

Installation Information

Series 745 FireLock® Fire-Pac

With Standard Panel or
Addressable Panel (Notifier® AFP-200)
1½ – 6-inch (40 – 150-mm) Sizes



1½ – 2-inch (40 – 50-mm) Sizes
(Standard Panel Shown)



2½ – 6-inch (65 – 150-mm) Sizes
(Standard Panel Shown)

WARNING



Failure to follow instructions and warnings could result in serious personal injury, property damage, and/or product damage.

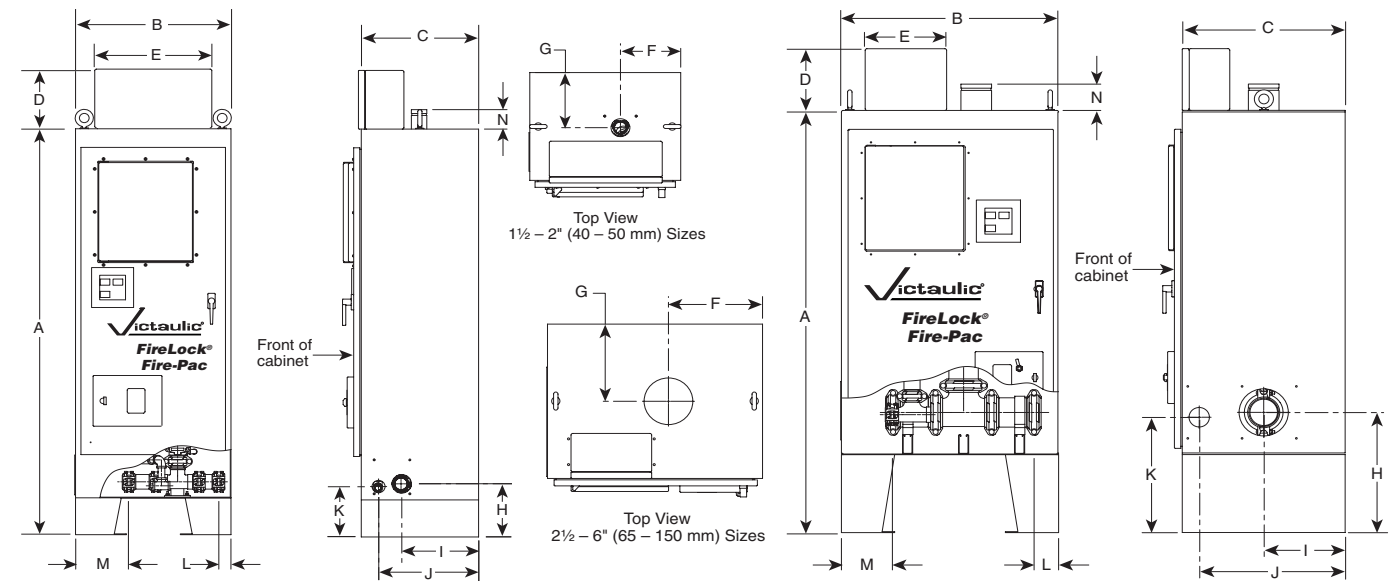
- Read and understand all instructions before attempting to install any Victaulic piping products.
- Depressurize and drain the piping system before attempting to install, remove, or adjust any Victaulic piping products.
- Wear hardhat, safety glasses, and foot protection.

If you need additional copies of any literature, or if you have any questions about the safe installation and operation of this product, contact Victaulic Company, P. O. Box 31, Easton, PA 18044-0031, USA, Telephone: 1-800-PICK-VIC, e-mail: pickvic@victaulic.com.



Series 745 FireLock® Fire-Pac

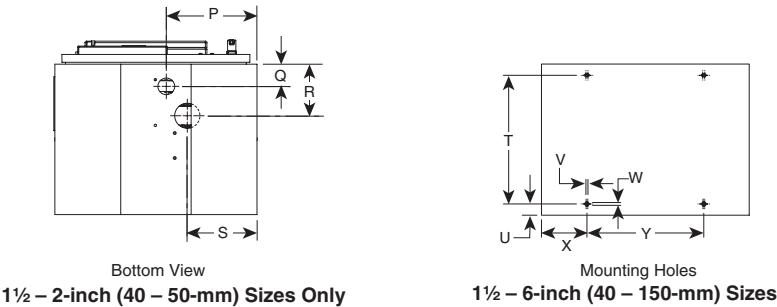
DIMENSIONS



1 1/2 – 2-inch (40 – 50-mm) Sizes

2 1/2 – 6-inch (65 – 150-mm) Sizes

Pipe Size		Dimensions inches/millimeters														Aprx. Wgt. Each lbs/kg
Nominal Dia. in/mm	Actual Outside Dia. in/mm	Height A	Width B	Depth C	D	E	F	G	H	I	J	K	L	M	N	
1 1/2 40	1.900 48,3	66.06 1678	24.06 611	18.07 459	9.50 241	18.00 457	9.60 244	9.23 234	8.60 218	11.53 293	15.40 391	8.16 207	2.52 64	8.66 220	1.90 48	350.0 158,8
2 50	2.375 60,3	66.06 1678	24.06 611	18.07 459	9.50 241	18.00 457	9.60 244	9.23 234	8.60 218	11.95 304	15.40 391	8.16 207	1.90 48	8.25 210	3.15 80	360.0 163,3
2 1/2 65	2.875 73,0	65.00 1651	32.00 813	24.00 610	9.50 241	12.00 305	14.00 356	12.00 305	18.50 470	12.00 305	21.50 546	17.75 451	2.62 67	6.67 169	5.27 134	516.0 234,1
3 80	3.500 88,9	65.00 1651	32.00 813	24.00 610	9.50 241	12.00 305	14.00 356	12.00 305	18.50 470	12.00 305	21.50 546	17.75 451	3.75 95	7.50 191	4.17 106	522.0 236,8
4 100	4.500 114,3	65.00 1651	32.00 813	24.00 610	9.50 241	12.00 305	14.00 356	12.00 305	18.50 470	12.00 305	21.50 546	17.75 451	3.60 91	7.60 193	4.05 103	720.0 326,6
6 150	6.625 168,3	65.00 1651	32.00 813	24.00 610	9.50 241	12.00 305	14.00 356	12.00 305	18.50 470	12.00 305	21.50 546	17.75 451	2.07 53	6.12 155	3.73 95	840.0 381,0

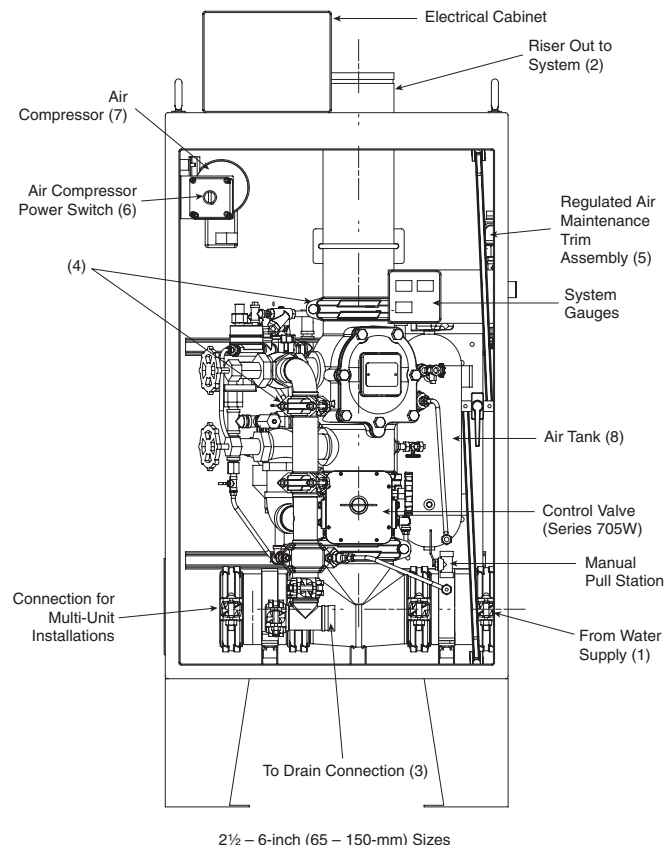
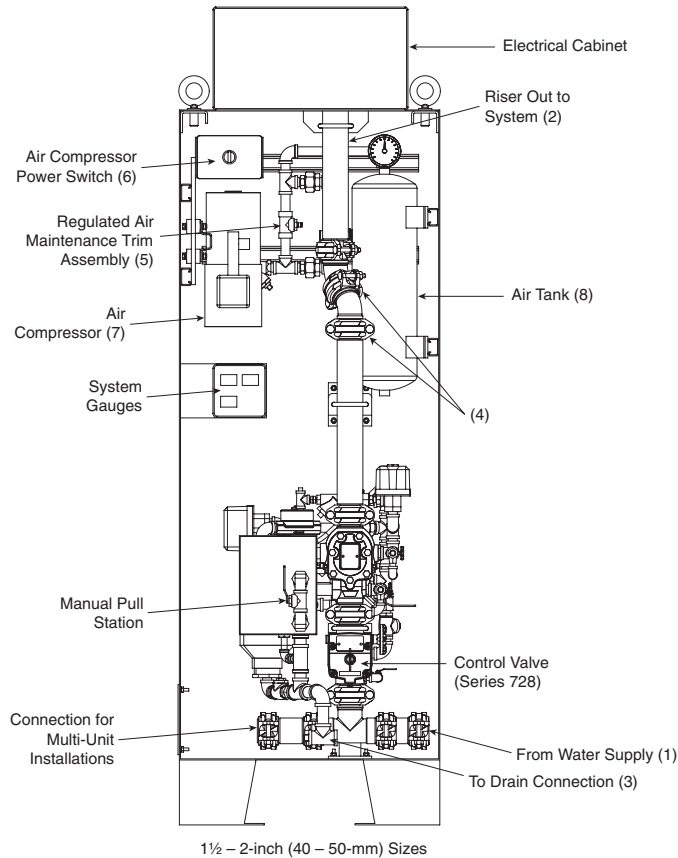


Bottom View
1 1/2 – 2-inch (40 – 50-mm) Sizes Only

Mounting Holes
1 1/2 – 6-inch (40 – 150-mm) Sizes

Pipe Size		Dimensions inches/millimeters									
Nominal Dia. in/mm	Actual Outside Dia. in/mm	P	Q	R	S	T	U	V	W	X	Y
1 1/2 – 2 40 – 50	1.900 – 2.375 48,3 – 60,3	10.79 274	2.63 67	6.19 157	8.29 211	14.00 356	2.00 51	0.312 8	0.438 11	6.81 173	10.50 267
2 1/2 – 6 65 – 150	2.875 – 6.625 73,0 – 168,3	–	–	–	–	20.00 508	1.75 45	0.312 8	0.438 11	7.00 178	18.00 457

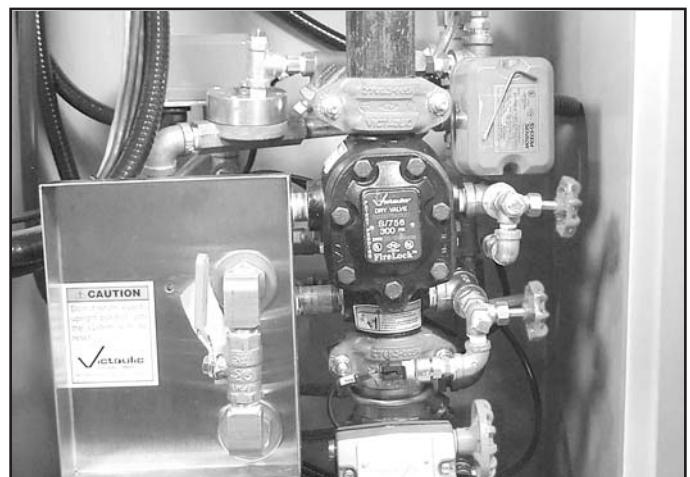
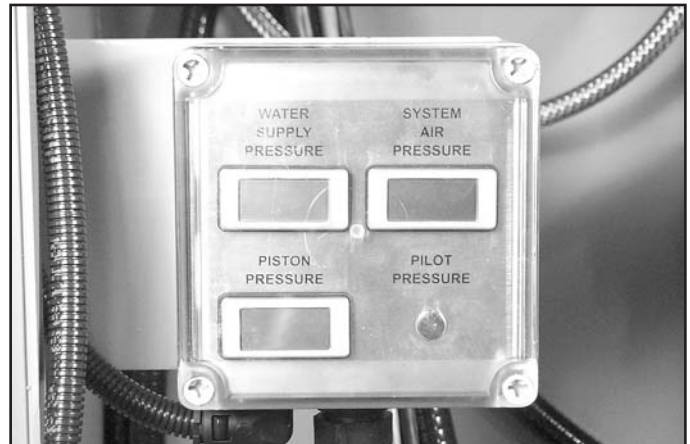
MECHANICAL CONNECTIONS



The only mechanical connections that need to be performed for the Victaulic FireLock Fire-Pac are the water supply's inlet, the system's outlet, and the drain connection. Refer to the Victaulic Field Installation Handbook (I-100), included in the cabinet, for proper coupling installation.

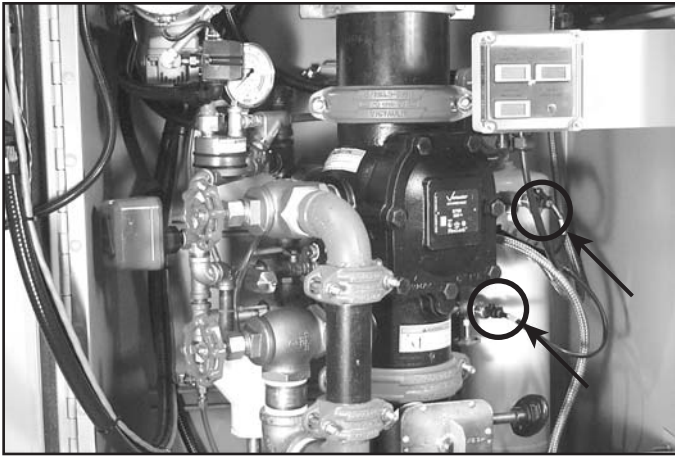
1. Standard grooved connections for the water supply can be made from either side of the cabinet. For 1 1/2 - 2-inch (40 - 50-mm) sizes, grooved connections can also be made from the bottom of the cabinet.
2. A standard grooved outlet to the sprinkler system is located in the top of the cabinet.
3. A standard grooved drain connection can be made from either side of the cabinet.
4. Internal connections to the sprinkler control valve are made with FireLock grooved pipe couplings and fittings.
5. Regulated Air Maintenance Trim Assembly
6. Air Compressor Switch
7. Air Compressor
8. Air Tank

SYSTEM GAUGES AND EMERGENCY RELEASE PANEL



The water supply pressure gauge, system air pressure gauge, piston pressure gauge, and the emergency release panel are located on front of the cabinet for proper system operation monitoring.

