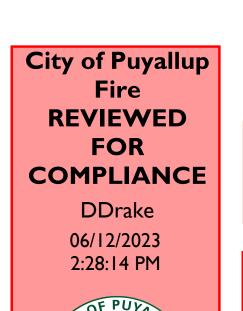


Fire Alarm and Detection System

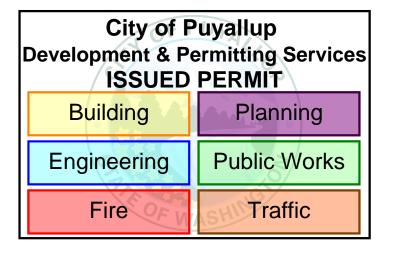
Equipment Supplied By





THE APPROVED CONSTRUCTION PLANS AND ALL ENGINEERING MUST BE POSTED ON THE JOB AT ALL INSPECTIONS IN A VISIBLE AND READILY ACCESSIBLE LOCATION.

Approval of submitted plans is not an approval of omissions or oversight by this office or noncompliance with any applicable regulations of local government. The contractor is responsible for making sure that the building complies with all applicable building codes and regulations of the local government.



Project Team Conta	act Informatio	n	
Sales Representative:	Tim Duggan	timothy.duggan@jci.com	(253) 509-8816
Project Engineer:	Eric Beck	eric.beck@jci.com	(206) 777-4821
Project Coordinator:	Bryan Reimer	bryan.reimer@jci.com	(206) 777-4933
Technician Scheduler:	Yvonne Thompson	yvonne.thompson@jci.com	(206) 777-4860

	SHEET LIST TA	BLE
INCLUDED	SHEET NUMBER	SHEET TITLE
X	FA-COV-01	TITLE SHEET
X	FA-COV-02	GENERAL INFORMATION
	FA-RIS-01	RISER DIAGRAM
	FA-DET-01	WIRING TYPICALS
	FA-DET-02	WIRING TYPICALS
X	FA-DET-03	WIRING TYPICALS
	FA-PG	PARKING
	FA-D0-01	DROP OFF
	FA-B-01	BASEMENT
	FA-G-01W	GROUND WEST
	FA-G-01E	GROUND EAST
	FA-F-01W	LEVEL 1 WEST
	FA-F-01E	LEVEL 1 EAST
X	FA-F-02W-D	LEVEL 2 WEST DEMO
X	FA-F-02W	LEVEL 2 WEST
	FA-F-02E	LEVEL 2 EAST
	FA-R-01	ROOF

	EIRE	TITLE	0005	407 14TH AVE PUYALLUP, W
닐	APPROVE			
WORNING DRAWING NAME	K. CH	lUN		
	DRAWN E	BY:		
אַצ	JCF	)		
2	DATE:			
אל אל	3–1–	2000		
•	PROJECT	г иимве	R:	
		459-9	990051	
	SHEET N	LIMPED.		

SHEET NUMBER:

FA-COV-0

### GENERAL FIRE ALARM SYSTEM NOTES

- 1) FIRE ALARM SYSTEM IS POWER LIMITED. METALLIC RACEWAY SHALL BE USED IF REQUIRED BY CODE, SPECIFICATIONS AND CONTRACT DOCUMENTS OR AHJ.
- 2) ALL RACEWAYS MUST BE FREE OF MOISTURE

PROPER INSTALLATION OF ALL DEVICES.

- 3) REFER TO JOHNSON CONTROLS FIRE ALARM DATA SHEETS FOR PROPER TYPE AND SIZES OF REQUIRED DEVICE MOUNTING ELECTRICAL BOXES. ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR
- 4) AC VOLTAGE IS NOT PERMITTED IN THE SAME RACEWAY AS FIRE ALARM WIRING.
- 5) UNRELATED (NON-FIRE ALARM) WIRING SHALL NOT BE IN THE SAME RACEWAY AS FIRE ALARM
- 6) ALL CONTRACTOR FIELD WIRING MUST ENTER ALARM CONTROL PANEL BACKBOX FOLLOWING POWER-LIMITED AND NON POWER-LIMITED WIRING REQUIREMENTS. REFER TO INSTALLATION INSTRUCTIONS FOR MORE INFORMATION. 7) ZONE CIRCUITS AND SIGNAL CIRCUITS ARE ELECTRICALLY SUPERVISED. BRANCH CIRCUITS
- SHALL BE LOOPED TO MAINTAIN INTEGRITY OF SUPERVISED CIRCUITS——T—TAPPING OF ZONE CIRCUITS AND SIGNAL CIRCUITS IS NOT PERMITTED.
- 8) REFER TO FACP MODULE DIAGRAMS, INCLUDED WITH FACP, FOR SPECIFICATIONS AND INFORMATION ON INDIVIDUAL PANEL MODULES. VERIFY ALL CONNECTIONS WITH A JOHNSON CONTROLS
- FIELD TECHNICAL REPRESENTATIVE PRIOR TO TERMINATION. ALL FIRE ALARM WIRING SHALL TEST FREE OF OPENS, SHORTS AND GROUNDS.
- 10) ALL WIRING SHALL BE LABELED AND TAGGED 11) ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR INSTALLATION AND MAKING ALL FINAL
- CONNECTIONS PRIOR TO JOB CHECKOUT AND FINAL TESTING BY A JOHNSON CONTROLS FIELD TECHNICAL REPRESENTATIVE. CALL A MINIMUM OF 5 DAYS IN ADVANCE TO SCHEDULE
- A JOHNSON CONTROLS TECHNICIAN AT (206) 777-4860. 12) ELECTRICAL CONTRACTOR IS RESPONSIBLE FOR MAKING ALL ARRANGEMENTS FOR INSPECTION, TEST AND CERTIFICATION OF THE FIRE ALARM SYSTEM BY ALL APPROPRIATE
- AUTHORITIES. 13) UPON WRITTEN REQUEST, JOHNSON CONTROLS WILL PROVIDE WRITTEN INSTRUCTIONS REGARDING THE APPROPRIATE WIRE/CABLE FOR INSTALLATION OF THE EQUIPMENT/SYSTEM(S) IDENTIFIED IN THESE DRAWINGS. JOHNSON CONTROLS SHALL NOT BE RESPONSIBLE FOR PROBLEMS OR DAMAGES

RESULTING FROM THE USE OF WIRE/CABLE OTHER THAN THAT WHICH HAS BEEN IDENTIFIED

IN WRITING BY JOHNSON CONTROLS FOR A SPECIFIC APPLICATION. 14) ALL WIRING SHALL MEET ALL APPLICABLE NATIONAL ELECTRIC CODE ARTICLES FOR FIRE ALARM AND LOW VOLTAGE WIRING.

TI ARCHITECT:

MAZZETTI ARCHITECTS SEATTLE, WA.

