6	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Perimeter (10)			Code = 36					
16	Ambush/AC Loss	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Ambush - AA (null) AC Loss - AA (null)								
17	Panic/Low Battery	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Panic - 22 Low Battery - AA (null)								
18	Opn/Cls/Testcode	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Open - A (null) Close - A (null) Test - AA (null)								
19	Byp/Rest/Trbl/Cncl	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Bypass - A (null) Restore - E Trouble - F Cancel - 8(null)								
20	Keypad Fire/Aux	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = Keypad Fire - AA (null) Keypad Aux - AA (null)								
00	Installer Code	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	Default = 2121								
21	Zone 1 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 1
22	Zone 2 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 2
23	Zone 3 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 3
24	Zone 4 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 4
25	Zone 5 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 5
26	Zone 6 Descriptor	<input type="checkbox"/> L1	<input type="checkbox"/> L2	<input type="checkbox"/> L3	<input type="checkbox"/> L4	<input type="checkbox"/> L5	<input type="checkbox"/> L6	<input type="checkbox"/> L7	<input type="checkbox"/> L8	<input type="checkbox"/> L9	<input type="checkbox"/> L10	<input type="checkbox"/> L11	<input type="checkbox"/> L12	Default = ZONE 6

9.1. ZONE PROGRAMMING

Questions 10-15 represent all the options related to programmable zones 1-6. Each question contains four(4) locations L1-L4. The first two locations (L1-L2) define the zone type. The second two locations (L3-L4) define the alarm code transmitted to the Central Station for that zone.

ZONE TYPES

Zones 1-6 can be programmed for any one of the following zone types:

BURGLARY ZONES

DELAY

This is the industry standard exit/entry zone. When the system is armed exit time begins. After exit expires, any subsequent violation of this zone will begin entry time. If the system is not disarmed within the programmed entry time an alarm will occur. The keypad sounder will annunciate steadily during entry time, unless there had been an alarm condition, at which time it will pulse. Delay zones will activate instantly when the system is armed using the STAY/INSTANT mode if enabled. Delay zones employ the Exit Error Warning feature described in the note below.

INTERIOR

All interior zones have exit delay time upon system arming. Furthermore, all interior zones will have entry delay time if a delay zone is violated first. If this zone is violated first however, it will generate an immediate alarm. Interior zones are bypassed if the system is armed in the STAY MODE. Interior zones employ the Exit Error Warning feature described in the note below.

PERIMETER

This zone type (sometimes known as INSTANT) will generate an alarm when violated while the system is armed.

NOTE: Exit Error Warning. At the end of exit time a 1 second window is started. If any delay or interior zones are violated after arming within this window (exit time expires and entry time starts) the burglary bell and keypad sounder will be turned on forcing the user to enter their code preventing a false alarm transmission. This helps avoid the common false alarms that take place after arming the system

BURGLARY ZONE OPTIONS

RESTORE

This option is selected for all burglary zones by enabling the restore report code (question 19, location 2). The programmed restore code will be reported upon bell cutoff, assuming the loop is restored unless Restore Follows Loop is selected in question #05, location 4. The restore code will also be reported if the system is disarmed during an alarm. **NOTE:** Restore is not selectable by zone.

BYPASS IN STAY

This option allows zones to be bypassed when the system is armed in the STAY mode.

CHIME

If this option is selected the keypad sounder will annunciate for 1 second when this zone is violated in the disarmed mode.

DIALER DELAY

If this option is selected the system will allow a 15 second delay before dialing, allowing the end user to ABORT the transmission. If this option is not selected, any alarm condition will result in an immediate transmission that cannot be aborted. **NOTE:** For UL installations dialer delay may not be used.

DAY FEATURE

If a zone with this option is violated while the system is DISARMED, the keypad sounder and zone LED will pulse for as long as the violation remains. In addition, the SYSTEM TROUBLE CODE will be transmitted to the central station. THE SOUNDER CAN BE SILENCED through entry operation of any valid user code.

While the system is armed, a DAY zone will act as an alarm when violated.

24 HR. ZONES

FIRE

FIRE zones on the system contain Fire Verification Logic. Upon detection of the first violation, smoke detector power will be reset for a period of 8 seconds. After this time period, power is restored. For a period of 5 seconds the fire zone will not be scanned allowing the smoke detectors to settle. Future violations within a two minute period will result in a PULSING BELL OUTPUT, RAPID PULSING ZONE LED, and IMMEDIATE transmission to the CS. Fire signals cannot be aborted.