Series 745 FireLock® Fire-Pac



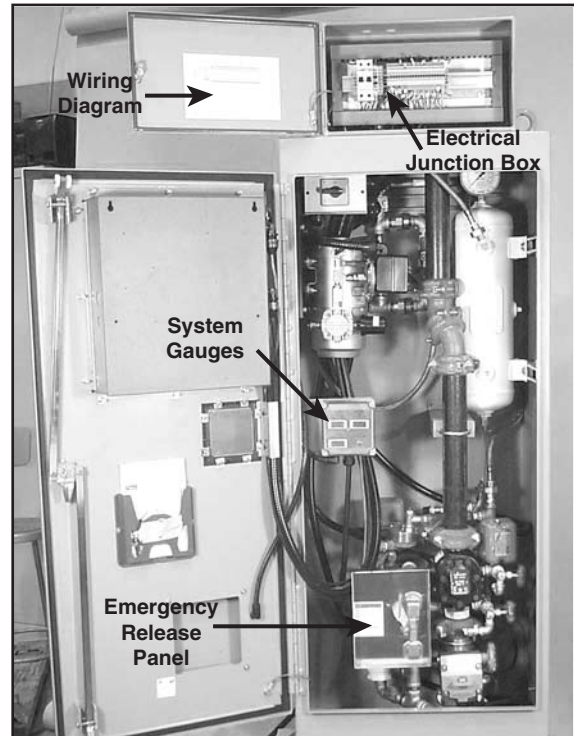
NOTE: This photo features a 6-inch (150-mm) valve. The piston supply line pressure transducer is not shown.

Fire-Pac cabinets contain digital gauges with pressure transducers that use ambient pressure to determine gauge pressure. Fire-Pac cabinets, with the exception of dry-pilot preaction valves, contain three pressure transducers. Dry-pilot preaction valves contain four pressure transducers. Refer to the list below for the locations of these pressure transducers.

- System Water Supply Pressure
- System Air Pressure
- Piston Supply Line Pressure
- Dry Pilot Line Pressure (Dry-pilot preaction valves only)

If the digital gauges are located in an area with unusual ambient pressure (i.e. above sea level), the pressure transducers must be disconnected then re-connected to adjust for this change.

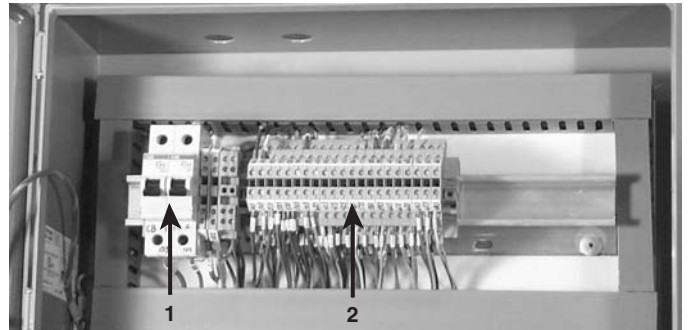
ELECTRICAL CONNECTIONS



NOTE: This photo features a 2-inch (50-mm) valve.

Refer to the sticker inside the electrical junction box and page 22 or 36 of this manual for the wiring diagram. This diagram shows the proper terminal blocks for all connections.

Refer to page 5 for a breakdown of components and wiring configurations.



All electrical connections are made in the NEMA 4 electrical enclosure located on top of the main cabinet; therefore, there is no need to perform any wiring in the release panel itself. The only electrical connections required are for the power supply and the detection system.

1. Separate circuit breakers are provided for the compressor and release panel, if equipped. The release panel is pre-wired to the system. **NOTE:** When the Fire-Pac contains a compressor, the compressor switch is wired as a supervisory circuit to prevent the system from being placed in service while the compressor is off.

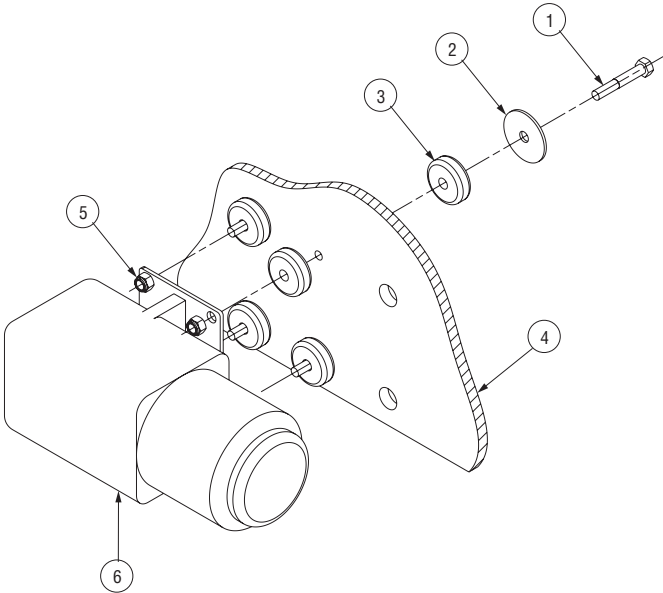
2. All supervisory and alarm connections are pre-wired to the terminal blocks located in the electrical junction box. Refer to the sticker inside the electrical junction box and page 22 or 36 of this manual for the wiring diagram.

PLACING THE SYSTEM IN SERVICE

To place the system in service, follow the setup procedures in the installation, maintenance, and testing manual provided with the cabinet.

REMOVING THE COMPRESSOR

If the compressor needs to be removed from the cabinet, perform the following steps:

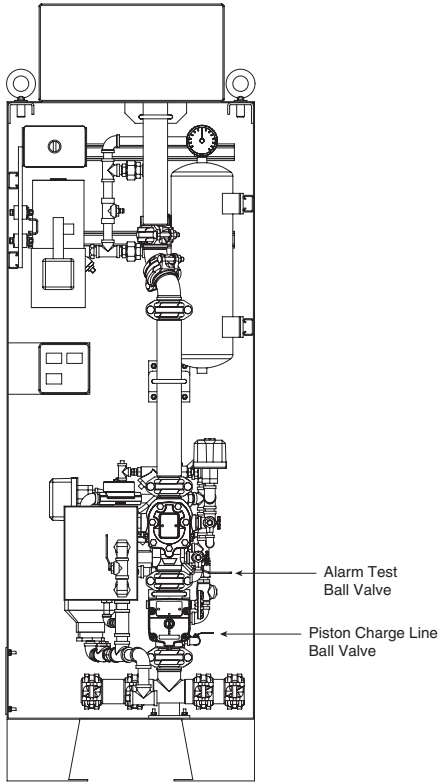


ITEM	DESCRIPTION	QTY.
1	Bolt	4
2	Washer	4
3	Vibration Isolation Mount	8
4	Mounting Plate	1
5	Lock Nut	4
6	Compressor	1

1. Unplug the compressor's electrical cord (located on the plate above the compressor).
2. Disconnect the flexible hose at the compressor.
3. Loosen and remove the four nuts (Item 5 above) from the compressor.
4. Remove the four bolts/washers (Items 1 & 2), the eight vibration isolation mounts (Item 3), and the compressor (Item 6) from the mounting plate (Item 4).
5. Replace the compressor by re-installing the hardware, as shown in the drawing above.

TESTING THE SYSTEM

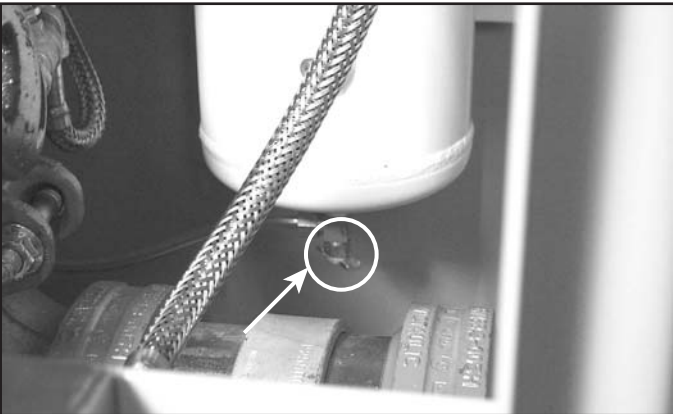
To test the fire protection system, follow the testing requirement section in the installation, maintenance, and testing manual provided with the cabinet.



NOTE: For 1½ – 2-inch (40 – 50-mm) sizes, the alarm test ball valve is located on the right side of the trim, as shown in the drawing above.

INSPECTION AND MAINTENANCE

1. For required inspection procedures, refer to the installation, maintenance, and testing manual provided with the cabinet.
2. To perform maintenance on any internal valve components (replacing clapper assembly, cover plate gasket, etc.), refer to the installation, maintenance, and testing manual provided with the cabinet.



3. Bleed the valve, located at the bottom of the air tank, once every three months to remove any moisture from the line.

Series 745 FireLock® Fire-Pac

STANDARD COMPONENTS LIST AND WIRING CONFIGURATIONS

VALVE TYPE	VALVE SETUP	STANDARD COMPONENTS INCLUDED	STANDARD COMPONENTS' WIRING CONFIGURATION
Series 756 Dry Valve	Dry Actuated	756	N/A
		753A	N/A
		PS40-2	Supervisory
		PS10-2	Alarm
		728 or 705W	Supervisory
	With Accelerator	746	N/A
		756	N/A
		753A	N/A
		PS40-2	Supervisory
		PS10-2	Alarm
		728 or 705W	Supervisory
Series 758 Deluge Valve	Dry	758	N/A
		753A	N/A
		PS40-2	Supervisory
		PS10-2	Alarm
		728 or 705W	Supervisory
	Electric	758	N/A
		Solenoid	N/A
		PS10-2	Alarm
		728 or 705W	Supervisory
Series 758 Preaction Valve	Single Electric	758	N/A
		Solenoid	N/A
		PS40-2	Supervisory
		PS10-2	Alarm
		728 or 705W	Supervisory
	Double Electric	758	N/A
		Solenoid	N/A
		PS40-2	Supervisory
		PS10-2	Alarm
		728 or 705W	Supervisory
	Pneumatic Electric/Electric	758	N/A
		Solenoid	N/A
		PS40-2	Supervisory + Initiating Zone 2
		PS10-2	Alarm
		728 or 705W	Supervisory
	Pneumatic/Electric	758	N/A
		776 LPA	N/A
		Solenoid	N/A
		PS40-2	Supervisory Preset for 776
		PS10-2	Alarm
		728 or 705W	Supervisory

OPTIONAL COMPONENTS LIST AND WIRING CONFIGURATIONS

VALVE TYPE	VALVE SETUP	OPTIONAL COMPONENTS	OPTIONAL COMPONENTS' WIRING CONFIGURATION
Series 756 Dry Valve	Dry Actuated	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
	With Accelerator	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
Series 758 Deluge Valve	Dry	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
	Electric	Additional 728 or 705W*	Supervisory
		PDRP-1001 Panel	AC
Series 758 Preaction Valve	Single Electric	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
		Release Panel	AC
	Double Electric	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
		Release Panel	AC + Cross Zoned
	Pneumatic Electric/Electric	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
		Release Panel	AC + Cross Zoned
	Pneumatic/Electric	Tank	N/A
		Air Maintenance Device	N/A
		Additional 728 or 705W*	Supervisory
		Compressor	AC + Supervisory
		Release Panel	AC

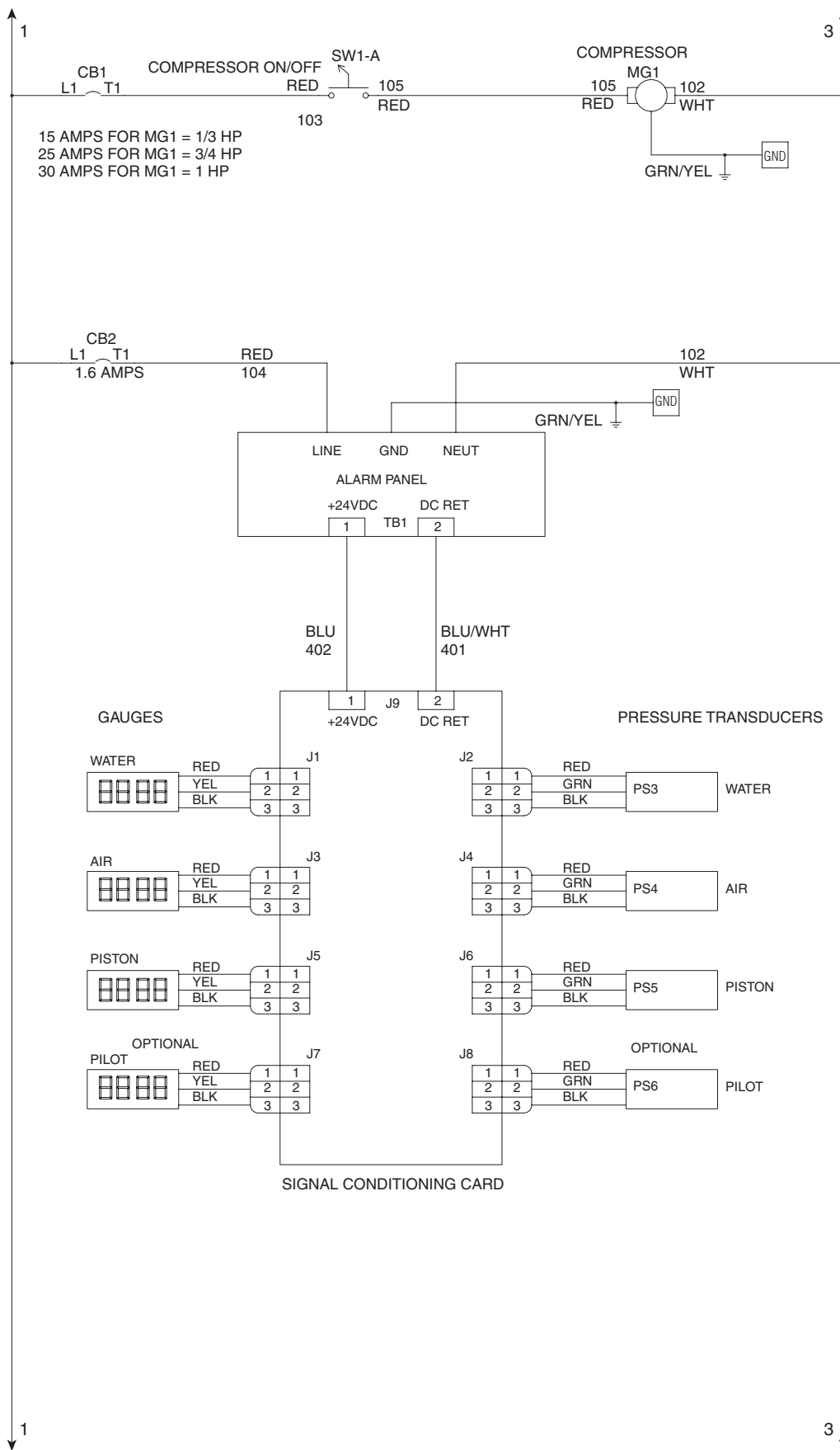
*The additional 728 or 705W would be installed above the valve.