JOHNSON CONTROLS

JOHNSON CONTROLS

PRECISION ELECTRIC GROUP

ADDRESSABLE DETECTOR

<u>IDENTIFICATION</u>

---LOOP #

— MODULE/CIRCUIT #

TUKWILA, WA

REDMOND, WA

TULWILA, WA

FIRE ALARM SYSTEM TI DESIGNED BY:

FIRE ALARM SYSTEM TI INSTALLED BY:

EQUIPMENT FOR FIRE ALARM SYSTEM SUPPLIED BY:

WASHINGTON STATE ELECTRICAL CONTRACTORS NUMBER: JOHNSCP831PR

THESE DRAWINGS DO NOT SUPERSEDE THE CONTRACT DRAWINGS AND SPECIFICATIONS. THEY ARE INTENDED AS A SUPPLEMENT ONLY AND MUST BE USED IN CONJUNCTION WITH THE CONTRACT DOCUMENTS. THEY DO NOT MODIFY THE CONTRACTORS OBLIGATIONS TO CONFORM TO THE PROJECTS ORIGINAL DESIGN CRITERIA.

## **ELECTRICAL CONTRACTOR**

- ELECTRICAL CONTRACTOR IS TO SCHEDULE A PRELIMINARY SITE MEETING WITH A JOHNSON CONTROLS TECHNICAL REPRESENTATIVE. THESE MEETINGS ARE FOR REVIEWING EQUIPMENT LISTS. INSTALLATION PROCEDURES, AND PROVIDING ANSWERS TO QUESTIONS RELATIVE TO SYSTEM INSTALLATION.
- PLEASE ALLOW A MINIMUM OF FIVE WORKING DAYS ADVANCE NOTICE TO SCHEDULE A TECHNICAL REPRESENTATIVE.
- TO SCHEDULE A MEETING PLEASE CONTACT OUR SERVICE DEPARTMENT
- AT (206) 777-4860. - DO NOT USE FIRE ALARM CABINET AS TERMINAL CABINET

### NOTES:

- FIRE ALARM DRAWINGS ARE SCHEMATIC ONLY. - ALL CABLE SUBSTITUTIONS MUST BE APPROVED BY SIMPLEX ENGINEERING IN WRITING.
- STROBES AT 80" TO BOTTOM OF DEVICE. - NOTE: MOUNT PULL STATIONS <u>AT 48" TO TOP</u>
- OF DEVICE. - ALL SHIELDS ON THE SAME MAPNET CHANNEL OR SPEAKER CIRCUIT SHOULD BE TWISTED TOGETHER
- SPEAKER CIRCUIT SHOULD BE TAPED TOGETHER AND BE FREE OF OPENS, SHORTS, AND GROUNDS. - DO NOT EXCEED 2500 FT OUT TO FURTHEST DEVICE-

FOR CONTINUITY AND TAPED UP TO PREVENT GROUNDING

- MAXIMUM 10,000 FT ON MAPNET CHANNEL. DRY CONTACT ONLY PROVIDED FOR DOOR HOLDERS, ROLL DOORS AND SMOKE/FIRE DAMPERS - POWER BY OTHERS.
- DUCT DETECTORS ARE NOT WEATHERPROOF. ELECTRIC CONTRACTOR IS RESPONSIBLE FOR PROTECTING FROM ENVIRONMENTAL CONDITIONS (TEMPERTURE, MOISTURE, ETC)
- ALL SPEAKERS TO BE TAPPED AT 1/2 WATT, 25V UNLESS OTHERWISE NOTED.

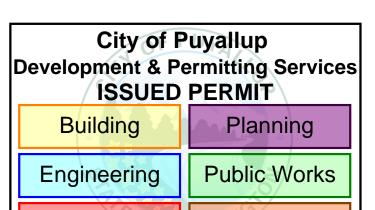
# SPEAKER CIRCUIT

- CIRCUIT # DROP-OFF LEVEL BASEMENT LEVEL GROUND LEVEL FIRST LEVEL
- FIRST LEVEL SECOND FLOOR & ROOF, PENTHOUSE LEVEL

# MONITORING COMPANY

NORTHWEST AMS 1-877-870-0910 SERVICE COMPANY SUTHERLAND SECURITY 3991 TANWAX CT. E.

EATONVILLE, WA. 98328



Traffic

# BATTERY CALCULATIONS - FACP

Does the system have an Emergency Generator that meets NEC 700.01?

How many hours of battery standby are required? \_X\_4 \_\_\_\_24 \_\_\_48 \_\_\_\_60 (4 hours minimum w/ Emergency Generators)

0.			Standby	Total	Alarm	Total
Qty	Part #	Description	Current (A)	Standby (A)	Current (A)	Alarm (A)
1	4100-9111	Fire Alarm Control Panel	3.7300	3.7300	4.7000	4.7000
1		Audible/Visible Devices	0.0000	0.0000	5.9510	5.9510
5	4603-9101	LCD Annunciator	0.0300	0.1500	0.1700	0.8500
2	4098-9756	TrueAlarm Duct Smoke Sensor	0.0024	0.0048	0.0150	0.0300
5	4098-9753	Duct Detector	0.0017	0.0085	0.0017	0.0085
7	4098-9843	Duct Detector Relay	0.0000	0.0000	0.0150	0.1050
35	2088-9008	Remote Relay	0.0000	0.0000	0.0150	0.5250
31	2190-9163	Control Zam	0.0100	0.3100	0.0400	1.2400
2	2190-9161	Signal Zam	0.0150	0.0300	0.0400	0.0800
			Total Standby=	4.2333	Total Alarm=	13.4895
		Total Standby Current Required=	4 2222	~	Time (Hrs)	16 0222
		Total Standby Culterit Nequileu-	4.2333	Χ	4.0000	16.9332
		Total Alarm Current Required=	13.4895	Х	0.2500	3.3724
		Total=				20.3056
		20% Depletion Factor=				4.0611
		Total Amp/Hour Required=				24.3667