Entry of any valid user code will silence the sounder, bell and reset smoke detector power. If the system detects that the fire zone is still violated within 2 minutes of power reset, the zone LED will pulse slowly to indicate a fire trouble. Thereafter, smoke detector power will be reset every 4 minutes automatically in an attempt to clear the fire zone.

In the event the fire zone experiences an open, the system indicates fire trouble by pulsing the keypad zone LED and sounder slowly. The system trouble code (followed by the zone code) will be reported to the CS.

The keypad sounder can be SILENCED through entry of ANY VALID USER CODE. **NOTE: FIRE ZONES cannot be bypassed.**

24 HR. ALARM

This zone type is always active, independent of the system arming status. Programming options include audible (STEADY BELL) or silent (NO BELL or keypad indications). Upon violation the zone LEDS will pulse rapidly (audible zones only) and an immediate CS transmission will occur which cannot be aborted.

24 Hour Alarm zones can be bypassed, however they cannot be unbypassed if a violation exists on the zone terminals.

24 HR. TROUBLE

This zone type is always active, independent of the system arming status. Programming options include audible (PULSING KEYPAD SOUNDER) or silent. Upon violation the zone LED will pulse slowly. Trouble condition must exist for 15 seconds before a transmission will occur. The keypad display and sounder will clear upon zone restoral.

24 Hour Trouble zones can be bypassed, however they cannot be unbypassed if a violation exists on the zone terminals.

NOTE: 24 hour trouble is not to be used for fire and burglary detection zones. 24 Hour silent alarm zones are not to be used for perimeter protection. THE SOUNDER MAY BE SILENCED THROUGH ENTRY OF ANY VALID USER CODE.

The following table contains the entries required for locations L1 and L2 of the zone type questions.

ZONE TYPE CHART

CONTROLLED ZONES		24 HOUR ZONES
10 Perimeter	20 Delay	81 Alarm Audible
11 Perimeter, Bypass in Stay	21 Delay, Bypass in Stay	82 Trouble Audible
12 Perimeter, Day	24 Delay, Chime	84 Fire (Always Audible)
13 Perimeter, Day, Bypass in Stay	25 Delay, Chime, Bypass in Stay	89 Alarm Silent (no LED, sounder or bell)
14 Perimeter, Chime	40 Interior	8A Trouble Silent (LED indication only)
15 Perimeter, Chime, Bypass in Stay	41 Interior, Bypass in Stay	
18 Perimeter, Dial Delay	44 Interior, Chime	
19 Perimeter, Bypass in Stay, Dial Delay	45 Interior, Chime, Bypass in Stay	
1A Perimeter, Day, Dial Delay	48 Interior, Dial Delay	
1B Perimeter, Day, Bypass in Stay, Dial Delay	49 Interior, Bypass in Stay, Dial Delay	
1C Perimeter, Chime, Dial Delay	4C Interior, Chime, Dial Delay	
1D Perimeter, Chime, Bypass in Stay, Dial Delay	4D Interior, Chime, Bypass in Stay, Dial Delay	

ZONE ALARM CODES

As previously specified locations L3 and L4 of the zone questions represent the alarm code that will be reported to the central station.

Zones will transmit to the Central Station unless these digits are defined as AA for any individual zone, or the local dialer option is selected in question 03. Based on the dialer format selected enter the alarm code as follows:

STANDARD FORMAT: Enter the desired single digit alarm code in location L3. The value placed in L4 will not be used.

Example: Desired transmission 123 2 (account 123, alarm code 2). Enter a 2 in location L3 of the zone question. Any value placed in L4 will be not be used.

EXTENDED: Enter the desired first digit of the alarm code in location L3. The second digit in L4.

Example: Desired transmission 123 3

333 4

Enter 3 in L3, 4 in L4.

QUESTION 16 AMBUSH/AC LOSS**DEFAULT = AAAA**

There are 4 locations L1-L4 in this question. L1 - L2 is the alarm code that will be transmitted on AMBUSH. L3 - L4 is the AC LOSS CODE. The same rules for programming regarding dialer format apply here. If either, or both of these transmissions are not desired, program their respective locations AA.