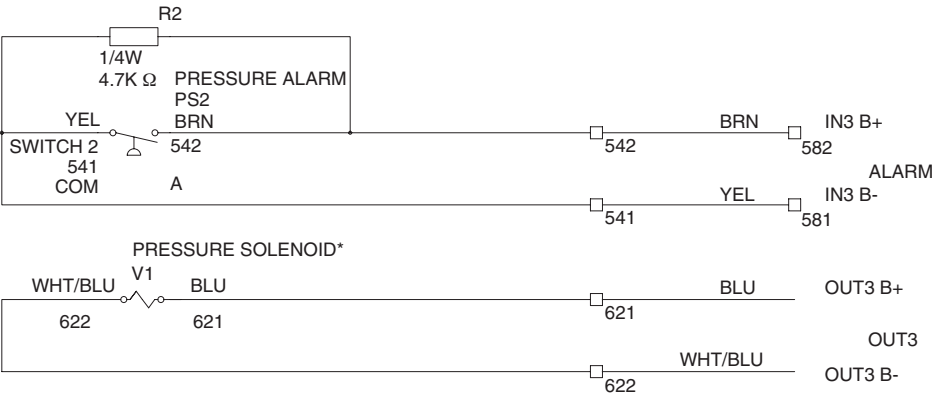
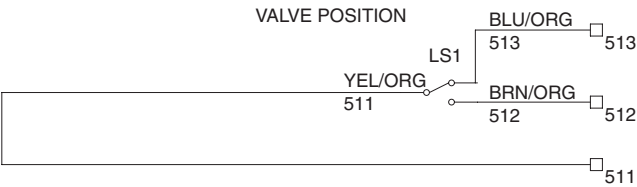
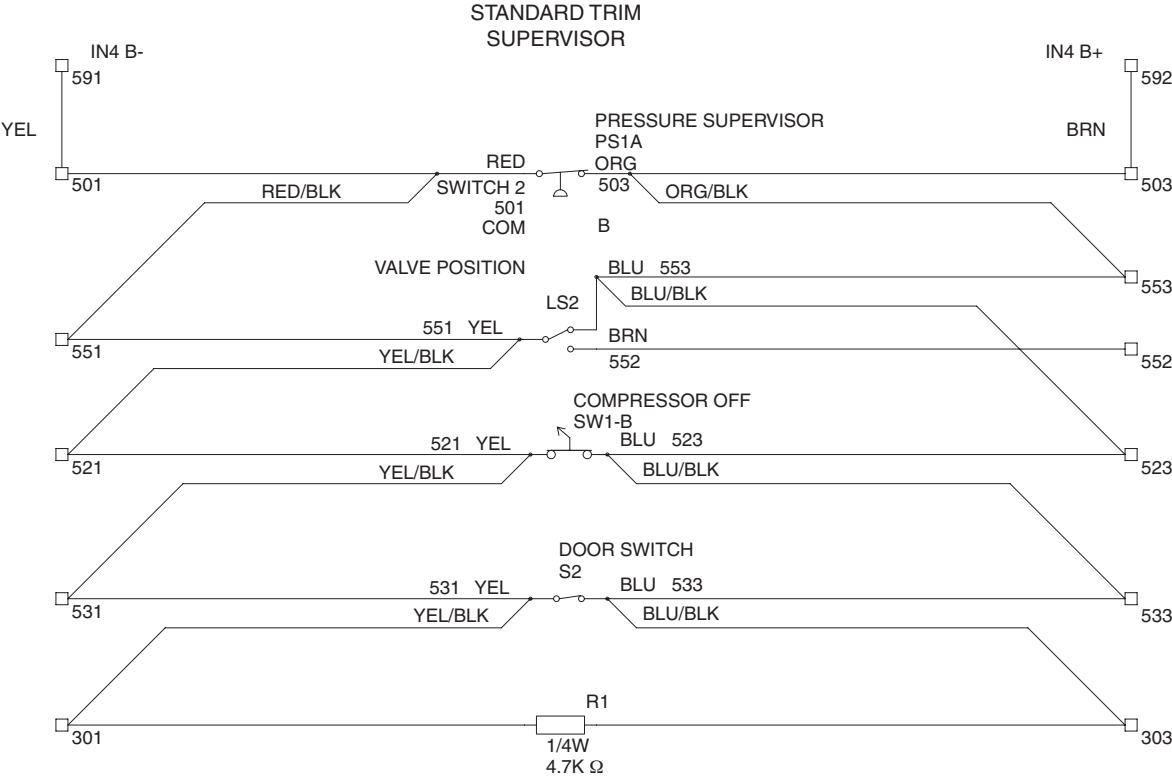
NOTE: AC is provided as 110/220 volts at 60 Hertz. In addition, 220-volts at 50-Hertz wiring is available by special order only.

**ELECTRICAL DIAGRAMS FOR
STANDARD PANEL (PDRP-1001)**



Series 745 FireLock® Fire-Pac



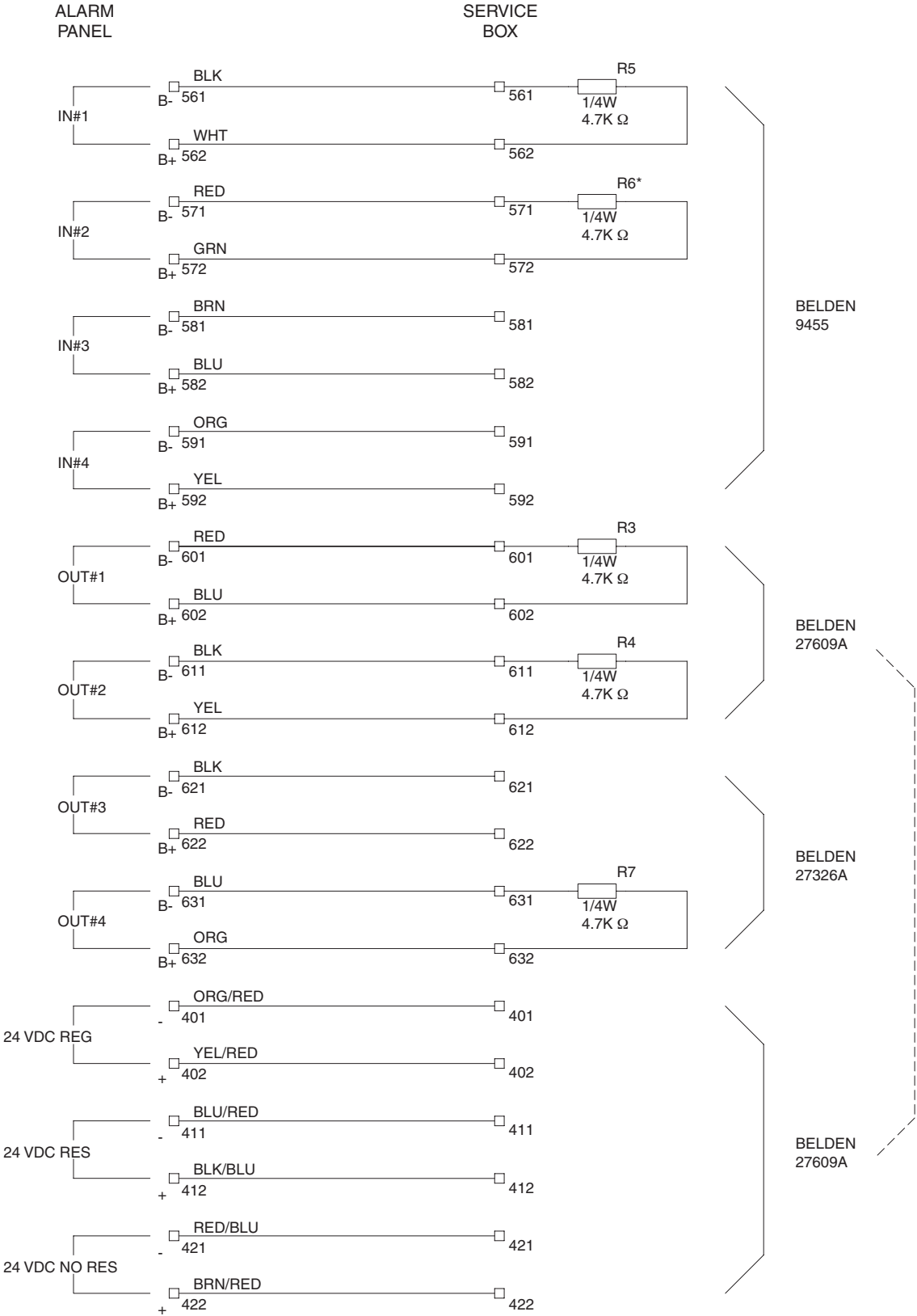


ALARM
#EPS10-2

SUPERVISOR
#EPS40-2

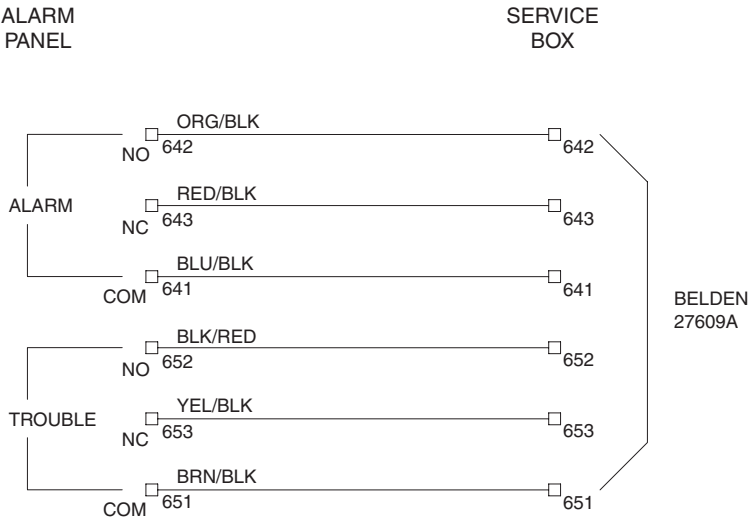
*V1 OPTIONAL. REPLACE WITH
4.7K RESISTOR IF NOT USED