Total Amp/Hour Batteries Provided=

110.0000

(1) set

											Does the system	have an Emergency Generator the yes X no of battery standby are required?4860 (4 hours minim	at meets NEC 700	0.01?	<u>/EL G</u>	
													Standby	Total	Alarm	Total
										Qty	Part #	Description	Current (A)	Standby (A)	Current (A)	Alarm (A)
										1	4009-9201	NAC Panel Total Current from Volt Drop	0.0850 0.0000	0.0850 0.0000	0.1850 3.5600	0.1850 3.5600
													Total Standby=	0.0850	Total Alarm=	3.7450
Wall Strobe High Candela 185cd												Total Standby Current Required=	0.0850	Х	Time (Hrs) 24.0000	2.0400
and				_	_		g					Total Alarm Current Required=	3.7450	X	0.0833	0.3120
e High C	8	8	po(	Ceiling Strobe 15cd	Ceiling Strobe 30cd	Ceiling Strobe 75cd	Ceiling Strobe 110cd	Synch Strobe 75cd	Existing Devices			Total=				2.3520
Strob	300	e 75	9 11(	g Str	g Str	g Str	g Str	Stro	D br			20% Depletion Factor=				0.4704
Walls	Strobe 30cd	Strobe 75cd	Strobe 110cd	Ceilin	Ceilin	Ceilin	Ceilin	Synch	Existir			Total Amp/Hour Required=				2.8224
0.430	0.094	0.186	0.252	0.075	0.125	0.233	0.316	0.075	1.500		То	tal Amp/Hour Batteries Provided=			(1) set	6.2000

										Signa	l Circuits - NAC#1	Current	Dist. (ft)	Voltage Drop
								9		N1-1	Ground Floor	0.675	430	1.78
								10		N1-2	Ground Floor	0.750	460	2.12
								7		N1-3	First Floor	0.525	510	1.64
2				1				9		N1-4	First Floor	1.610	555	5.49
2	0	0	0	1	0	0	0	35	0	Total		3.560		

		yes X no	at meets NEC 700	J.U I ?		
	How many hou	rs of battery standby are required?  44860 (4 hours minim	um w/ Emergenc	y Generators)		
Otv	Part #	Description	Standby	Total	Alarm	Tota
Qty	Pail#	Весеприон	Current (A)	Standby (A)	Current (A)	Alarm
1	4009-9201	NAC Panel	0.0850	0.0850	0.1850	0.185
1		Total Current from Volt Drop	0.0000	0.0000	2.5170	2.517
			Total Standby=	0.0850	Total Alarm=	2.702
					Time (Hrs)	
		Total Standby Current Required=	0.0850	Χ	24.0000	2.040
		Total Alarm Current Required=	2.7020	Х	0.0833	0.225
		Total=				2.265
		20% Depletion Factor=				0.453
		Total Amp/Hour Required=				2.718
	-	Total Amp/Hour Batteries Provided=			(1) set	

	Signa	al Circuits - NAC#2 - Level 1 Equipment Rm F171	Current	Dist. (ft)	Voltage Drop
	N2-1	Level 1 Northeast	1.562	715	6.86
	N2-2	Level 1 Northeast	0.441	500	1.35
	N2-3	Level 1 Northeast	0.388	460	1.10
	N2-4	Level 1 Northwest	0.126	100	80.0
	N2-5	Spare	0.000		0.00
	N2-6	Spare	0.000		0.00
	N2-7	Spare	0.000		0.00
	N2-8	Spare	0.000		0.00
0 0	0 Total		2.517		

TRANSMIT SUPV. SIGNAL TO CENTRAL STATION MONITOR

SEQUENCE OF OPERATION	MANUAL PULL STATION	SMOKE DETECTION	1ST FLR ELEV. LOBBY SMOKE DETECTION	ELEV. LOBBIES EXCEPT 1ST FLR SMOKE DETECTION	ELEV. MACHINE ROOM SMOKE DETECTION	ELEV. SHAFT SMOKE DETECTION	ELEV. SHAFT HEAT DETECTION	DUCT SMOKE DETECTION	HEAT DETECTION	FLOW SWITCH	TAMPER SWITCH	SYSTEM TROUBLE
ACTIVATION OF LOCAL ALARM AT FACP (LCD DISPLAY & AUDIBLE INDICATION)	X	×	X	X	$\times$	X	$\times$	X	X	X		
ACTIVATION OF ALARM AT ANNUNCIATOR	X	X	X	X	×	X	X	X	X	X		
ACTIVATE AUDIBLE/VISIBLE DEVICES	X	X	X	X	×	X	X	X	X	X		
ACTIVATE MAGNETIC DOOR HOLDER RELAYS	X	X	X	X	×	X	X	X	X	X		
ACTIVATE DOOR CONTROL RELAYS	X	X	×	X	×	X	X	X	X	×		
DEACTIVATE SECURITY DOORS PUSH BUTTONS	X	X	×	X	×	X	X	X	X	×		
NITIATE PRIMARY ELEVATOR RECALL RECALL TO FIRST FLOOR				X	×	X						
NITIATE ALTERNATE ELEVATOR RECALL RECALL TO SECOND FLOOR			X									
TRANSMIT ALARM SIGNAL TO CENTRAL STATION MONITOR	X	X	X	X	×			X	X	X		
TROUBLE INDICATION AT FACE												X
TROUBLE INDICATION AT ANNUNCIATOR												X
TRANSMIT TROUBLE SIGNAL TO CENTRAL STATION MONITOR												X
SUPV. INDICATION AT FACE											X	
SUPV. INDICATION AT ANNUNCIATOR											X	

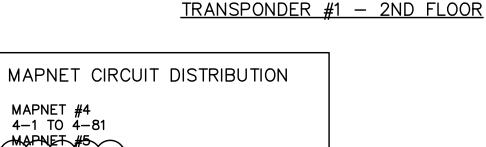
# MAPNET CIRCUIT DISTRIBUTION

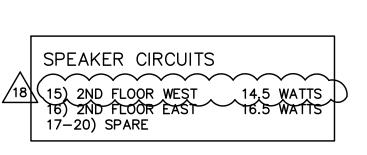
1-1 TO 1-53, 1-57 TO 1-60, 1-66 TO 1-107, 1-1091-110 TO 1-124 MAPNET #2 2-1 TO 2-96, 2-98 TO 2-105, 2-122 TO 2-127

3-1 TO 3-42, 3-44 TO 3-49, 3-53, 3-64 TO 3-96, 3-100 TO 3-101 3-118 TO 3-121 MAPNET #6 6-1 TO 6-74, 6-75 TO 6-114

#### SCOPE OF WORK TENANT IMPROVEMENT ON 2ND LEVEL-HYBRID O.R.#1. FOR COVERAGE DURING CONSTRUCTION PHASE, SWAP EXISTING DEVICES FOR HEAT DETECTORS WHERE INDICATED ON DEMO DRAWINGS. UPON COMPLETION OF CONSTRUCTION, DEMO (DEVICES WHERE INDICATED ON DEMO DRAWINGS AND INSTALL NEW DEVICES AND, WIRE AS INDICATED ON DRAWING FA-F-02W. ALL NEW WIRING NEEDED WILL BE CLASS B.

THE EXISTING FIRE ALARM SYSTEM SHALL NOT BE DISCONNECTED OR TAKEN OUT OF SERVICE WITHOUT WRITTEN PERMISSION FROM THE OWNER. IT IS THE CONTRACTOR'S RESPONSIBILITY TO COORDINATE WITH THE OWNER THE TIMING OF ANY EXISTING FIRE ALARM SYSTEM DEMOLITION WORK.