AMBUSH transmissions are immediate and not abortable.

AC LOSS transmissions will be reported 15 minutes after detection.

LOCATION	DEFAULT
L1 - L2 AMBUSH	AA
L3 - L4 AC LOSS	AA

QUESTION 17 PANIC/LOW BATTERY**DEFAULT = 22AA**

There are 4 locations L1-L4 in this question. L1 - L2 is the alarm code that will be transmitted on PANIC. This code will be transmitted for KEYPAD as well as HARDWIRE PANIC. L3 - L4 is the LOW BATTERY CODE. The same rules for programming regarding dialer format apply here. If either or both of these transmissions are not desired, program their respective locations AA.

PANIC transmissions are immediate and not abortable.

LOW BATTERY transmissions will be reported 4 minutes after detection. LOW BATTERY RESTORE CODE will be reported WITHIN 4 minutes after detection of GOOD BATTERY condition.

LOCATION	DEFAULT
L1 - L2 PANIC	22
L3 - L4 LOW BATTERY	AA

QUESTION 18 OPEN/CLOSE/CS TEST CODE**DEFAULT = AAAA**

There are 4 locations L1-L4 in this question. L1 is the single digit OPENING CODE. L2 is the single digit CLOSING CODE. Entry of AA into these two locations means that openings and closings are not desired. If a dialer format other than standard is programmed then the second digit transmitted will be the user number. L3 - L4 is the CS Test CODE. Entry of AA means that CS Test is not enabled. If CS Test code is selected then ANY valid transmission will reset the CS Test timer.

LOCATION	DEFAULT
L1 OPENING CODE	A
L2 CLOSING CODE	A
L3 L4 CS TEST	AA

QUESTION 19 BYPASS/RESTORE/TROUBLE/CANCEL**DEFAULT = AAF8**

There are four(4) locations L1 - L4 in this question.

L1 is the single digit system BYPASS CODE that will be reported to the central station if a zone is bypassed, UPON ARMING. Entry of an A means that bypasses are not transmitted. If a two digit dialing format has been selected then the Bypass code will be followed by the programmed second digit of the zones code.

L2 is the single digit system RESTORE CODE reported to the central station. Restores will be reported for all burglary or 24 hour zones by enabling this code (entry of any code except A) . Entry of an A means that restores are not transmitted. If a two digit dialer format has been programmed then the restore code will be followed by the programmed second digit of the zones code. **NOTE:** Restore is not selectable by zone.

L3 is the single digit system TROUBLE CODE reported to the central station. This code will be reported on DAY TROUBLE and any FIRE TROUBLE. If a two digit format has been programmed then this code will be followed by the second digit of the respective zones code.

L4 is the single digit system CANCEL CODE reported to the central station. This code will be sent if after a violation of a controlled zone, a user code is entered. If the zone is still violated, entry of a user code will transmit the cancel code. If the zone is programmed for restoral, then the restore code will be transmitted when the loop status has returned to normal. An entry of A in this field indicates that cancel codes are not transmitted. In formats requiring 2 digits, the user number functions as the second digit.

LOCATION	DEFAULT
L1 BYPASS	A
L2 RESTORE	A
L3 TROUBLE	F
L4 CANCEL	8

QUESTION 20 KEYPAD FIRE/ KEYPAD AUX.**DEFAULT = AAAA**

There are 4 locations L1-L4 in this question. L1 - L2 is the alarm code that will be transmitted upon activation of the keypad fire condition (pressing the 7 & 9 keys on the keypad). This code can vary from any of the zones which are programmed as fire. L3 - L4 is the code transmitted to the CS for keypad aux. condition (1 & 3 from the keypad)

NOTE: These keypad emergency conditions are optional and can be enabled within question 05 of the programming sequence. If either or both of these transmissions are not desired, program their respective locations AA.

LOCATION	DEFAULT
L1 - L2 KPAD FIRE	AA
L3 - L4 KPAD AUX	AA

QUESTION 00 INSTALLER CODE**DEFAULT = 2121**

There are 4 locations L1 - L4 in this question. Enter any 4 digit (0-9) installer code desired. This code is used to ENTER the system programming mode via the keypad.

Typically each installing company would use a unique installer code in order to prevent unauthorized people from gaining access to their panels.