Series 745 FireLock® Fire-Pac

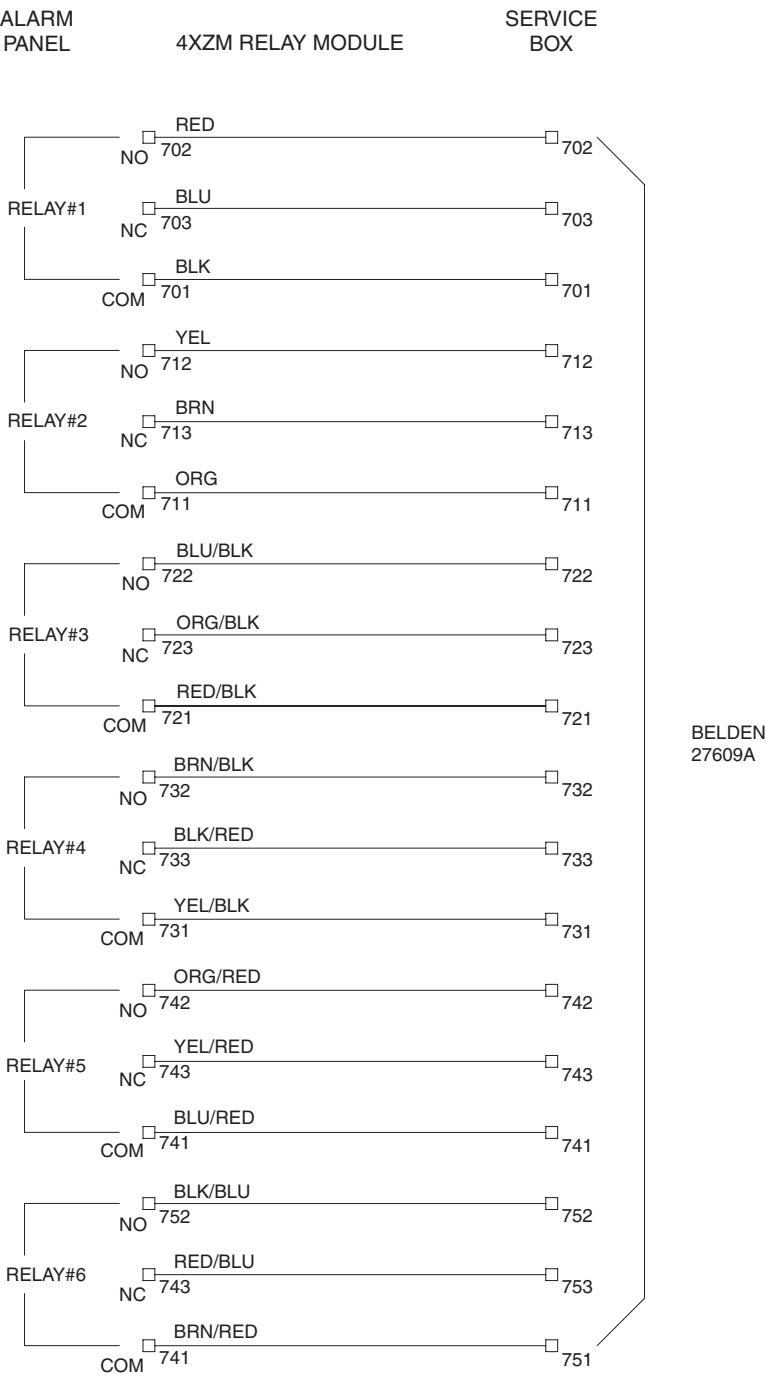


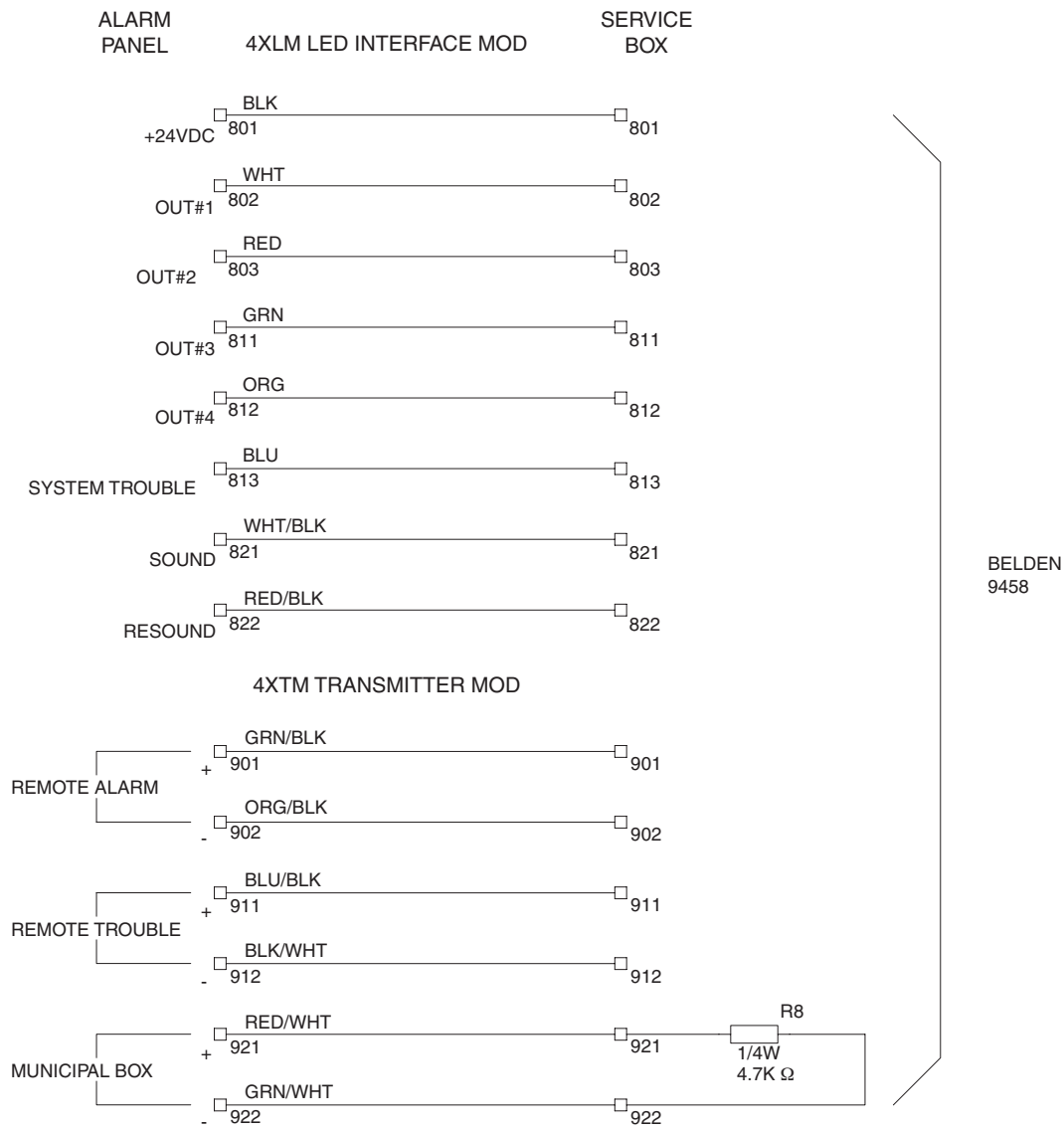
*R6 OPTIONAL. RELOCATE TO PS1
IF LOW PRESSURE TRIP IS USED

Series 745 FireLock® Fire-Pac



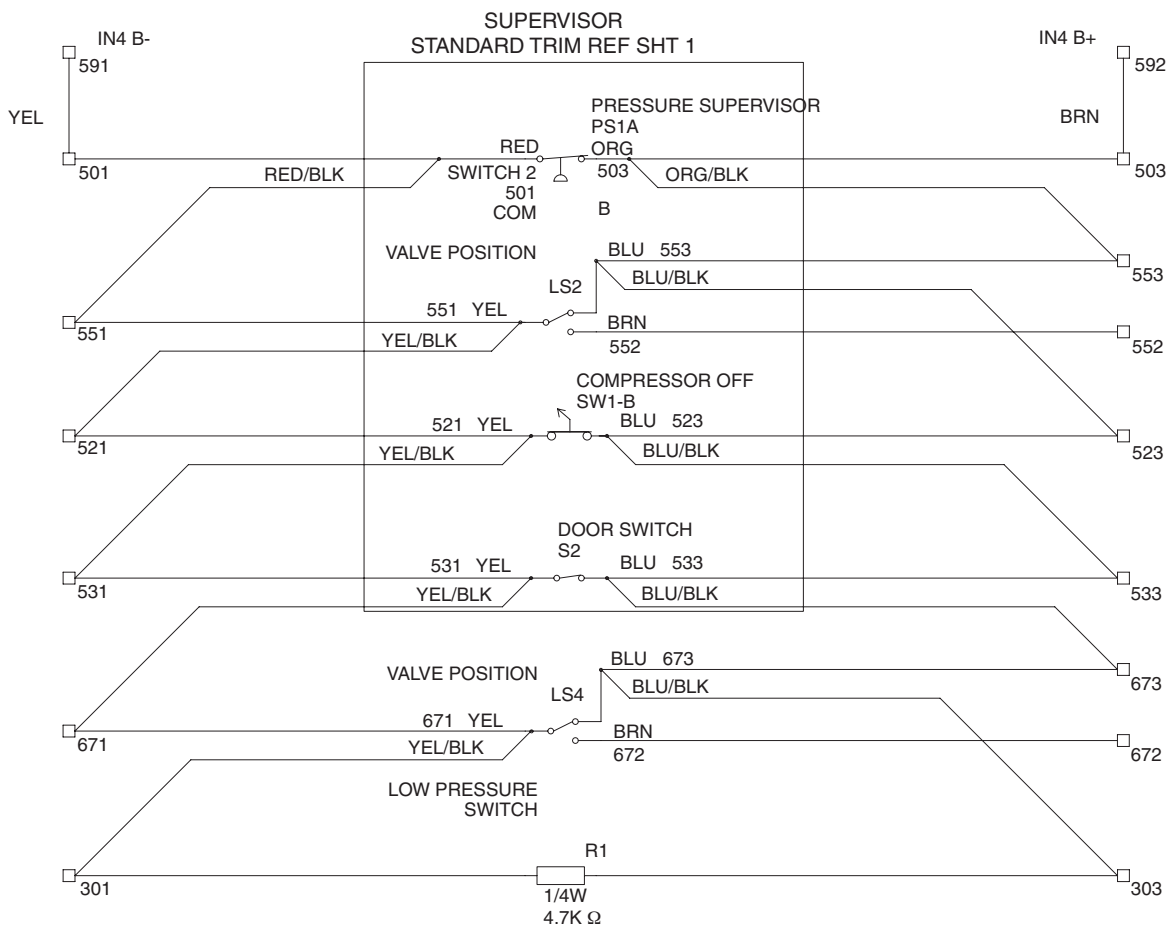
Series 745 FireLock® Fire-Pac



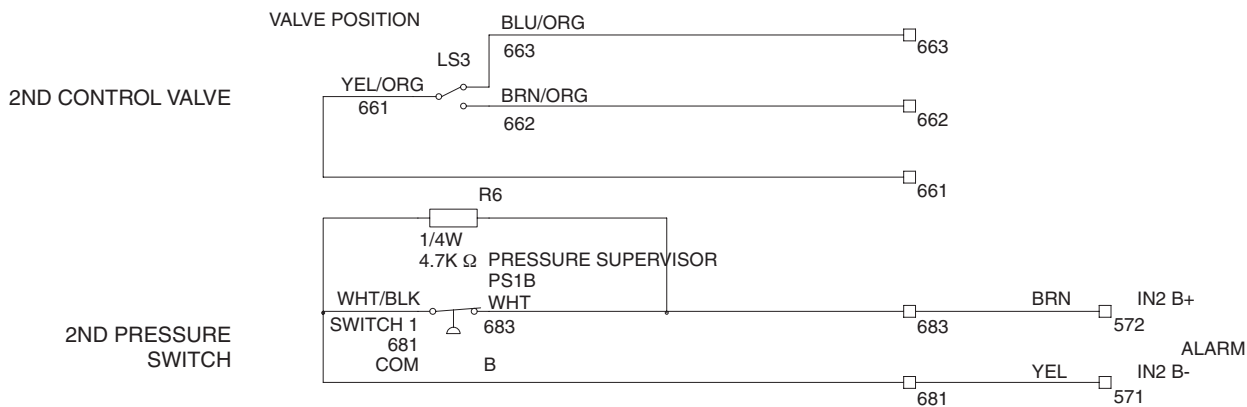


Series 745 FireLock® Fire-Pac

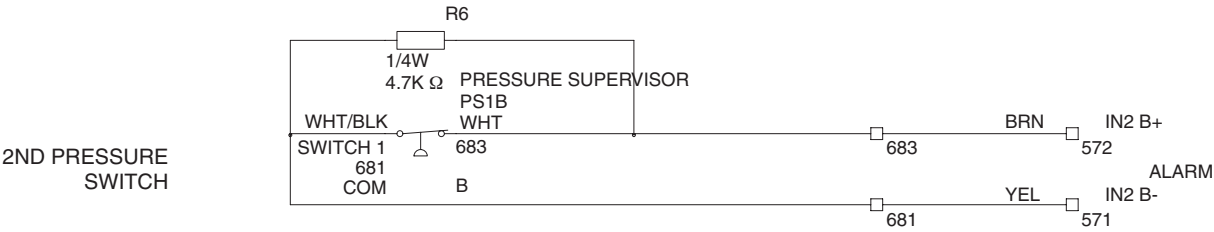
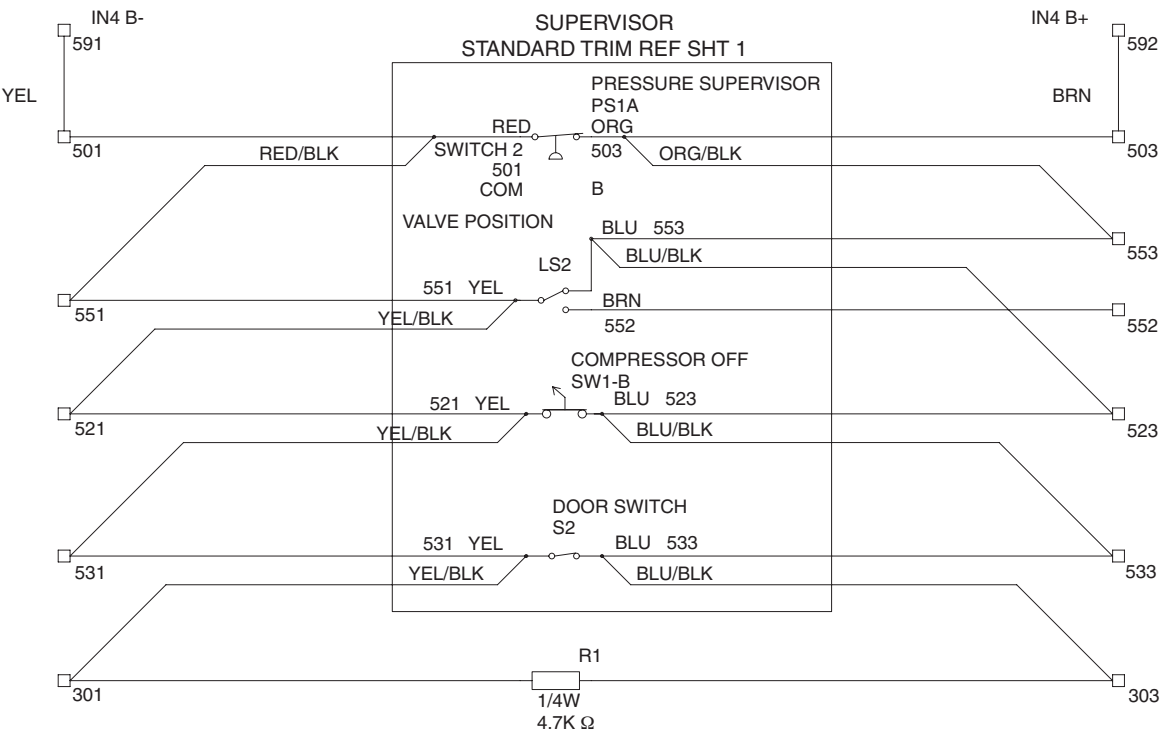
OPTIONS



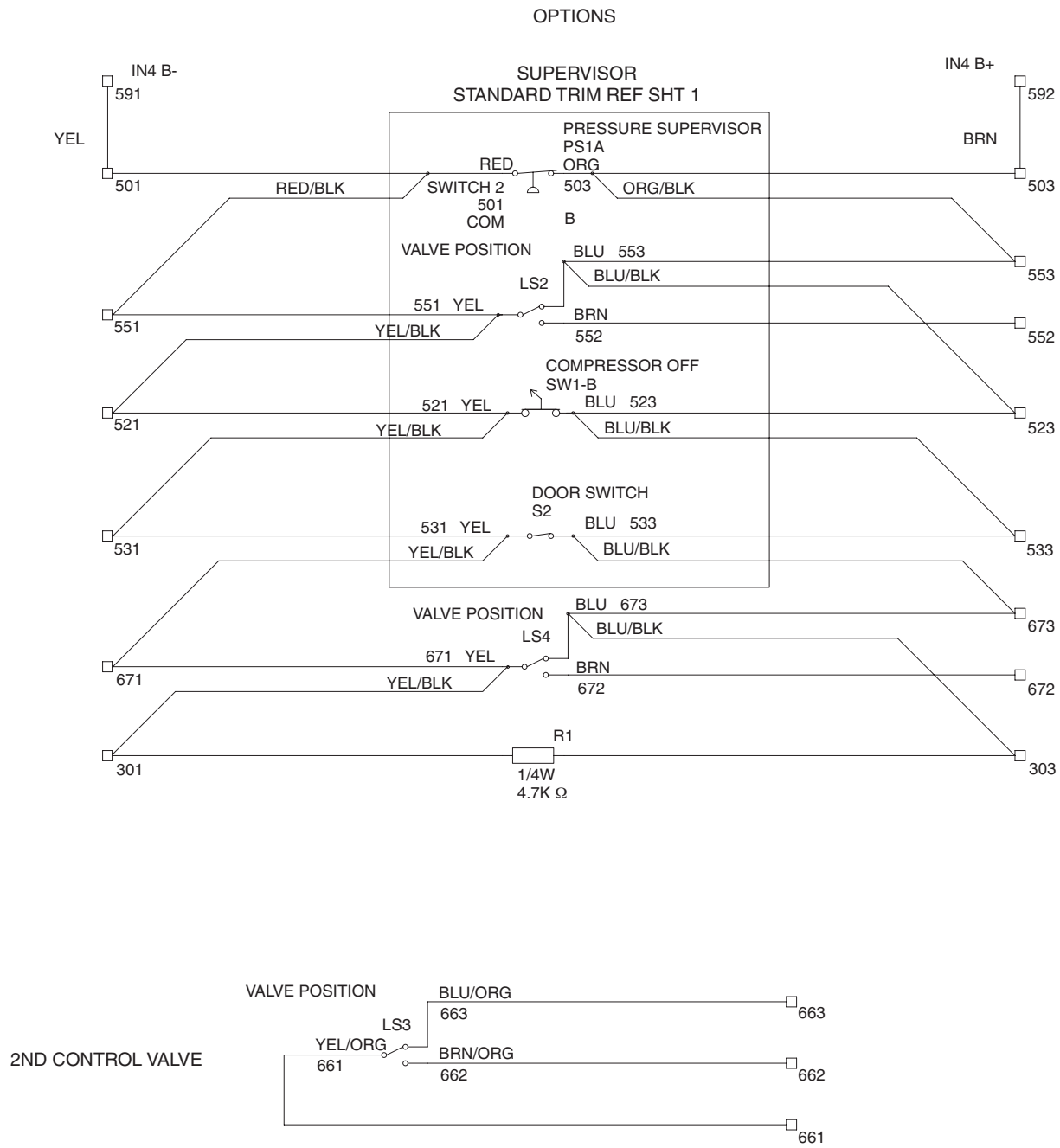
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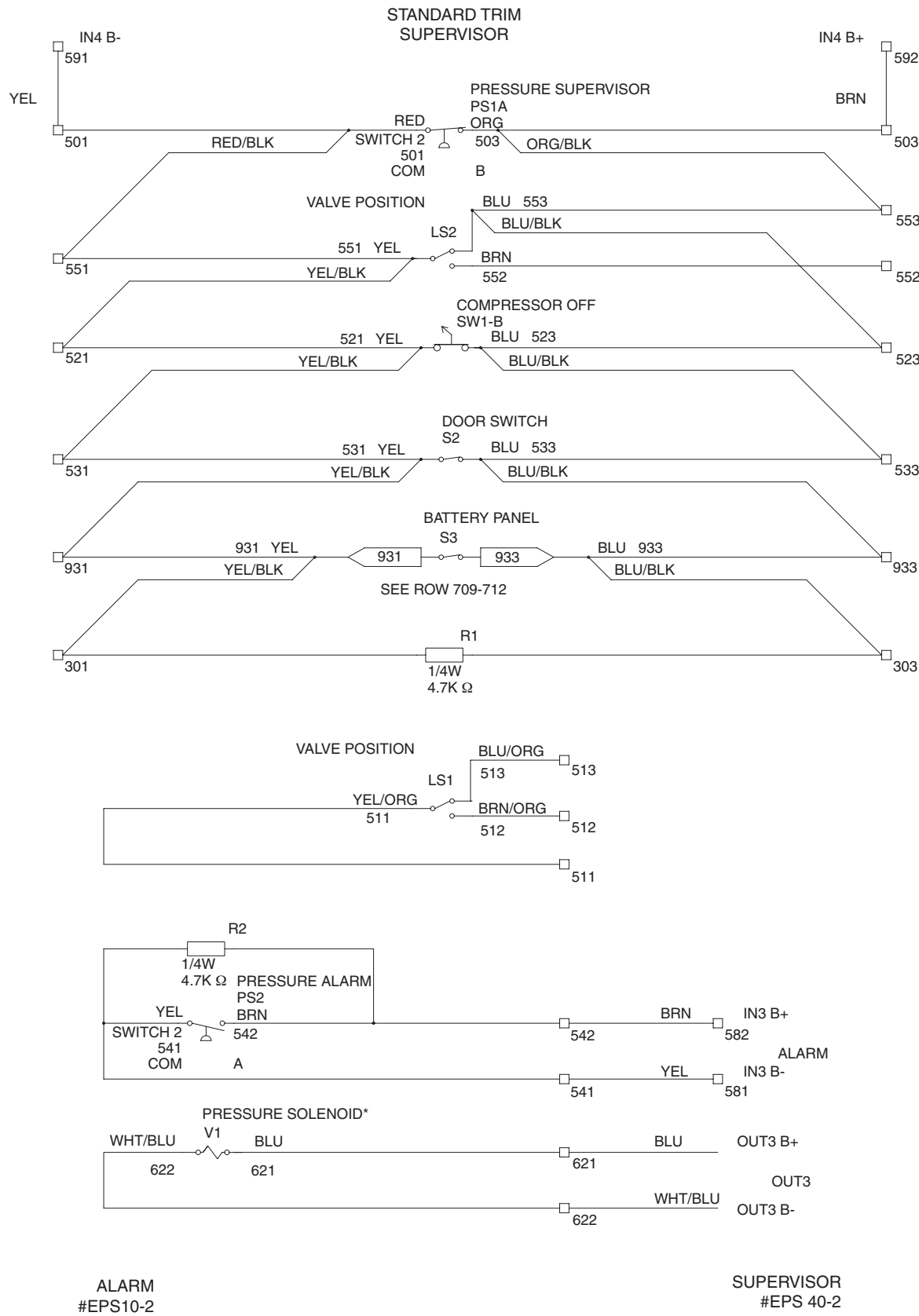
OPTIONS