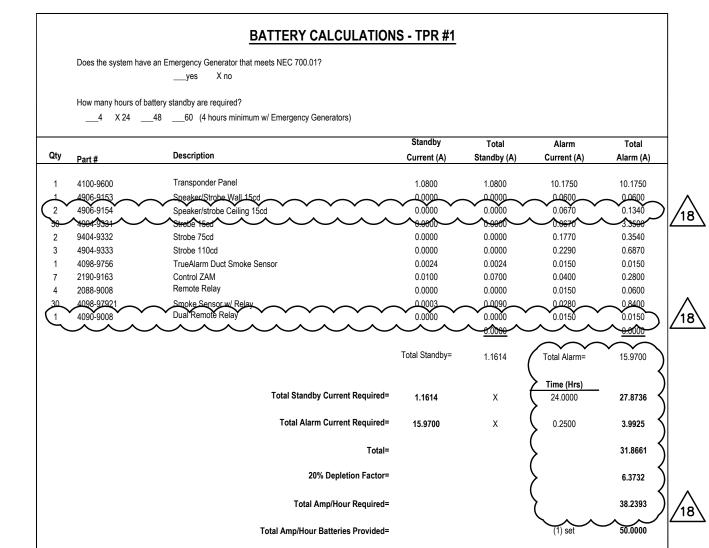


 $18\sqrt{(5-1)}$  TO 5-100, 5-109

AUXILIARY CIRCUITS

11) DOOR HOLDER - WEST 12) DOOR HOLDER - CENTER 13) DOOR HOLDER - EAST 14) AUTOMATIC EGRESS DOORS 15-18) SPARE

0.075 0.030 0.067 0.094 0.186 0.067 Signal Circuits - Transponder 1 11 1 SIG22) 2nd Floor Southwest 8 1 2 SIG23) 2nd Floor Northeast 14 2 SIG24) 2nd Floer Southeast 1292 540 4-28 



#### BATTERY CALCULATIONS - NAC#3 LEVEL G Does the system have an Emergency Generator that meets NEC 700.01? \_\_\_yes X no How many hours of battery standby are required? \_\_\_4 X 24 \_\_\_48 \_\_\_60 (4 hours minimum w/ Emergency Generators) Alarm Description Qty Part# Current (A) Standby (A) Current (A) Alarm (A) 4009-9201 NAC Panel 0.1850 Total Current from Volt Drop 0.7530 0.7530 Total Standby= 0.0850 Total Alarm= 0.9380 Total Standby Current Required= 0.0850 Total Alarm Current Required= 0.0833 Total= 2.1181 20% Depletion Factor= 0.4236 Total Amp/Hour Required= 2.5418 Total Amp/Hour Batteries Provided= (1) set 6.2000

				Signa	al Circuits - NAC#3	Current	Dist. (ft)	Voltage Drop
	1		2	N3-1	Ground & Level 1	0.399	100	0.24
2		2		N3-2	Level 2	0.354	170	0.37
				N3-3	Spare	0.000		0.00
				N3-4	Spare	0.000		0.00
2	1	2	2	Total		0.753		

#### BACK BOX SYMBOL MODEL # DESCRIPTION 4" SQ DEEP ADDRESSABLE MANUAL PULL STATION 2099-9795 \* SUBSCRIPT INDICATES MAPNET# 2 GANG 4" RING 4" SQ W/SG BY EC ADDRESSABLE MANUAL STATION 4099-9001 \* SUBSCRIPT INDICATES MAPNET# ADDRESSABLE MANUAL STATION 4" SQ W/SG BY EC 4099-9004 \* SUBSCRIPT INDICATES MAPNET# WALL HORN/STROBE 4903-9427 4" SQ BY EC \* SUBSCRIPT INDÍCATES CIRCUIT # & CANDELA MULTICANDELA WALL SPEAKER/STROBE 4906-9151 4" SQ DEEP \* SUBSCRIPT INDICATES CIRCUIT # & CANDELA SETTING 1.5" EXT BY EC 4" SQ DEEP WALL MOUNT SPEAKER 4902-9703 \* SUBSCRIPT INDICATES CIRCUIT # 1.5" EXT BY EC CEILING MOUNT SPEAKER 4902-9705 OR 4" SQ DEEP \* SUBSCRIPT INDICATES CIRCUIT # 4902-9721 1.5" EXT BY EC MULTICANDELA CEILING SPEAKER/STROBE 4906-9154 4" SQ BY EC \* SUBSCRIPT INDICATES CIRCUIT # Multicandela Ceiling Strobe 4906-9102 4" SQ BY EC \* SUBSCRIPT INDICATES CIRCUIT # MULTICANDELA WALL STROBE 15cd 4" SQ BY EC 4906-9103 \* SUBSCRIPT INDICATES CIRCUIT # HIGH CANDELA WALL STROBE 4906-9109 4" SQ DEEP \* SUBSCRIPT INDICATES CIRCUIT # 1.5" EXT BY EC STROBE 15cd 4" SQ BY EC 4904-9331 \* SUBSCRIPT INDICATES CIRCUIT # STROBE 75cd 4904-9332 4" SQ BY EC \* SUBSCRIPT INDICATES CIRCUIT # STROBE 110cd 4904-9333 4" SQ BY EC \* SUBSCRIPT INDICATES CIRCUIT # 4 11/16" SQ., 2 1/8" DEEP w/ SIGNAL ZAM 2190-9161 \* SUBSCRIPT INDICATES MAPNET # 1 1/2" DEEP EXTENSION RING SMART SYNCH MODULE 4905-9938 4" SQ 2 1/8" DEEP W/4" SQ BY EC 4" OCT BY EC 4098-9714 w/ SMOKE SENSOR AND BASE 4098-9792 BASE SMOKE DETECTOR w/ RELAY DRIVER BASE 4098-9714 w/ 4" x 2 1/8" DEEP OCT. W/ \* SUBSCRIPT INDICATES MAPNET # 4098-9791 BASE 1 1/2" EXTENSION RING BY EC 4098-9733 w/ 4" SQ w/ HEAT SENSOR AND BASE \* SUBSCRIPT INDICATES MAPNET # 4098-9792 BASE 4" OCT RING 4098-9756 HOUSING DUCT DETECTOR HOUSING AND SENSOR SELF-CONTAINED \* SUBSCRIPT INDICATES MAPNET # GANG RING ON 4" SQ LED INDICATOR 2098-9808 WATERFLOW SWITCH BY OTHERS BY OTHERS TAMPER SWITCH BY OTHERS BY OTHERS BY OTHERS BY OTHERS BY OTHERS BY OTHERS FIRE/SMOKE DAMPER BY OTHERS BY OTHERS SUPERVISED IAM 2190-9172 OR 4" SQ DEEP BOX w/ \* SUBSCRIPT INDICATES MAPNET : 4090-9001 4" SQ BLANK BY EC ROLL DOOR BY OTHERS BY OTHERS MAGNETIC DOOR LOCKS BY OTHERS BY OTHERS 2088-9578 or 2088-9608 MAGNETIC DOOR HOLDERS SINGLE GANG EXT. RING BY EC DOOR LOCK CONTROL BY OTHER BY OTHER REMOTE RELAY - DPDT SELF-CONTAINED 2088-9010 REMOTE RELAY 2088-9008 SELF-CONTAINED 4 11/16" SQ., 2 1/8" DEEP w/ CONTROL ZAM 2190-9163 \* SUBSCRIPT INDICATES MAPNET # 1 1/2" DEEP EXTENSION RING AND SURFACE COVER BY EC DUAL RELAY MODULE 4" SQ DEEP BOX w/ 4090-9008 \* SUBSCRIPT INDICATES MAPNET # 4" SQ BLANK BY EC REMOTE LCD ANNUNCIATOR 4603-9101 6 GANG BOX BY EC 4009-9201 16.25"W x 13.5"H x 4.25"D TRANSPONDER PANEL 4100-8019 52.125"W x 25.75"H x 6.75"D EXISTING FIRE ALARM CONTROL PANEL 4100 SERIES **EXISTING**

<u>LEGEND</u>

# WIRE CODE

ALL WIRING TO MEET CURRENT NATIONAL ELECTRIC CODE ARTICLE 760, 300, 310, 370, 725 AND ALL RELATED SECTION CODE REQUIREMENTS

LETTER	QTY	COLOR/TYPE	SIZE	FUNCTION
Α	2	BLACK/ORANGE TFN	16	ZONE
С	2	RED/BLUE THHN	12	STROBE
D	4	RED/BLUE THHN	12	STROBE LOOP
E	2	BROWN/YELLOW THHN	14	DOOR HOLDERS
F	4	ORANGE/YEL./BLACK/BLUE THHN	14	FAN SHUTDOWN
Н	1	WEST PENN D975	18	REMOTE ANNUNCIATOR
	2	RED/BLACK THHN	14	
J	1	TW/SHLD. PAIR	12	SPEAKER
K	2	TW/SHLD. PAIR	12	SPEAKER LOOP
L	2	YELLOW THHN	14	ELEVATOR RECALL
М	2	BROWN/YELLOW THHN	14	DOOR CONTROL
N	2	RED/BLACK THHN	14	NAC TRIGGER
Р	2	RED/BLACK THHN	14	24VDC POWER
R	2	BLUE/WHITE TFN	16	REMOTE LED
Т	2	WEST PENN D975	18	TRANSPONDER PANEL
	2	TW/SHLD PAIR	16	
	2	RED/BLACK THHN	14	
X	1	WEST PENN D975	18	ADDR. MAPNET DATA LINE

1) TAG AND IDENTIFY ALL ZONE WIRES WITH ZONE NUMBER. 2) TAG AND IDENTIFY ALL SIGNAL CIRCUIT WIRES WITH

SIGNAL CIRCUIT NUMBER. 3) TAG AND IDENTIFY ALL ANNUNCIATOR WIRES.

**균 2 | 요** 설명 APPROVED BY: K. CHUN DRAWN BY: 3-1-2000 PROJECT NUMBER: 459-990051 SHEET NUMBER: FA-COV-02

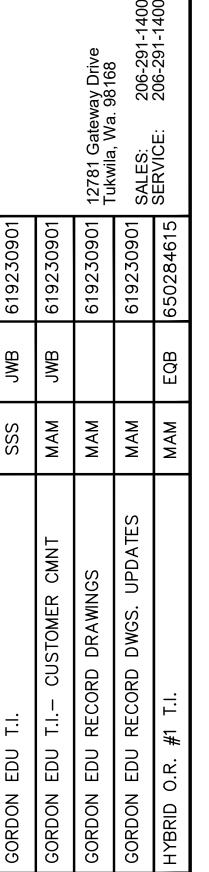
ohnson Control

DRAWINGS REVIEWED BY:

Fire Alarm Systems, Level III

VICET #228884





OPTIONAL TAP

LOCATION

SERIES T-TAP (SPLICE) (+)

CONNECTION CONNECTION

TERMINATION VIEW: DEVICE REAR

MAINTAIN CORRECT POLARITY ON

2. ALWAYS CUT CONDUCTORS AND SECURE

3. ANY WIRE SPLICES TO BE MADE BY LISTED

AND AHJ APPROVED METHODS.

UNDER TERMINALS. NEVER LOOP WIRES

TERMINAL CONNECTIONS.

UNDER TERMINALS.