Series 745 FireLock® Fire-Pac

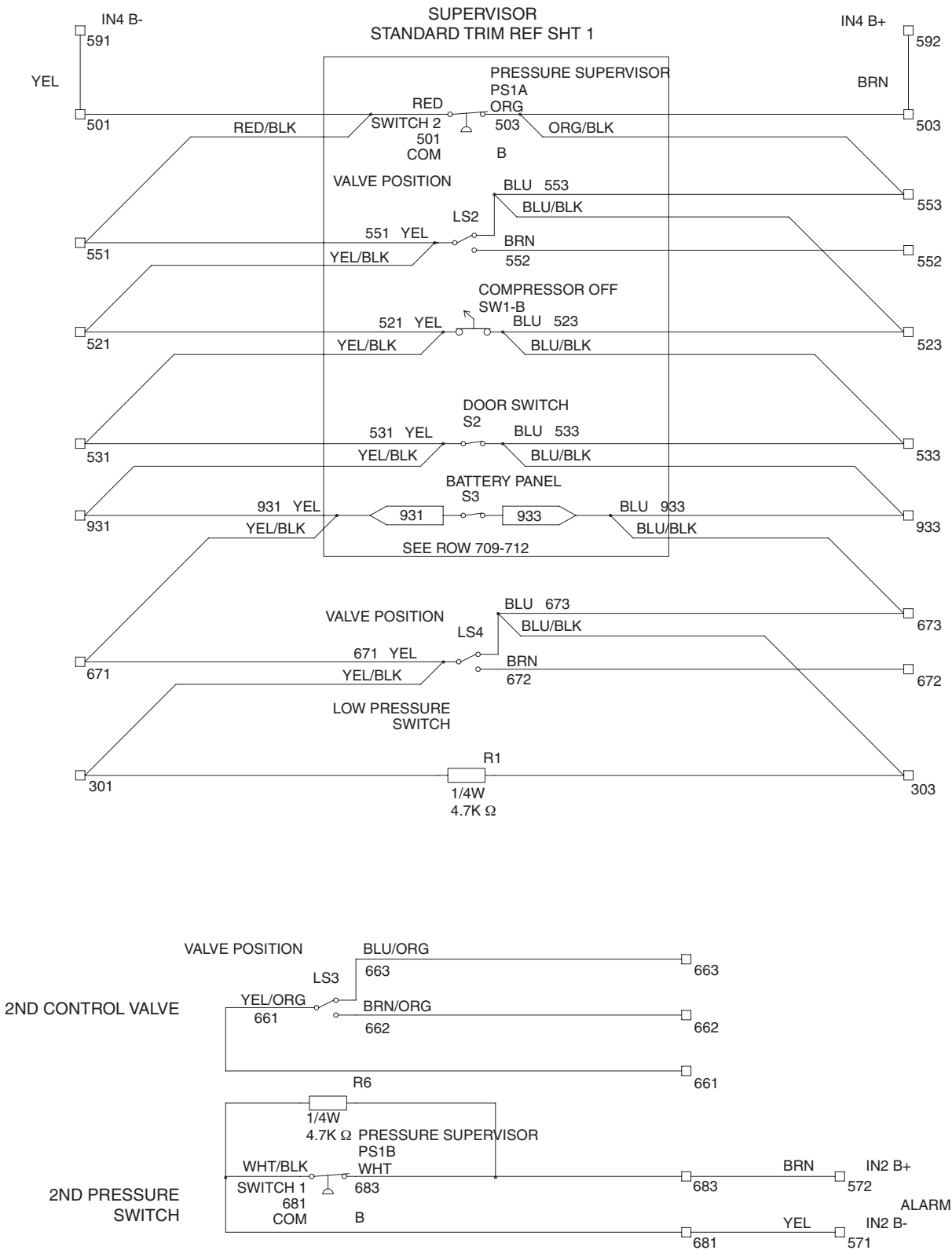


Series 745 FireLock® Fire-Pac



*V1 OPTIONAL. REPLACE WITH 4.7K RESISTOR IF NOT USED.

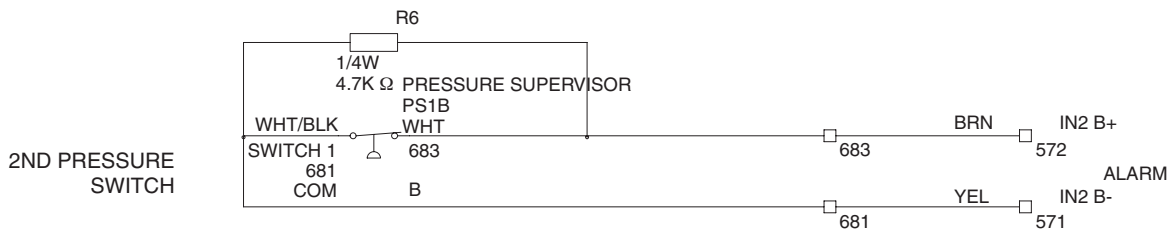
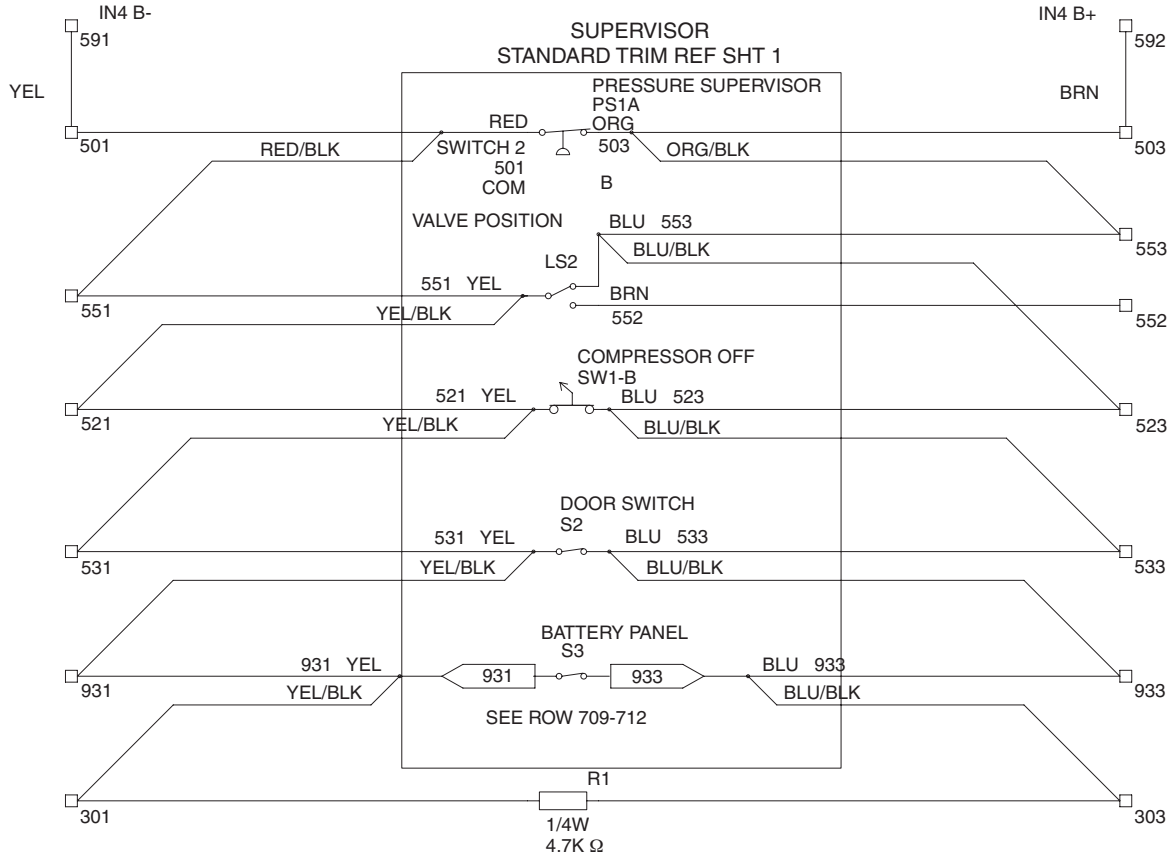
OPTIONS



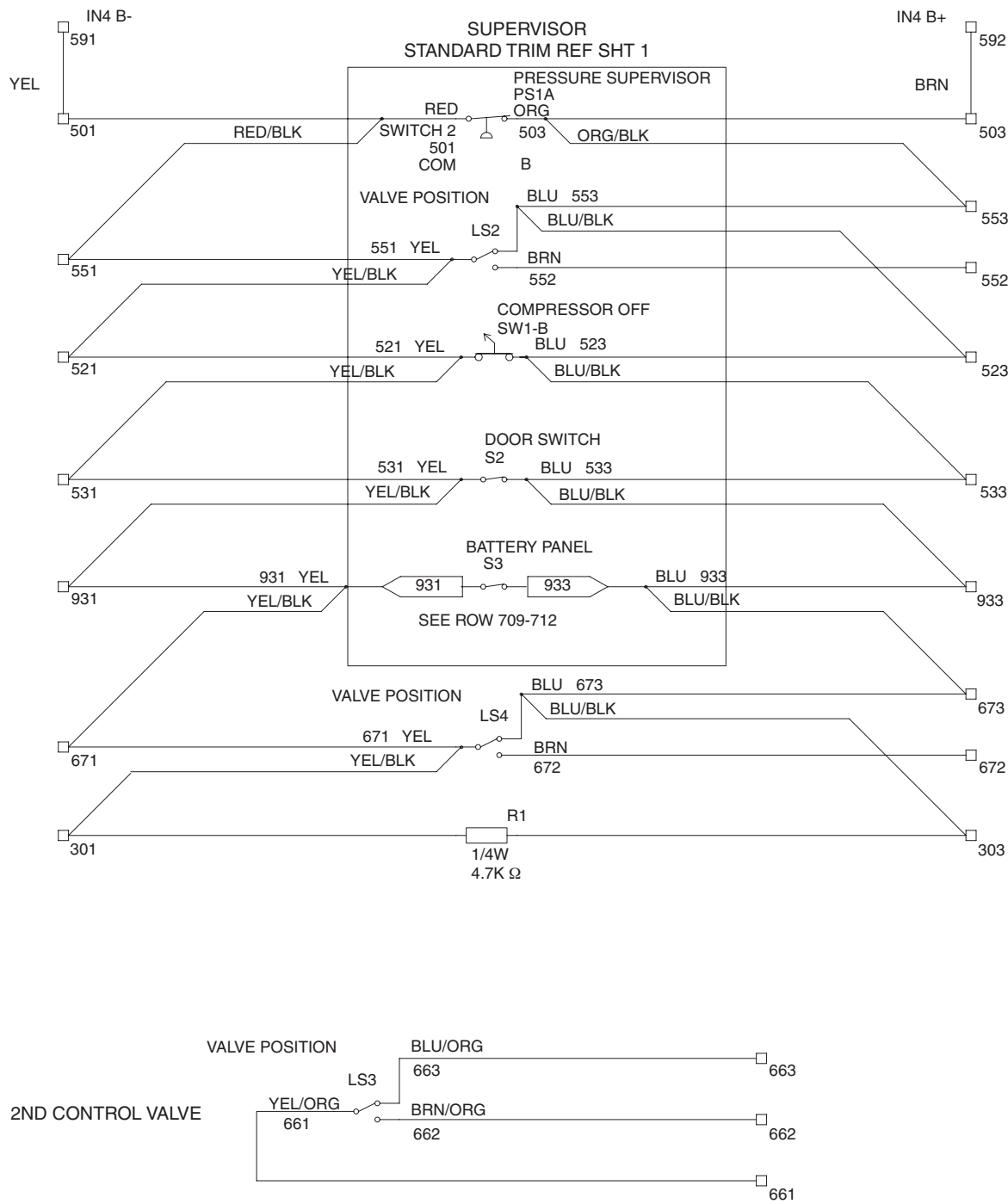
Series 745 FireLock® Fire-Pac

OPTIONS

STANDARD TRIM

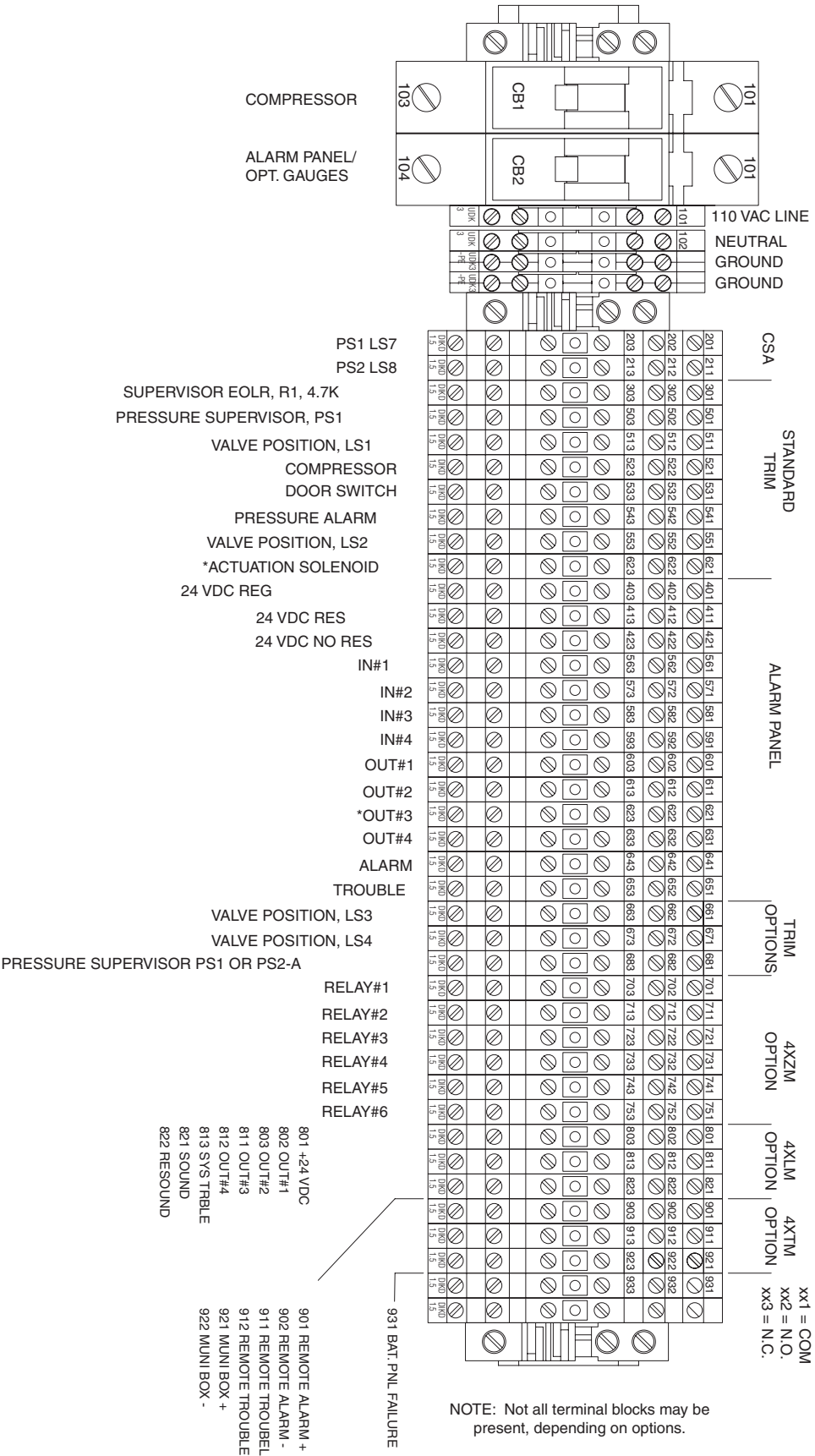


OPTIONS



Series 745 FireLock® Fire-Pac

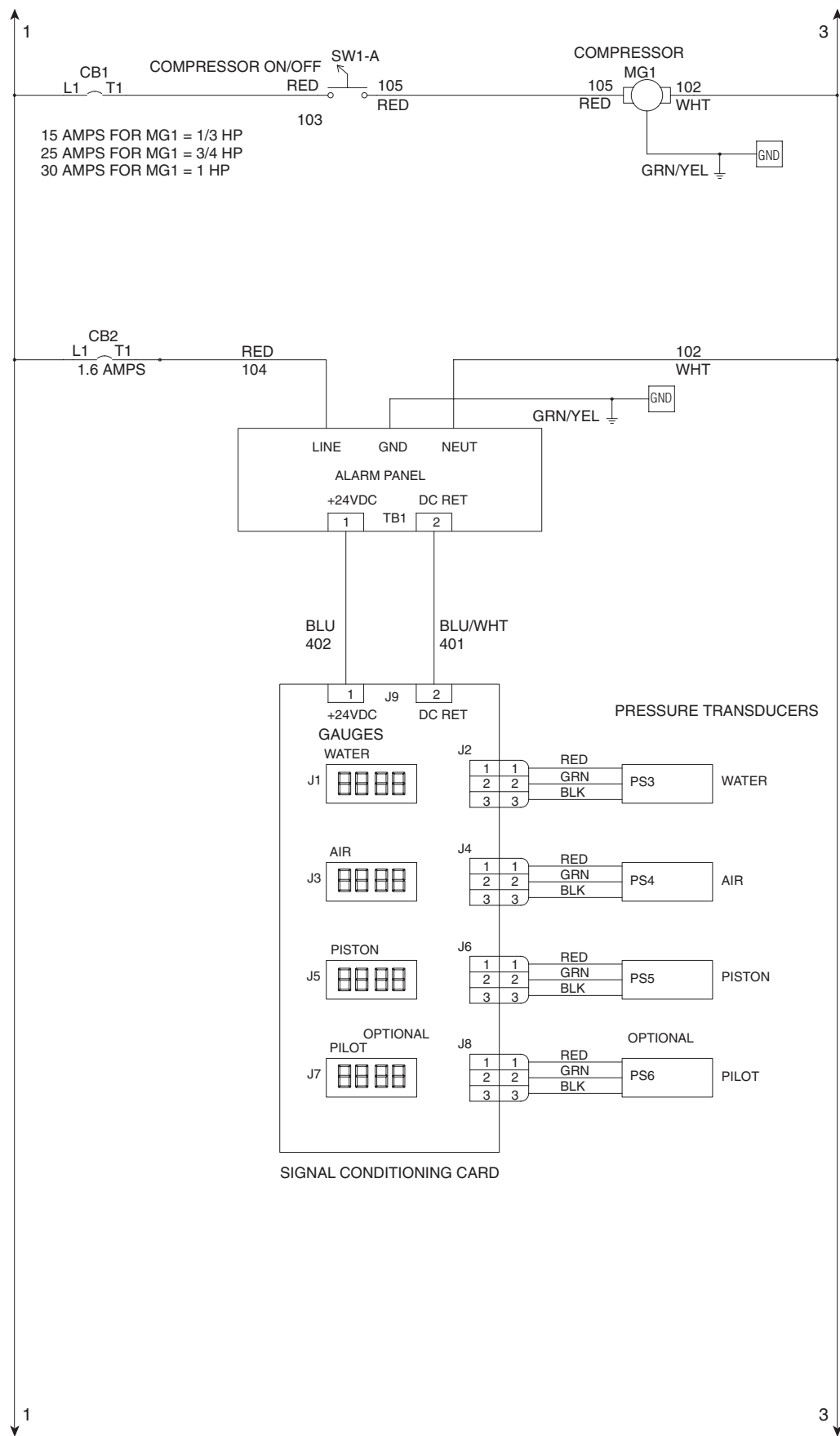
ELECTRICAL JUNCTION BOX WIRING DIAGRAM FOR STANDARD PANEL



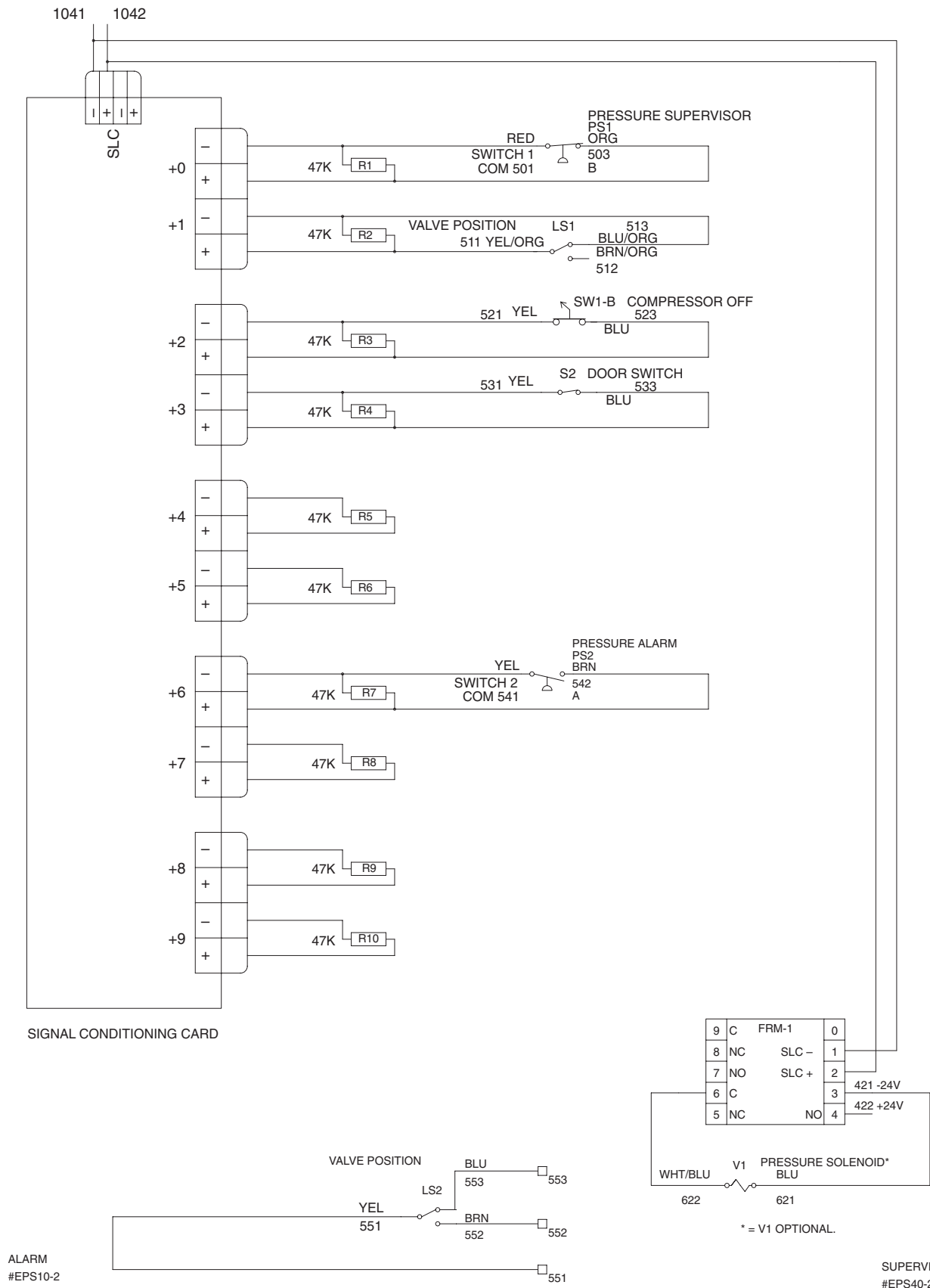
**ELECTRICAL DIAGRAMS FOR
ADDRESSABLE PANEL
(NOTIFIER® AFP-200)**



Series 745 FireLock® Fire-Pac
STYLE 4, STYLE 6, AND STYLE 7



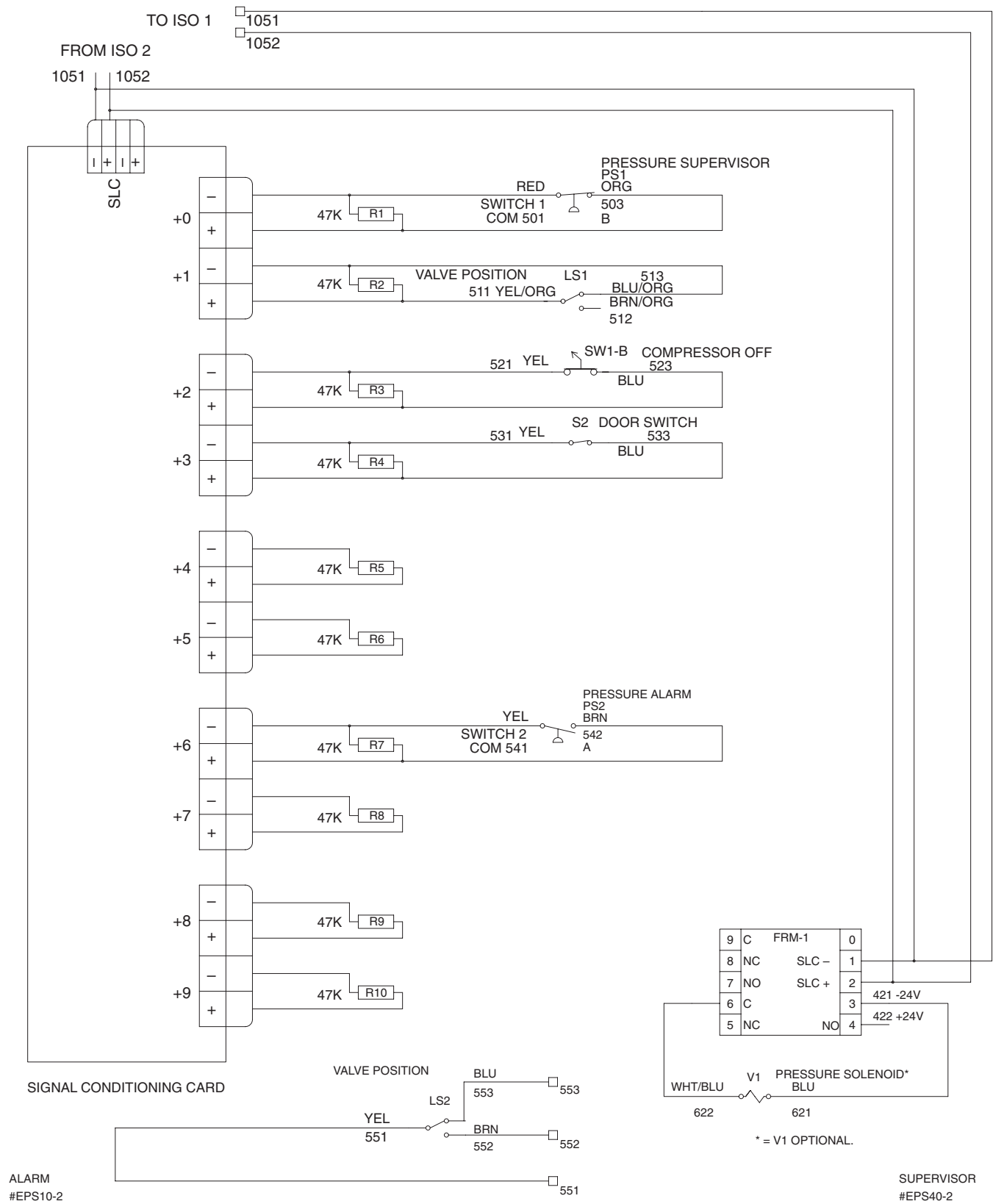