IBOX BY OTHERS, 4098-9832 ORDEREL

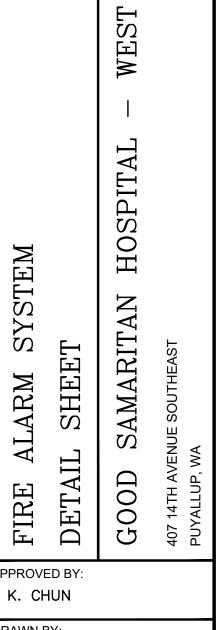
SEPARATELY

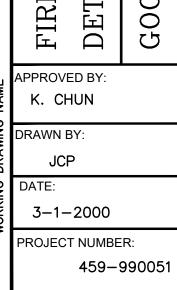
BY OTHERS

CLASS B WIRING

**WIRING NOTES** 

REVISION DESCRIPTION	8/14/20 GORDON EDU T.I.	2/22/21 GORDON EDU T.I.— CUSTOMER CMNT	06/14/21 GORDON EDU RECORD DRAWINGS	09/02/21 GORDON EDU RECORD DWGS. UPDATES	18 5/5/23 HYBRID O.R. #1 T.I.
DATE	8/14/20	2/22/21	06/14/21	09/02/21	5/5/23
NO.	16	17			18
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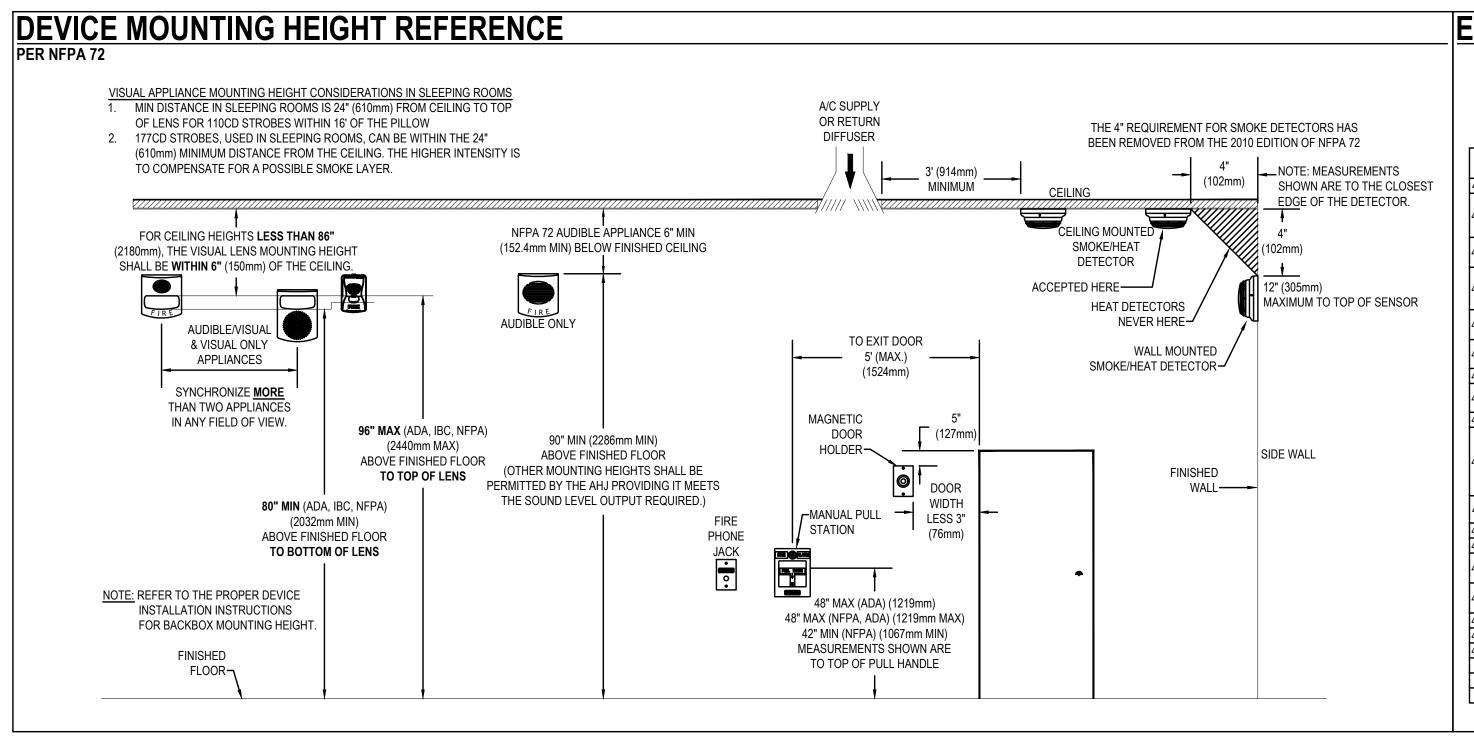




SHEET NUMBER:

FA-DET-02

THE REAR OF THE ELECTRICAL BOX. STRIP THE LEAD INSULATION TO 3/8" MAX. METAL ENCLOSURE CONTACTS 10 RATING SUPPLIED WITH RELAY-LOCATION FOR LIMITATIONS. @ 115 VAC VIRING TERMINALS AND SPEAKER TAP SELECTION ACCESSIBLE FROM REAR OF SPEAKER HOUSING LOCATION ELAY ENERGIZED LEI T-TAP (SPLICE) SERIES STROBE (-) CIRCUIT (+) TO NEXT (+) DEVICE CONNECTION CONNECTION TERMINATION VIEW CLASS B WIRING <u>(+)</u>c OR 10K ے CIRCUIT -CANDELA INTENSITY **WIRING NOTES** PLUG. ACCESSIBLE FROM <u>TERMINATION VIEW: DEVICE MOUNTING PLATE</u> USE MOUNTING 1. MAINTAIN CORRECT POLARITY ON TERMINAL REAR OF HOUSING. **MOUNTING OPTION "A"** HOLES TO SECURE CONNECTIONS. 2. ALWAYS CUT CONDUCTORS AND SECURE UNDER TERMINALS. NEVER LOOP WIRES UNDER 1. MAINTAIN CORRECT POLARITY ON LED VIEWING HOLE TERMINALS. TERMINAL CONNECTIONS. 3. ANY WIRE SPLICES TO BE MADE BY LISTED AND **WIRING NOTES** 2. ALWAYS CUT CONDUCTORS AND AHJ APPROVED METHODS (CLASS B ONLY). **SURFACE MOUNTING** -ADDRESS SETTING DIP SWITCH BEHIND SECURE UNDER TERMINALS. NEVER 1. MAINTAIN CORRECT POLARITY ON STROBE ASSEMBLY; SET ADDRESS BEFORE LOOP WIRES UNDER TERMINALS. CONNECTIONS. INSTALLING INTO HOUSING. 3. ANY WIRE SPLICES TO BE MADE BY 2. ANY WIRE SPLICES TO BE MADE BY LISTED AND **MOUNTING OPTIONS** DIP SWITCHES 1-6: ADDRESS CONFIGURATION LISTED AND AHJ APPROVED METHODS. AHJ APPROVED METHODS. CLASS B SED. SET TO "OFF". OPTION 1 DESCRIPTION APPLICATIONS ONLY. A 4" (102mm) SQUARE BOX, 2-1/8" MINIMUM DEPTH WITH DOUBLE GANG COVER PLATE. BY OTHERS (102mm) SQUARE BOX, 2-1/8" MINIMUM DEPTH WITH SIMPLEX 4090-9801 TRIM BOX BY OTHERS, PLATES ORDERED NG OPTIONS PLATE FOR SEMI-FLUSH MOUNTED BOX BOX BY OTHERS, PLATES ORDERED (102mm) SQUARE BOX, 2-1/8" MINIMUM DEPTH WITH SIMPLEX 4090-9802 TRIM (38mm) EXTENSION RING - FLUSH MOUNTING BY OTHERS PLATE FOR SURFACE MOUNTED BOX FOR ADDITIONAL DETAILS SEE DATA SHEET 2088-0010 ON 1. FOR ADDITIONAL MOUNTING OPTIONS, DOWNLOAD DATA SHEET 4906-0003 FROM HTTP://WWW.SIMPLEX-FIRE.COM 1. FOR ADDITIONAL MOUNTING OPTIONS, DOWNLOAD DATA SHEET S4090-0014 FROM HTTP://WWW.SIMPLEX-FIRE.COM HTTP://WWW.SIMPLEX-FIRE.COM TYPICAL POINT TO POINT WIRING DIAGRAM