STYLE 4



Drawings continued on page 28

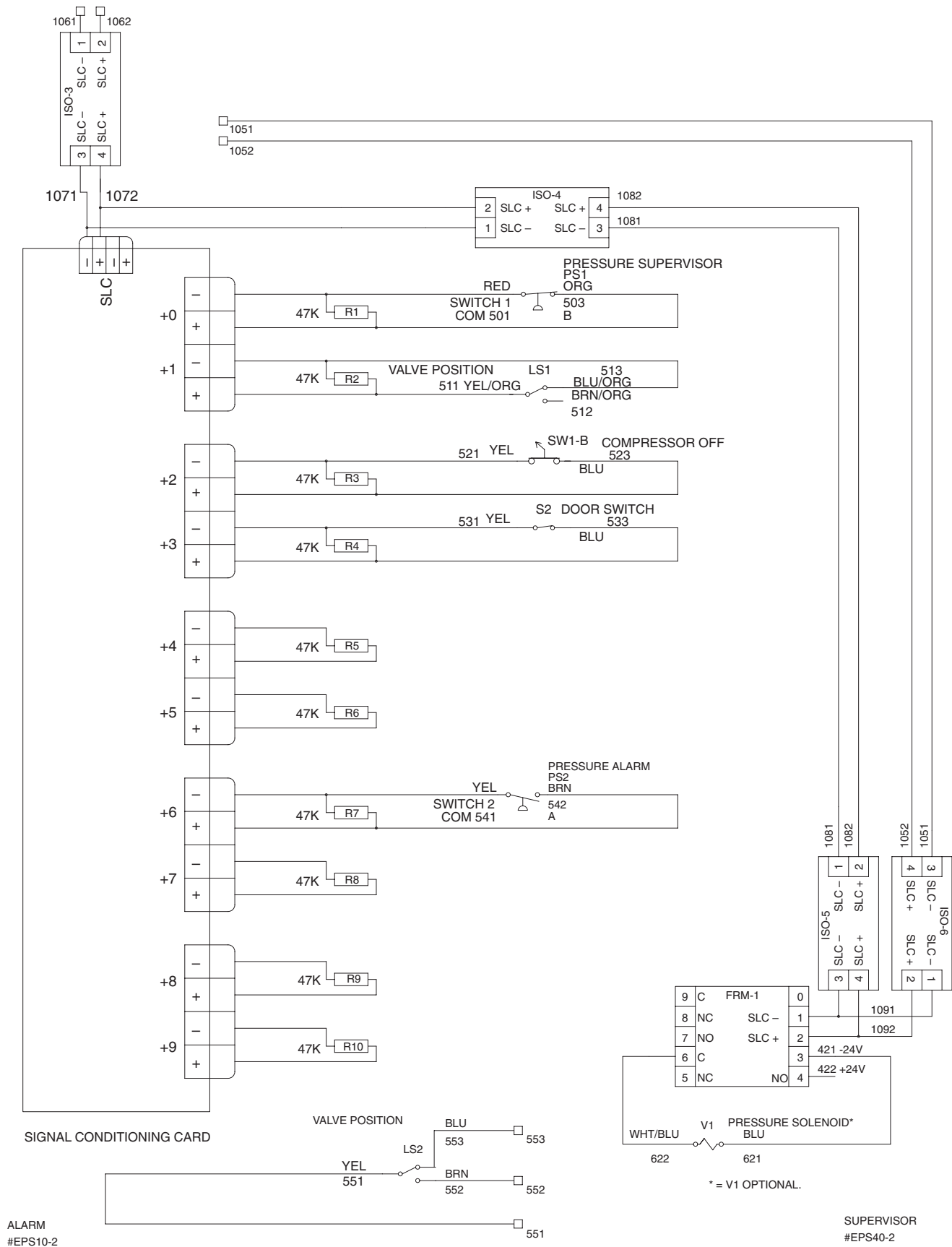
Series 745 FireLock® Fire-Pac

STYLE 6



Drawings continued on page 28

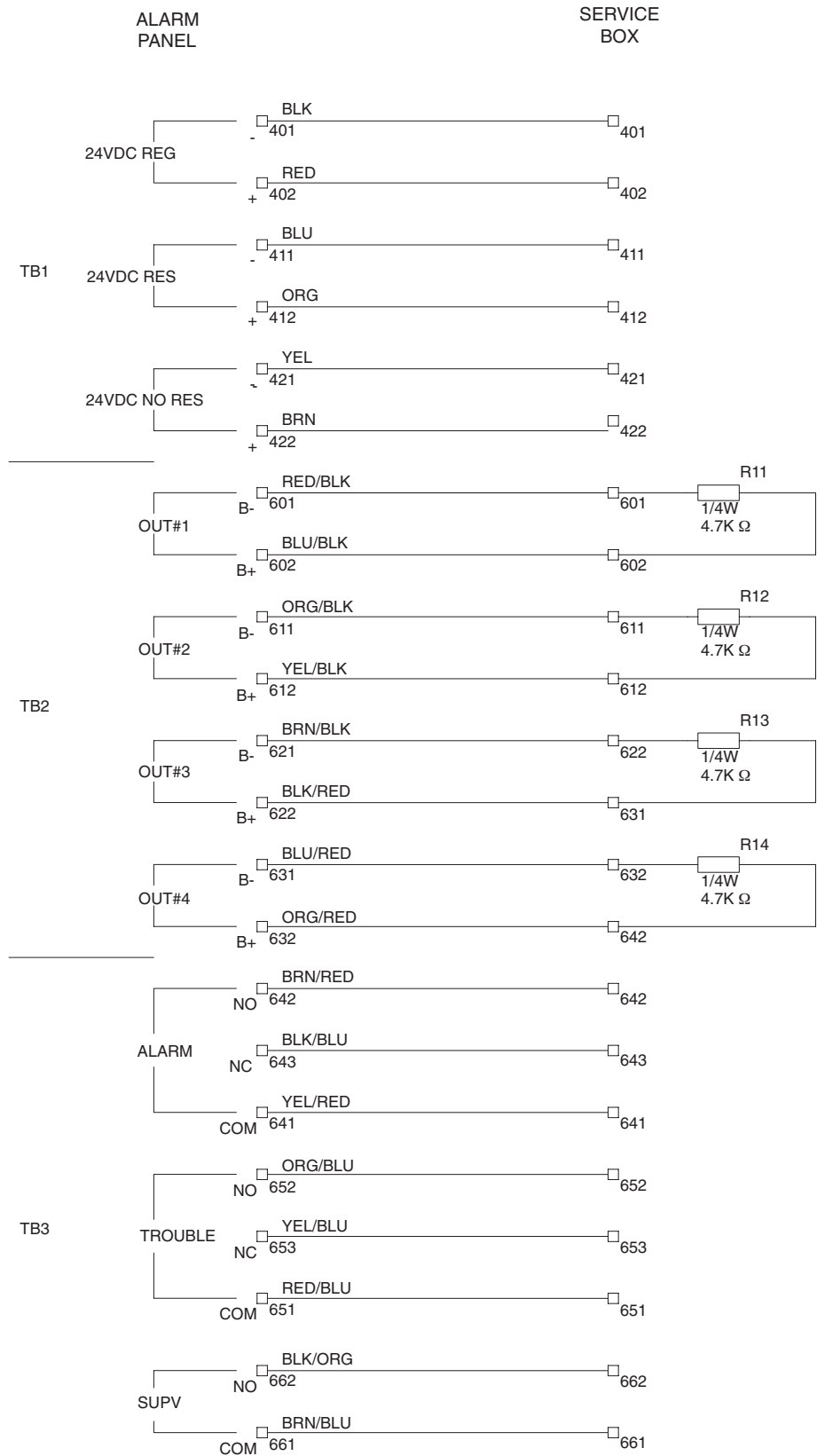
STYLE 7



Drawings continued on page 28

Series 745 FireLock® Fire-Pac

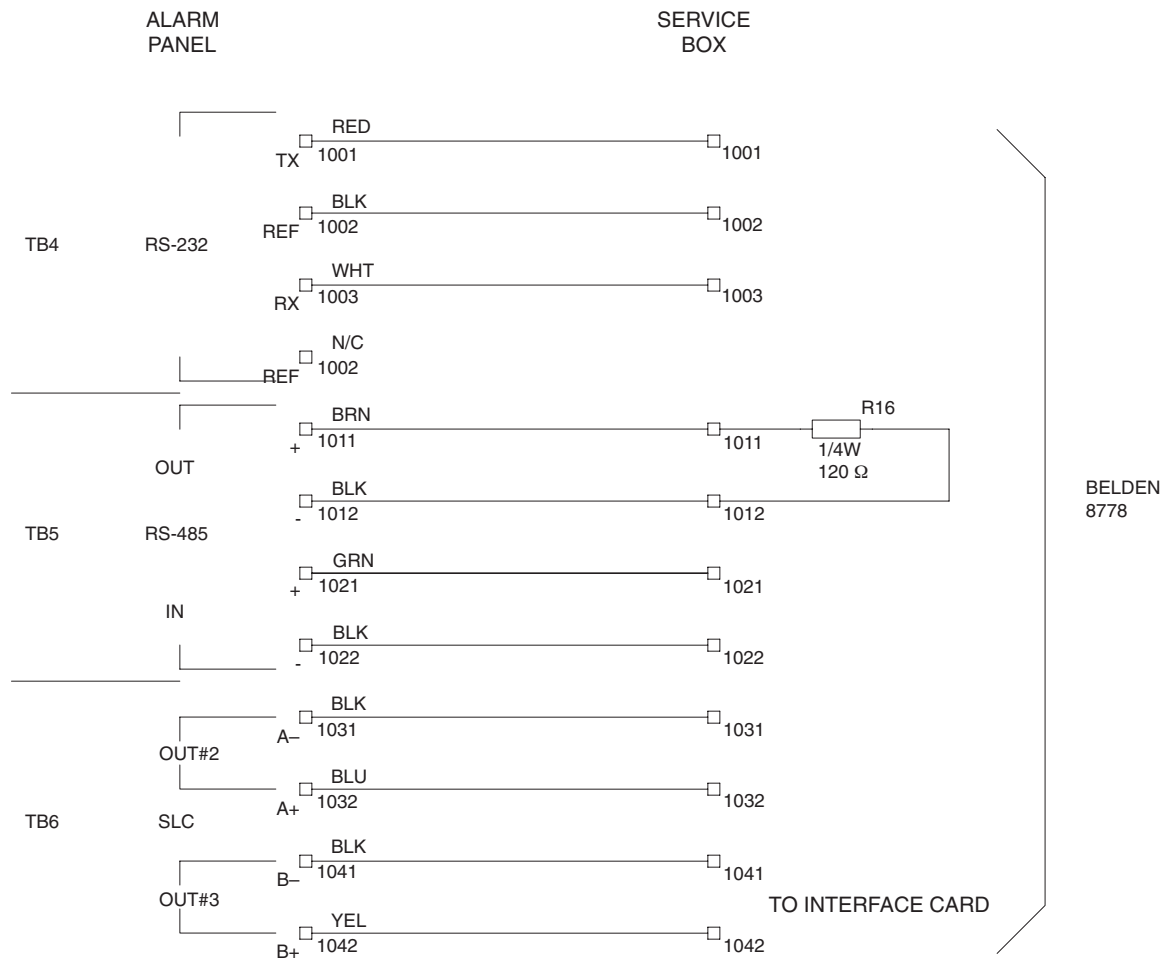
STYLE 4, STYLE 6, AND STYLE 7



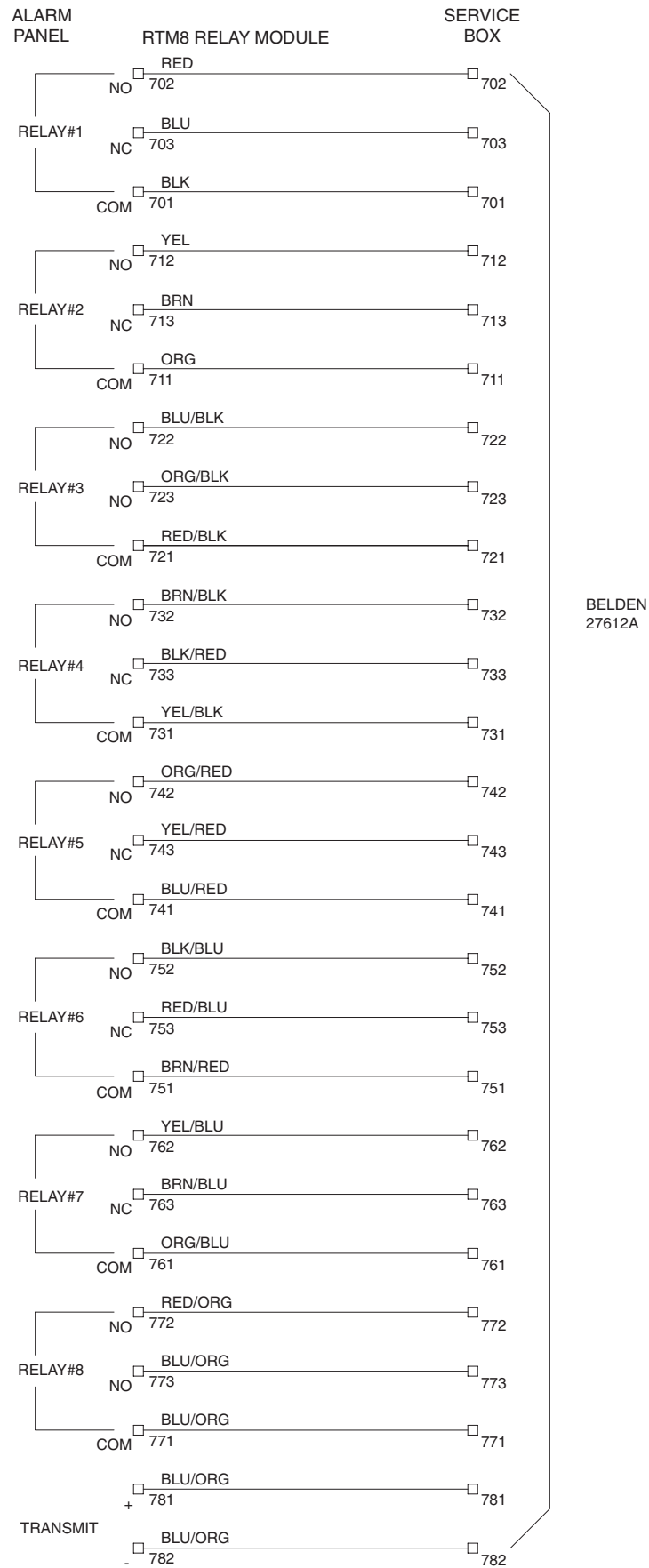
BELDEN
27611A

* = R6 OPTIONAL. RELOCATE TO PS1 IF
LOW PRESSURE TRIP IS USED.