-4" (102mm) SQUARE BOX,

**MOUNTING OPTION "A"** 

MOUNTING OPTIONS

A 4" (102mm) SQUARE BOX, 1-1/2" (38mm) DEEP, WITH 1-1/2" (38mm) EXTENSION RING - FLUSH MOUNTING BY OTHERS

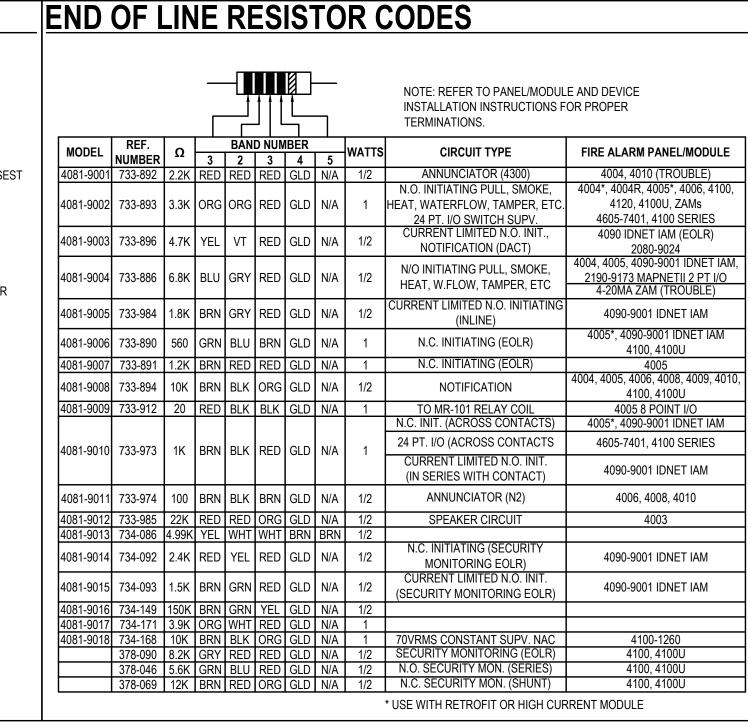
1. FOR ADDITIONAL MOUNTING OPTIONS, DOWNLOAD DATA SHEET 4902-0003 FROM HTTP://WWW.SIMPLEX-FIRE.COM

1-1/2" (38mm) DEEP, WITH

1-1/2" (38mm) EXTENSION RING

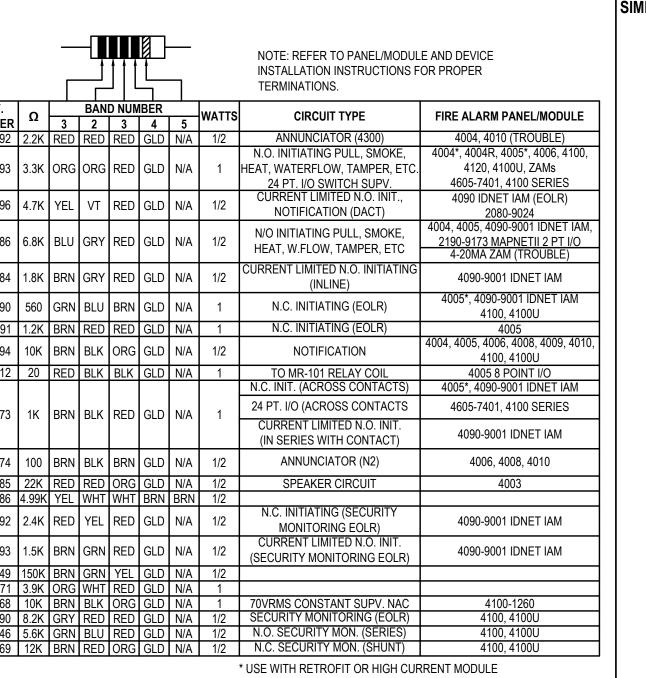
END OF LINE

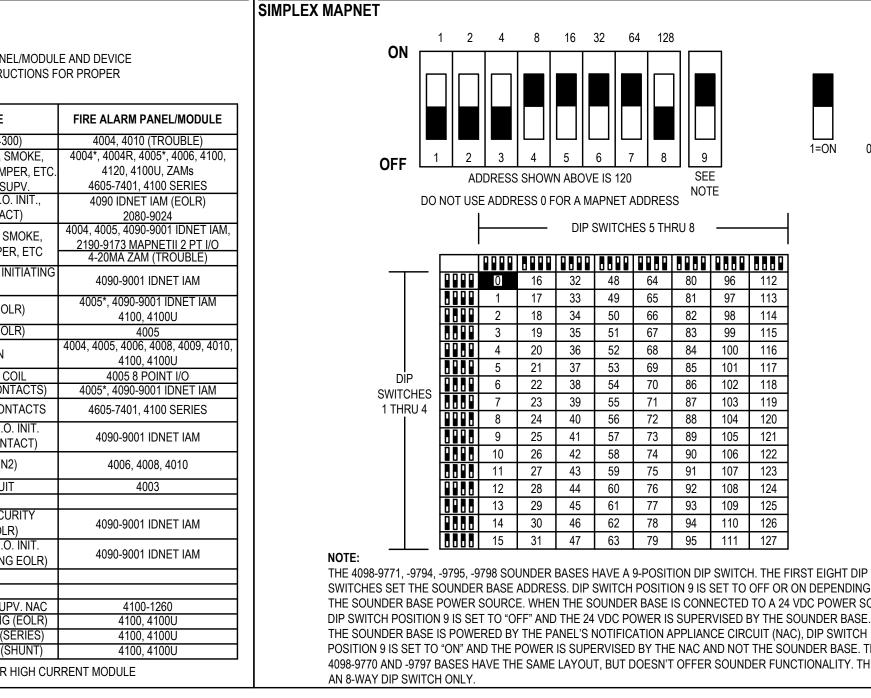
RESISTOR



True Alert CONVENTIONAL APPLIANCES

SIMPLEX 4906 SERIES CEILING MOUNTED SPEAKER / VISUAL





**IMPORTANT** 



**DIP SWITCH SETTINGS - INITIATING** 

1 2 4 8 16 32 64 128

ADDRESS SHOWN ABOVE IS 120

DO NOT USE ADDRESS 0 FOR A MAPNET ADDRESS

———— DIP SWITCHES 5 THRU 8 ————

**IRR** 14 30 46 62 78 94 110 126

**IRRR** 15 31 47 63 79 95 111 127

STANDARD SENSOR BASE

LCEILING MOUNTED SENSOR

#8-32 x 1-1/4" PANHEAD

(TIGHTEN TO 4-6 in.-lbs.)

A SINGLE GANG BOX, 2-1/8" (54mm) DEEP - FLUSH MOUNT

(102mm) SQUARE BOX, 1-1/2" DEEP (MIN)

SPDT CONTROL RELAY

SIMPLEX 2088-9008 / APOLLO AMERICA MR-101/C

W/SINGLÉ GANG COVER PLATE 3/4" (19mm) EXTENSION

MACHINE SCREW

B 4" (102mm) OCTAGONAL BOX, 1-1/2" (38mm) DEEP, MINIMUM - FLUSH MOUNT BY OTHERS

**MOUNTING OPTION "E** 

**MOUNTING OPTIONS** 

FOR ADDITIONAL MOUNTING OPTIONS, DOWNLOAD DATA SHEET 4098-0019 FROM HTTP://WWW.SIMPLEX-FIRE.COM

HEAT SENSORS NEVER HERE

WALL MOUNTED SENSOR

SIMPLEX 4098-9792

12"(305mm

TO TOP OF

SENSOR FINISHED WALL

**∠**#6-32 SCREW

OPTION 1 DESCRIPTION

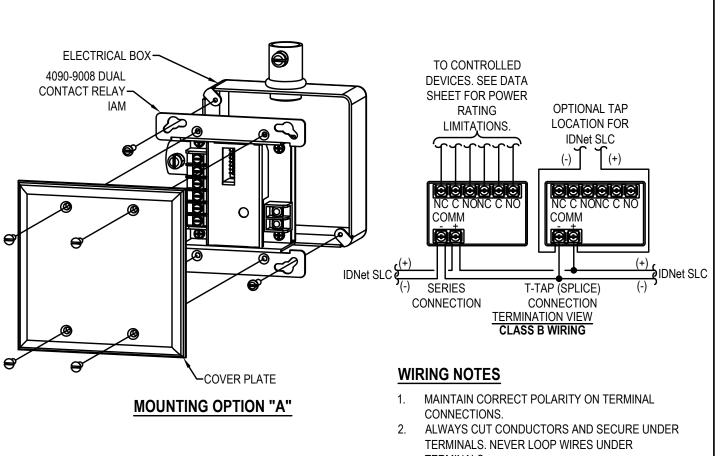
WITH WASHER

(NOT SUPPLIED)

MAXIMUM

1=ON

0=OFF



	IVICO		DIP SWITCHES 7-8: NOT USE
ACE 7 (RED) OR			MOUNTIN
	OPTION <sup>1</sup>	DESCRIPTION	
	Α	4" (102mm) SQUARE BOX, 1-	1/2" (38mm) DEEP, WITH 1-1/2"

OPTION <sup>1</sup>	DESCRIPTION	NOTE			
Α	SINGLE GANG BOX, 1-1/2" (64mm) DEEP	BY OTHERS. WHEN SURFACE			
В	. (	MOUNTING USE 4905-9937 (RED) OR			
С	2 GANG BOX, 1-1/2" (38mm) DEEP	4906-9940 (WHITE) SKIRT			
	SIMPLEX 2975-9145, 7-7/8"H x 5-1/8"W x 2-3/4"D (127mm x 98mm x 56mm) REQUIRES 4905-9931 PLATE	ORDERED SEPARATELY			
1. FOR ADDITIONAL MOUNTING OPTIONS, DOWNLOAD DATA SHEET 4906-0002 FROM HTTP://WWW.SIMPLEX-FIRE.COM					

**WIRING NOTES** 

CONNECTIONS.

TERMINALS.

AHJ APPROVED METHODS.

PLUG ACCESSIBLE

FROM REAR OF HOUSING

**MOUNTING OPTIONS** 

STANDARD ELECTRICAL

SURFACE MOUNT

ADAPTER SKIRT 1 5/8"

(41mm) DEEP. CONDUIT

CUTOUTS ARE PROVIDED ON ALL FOUR SIDES.

TERMINATION VIEW: REAR OF DEVICE

**CLASS B WIRING** 

MAINTAIN CORRECT POLARITY ON TERMINAL

TERMINALS. NEVER LOOP WIRES UNDER

BOX, 1-1/2" DEEP

SURFACE MOUNTING

BOX MOUNTING 4" SQUARE

True Alert CONVENTIONAL APPLIANCES

ELECTRICAL BOX

TOP OF LENS:

80" (2032mm) A.F.F. MINIMUM

►BOTTOM OF LENS:

**MOUNTING OPTION "B"** 

DO NOT BRING THE CONDUIT THROUGH

THE REAR OF THE ELECTRICAL BOX.

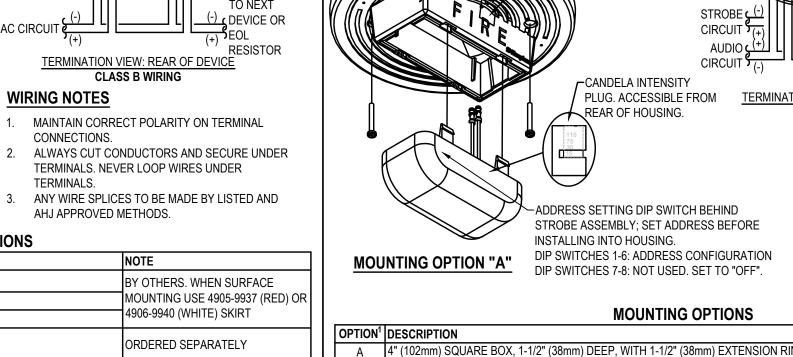
STRIP THE LEAD INSULATION TO 3/8" MAX.

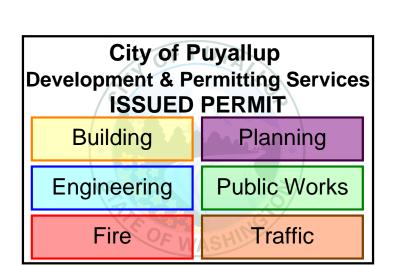
96" (2044mm) A.F.F MAXIMUM

<= 6" (150mm) FROM CEILING

FOR CEILINGS < 86" (2180mm) A.F.F.:

SIMPLEX 4906 SERIES WALL MOUNTED VISUAL





True Alert CONVENTIONAL APPLIANCES

SIMPLEX 4902-9721 WALL/CEILING MOUNTED SPEAKER

APPLIANCE-

DO NOT BRING THE CONDUIT THROUGH

THE REAR OF THE ELECTRICAL BOX.

STRIP THE LEAD INSULATION TO 3/8" MAX.

MAINTAIN CORRECT POLARITY ON TERMINAL

ALWAYS CUT CONDUCTORS AND SECURE UNDER

TERMINALS. NEVER LOOP WIRES UNDER TERMINALS.

ANY WIRE SPLICES TO BE MADE BY LISTED AND AHJ

WIRING NOTES

OPTION1 DESCRIPTION

CONNECTIONS.

APPROVED METHODS.