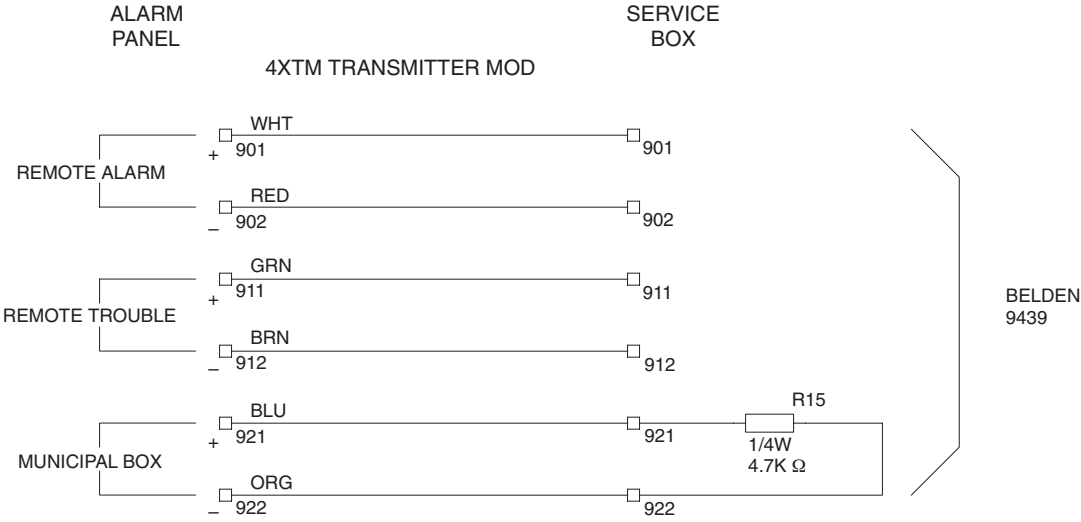
STYLE 4, STYLE 6, AND STYLE 7



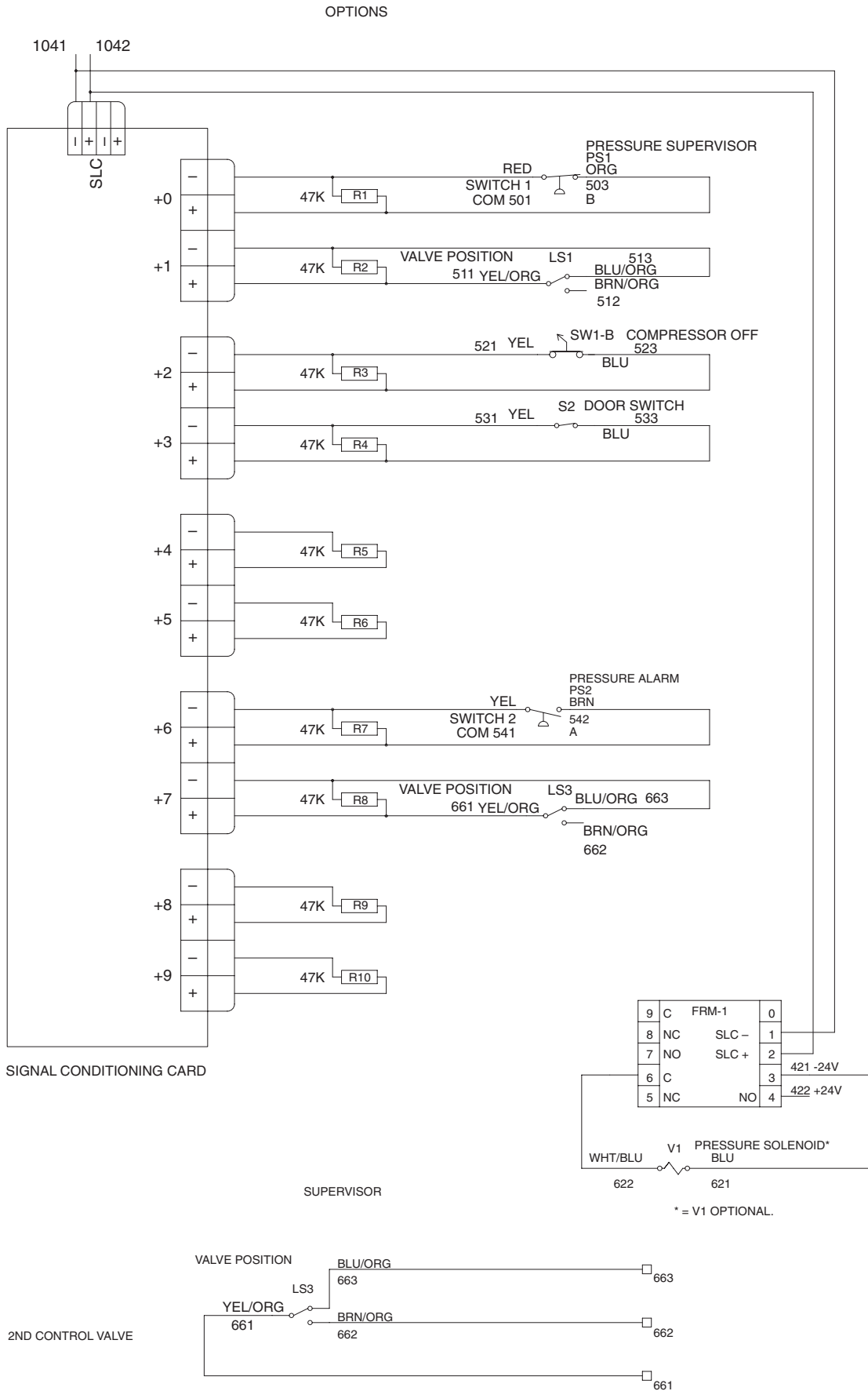
Series 745 FireLock® Fire-Pac
STYLE 4, STYLE 6, AND STYLE 7



STYLE 4, STYLE 6, AND STYLE 7

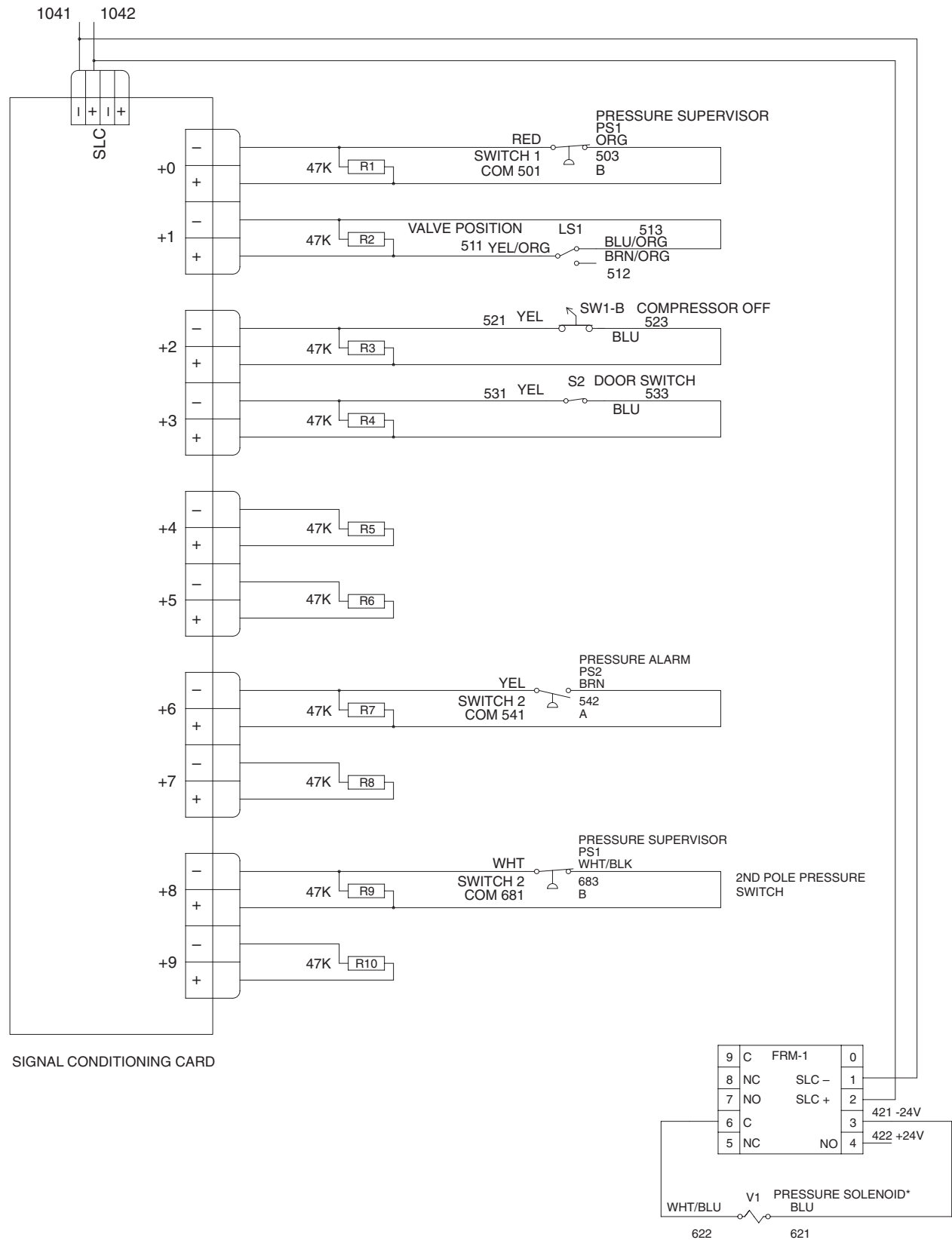


Series 745 FireLock® Fire-Pac
STYLE 4, STYLE 6, AND STYLE 7



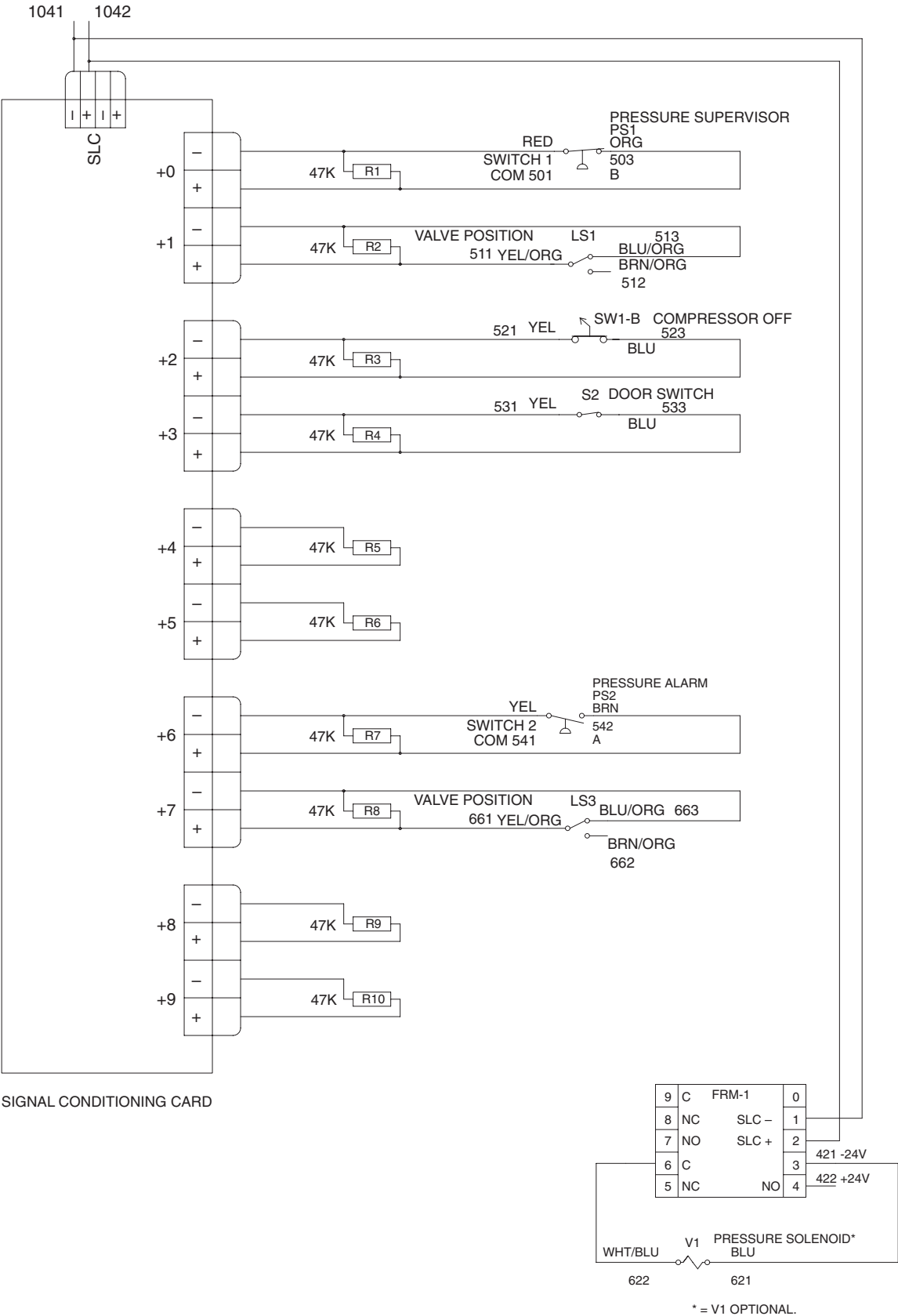
STYLE 4, STYLE 6, AND STYLE 7

OPTIONS



* = V1 OPTIONAL.

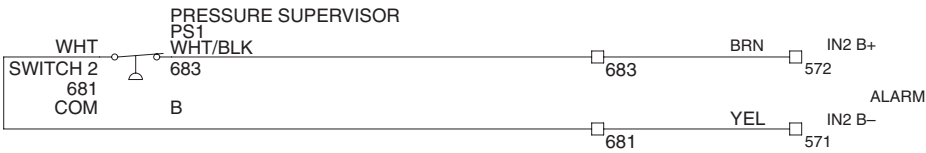
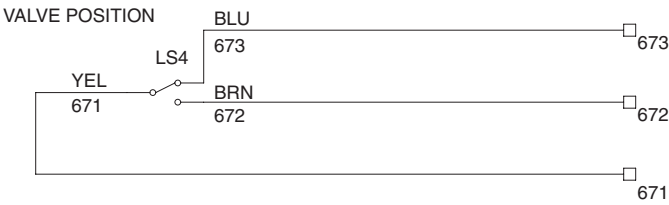
Series 745 FireLock® Fire-Pac
STYLE 4, STYLE 6, AND STYLE 7



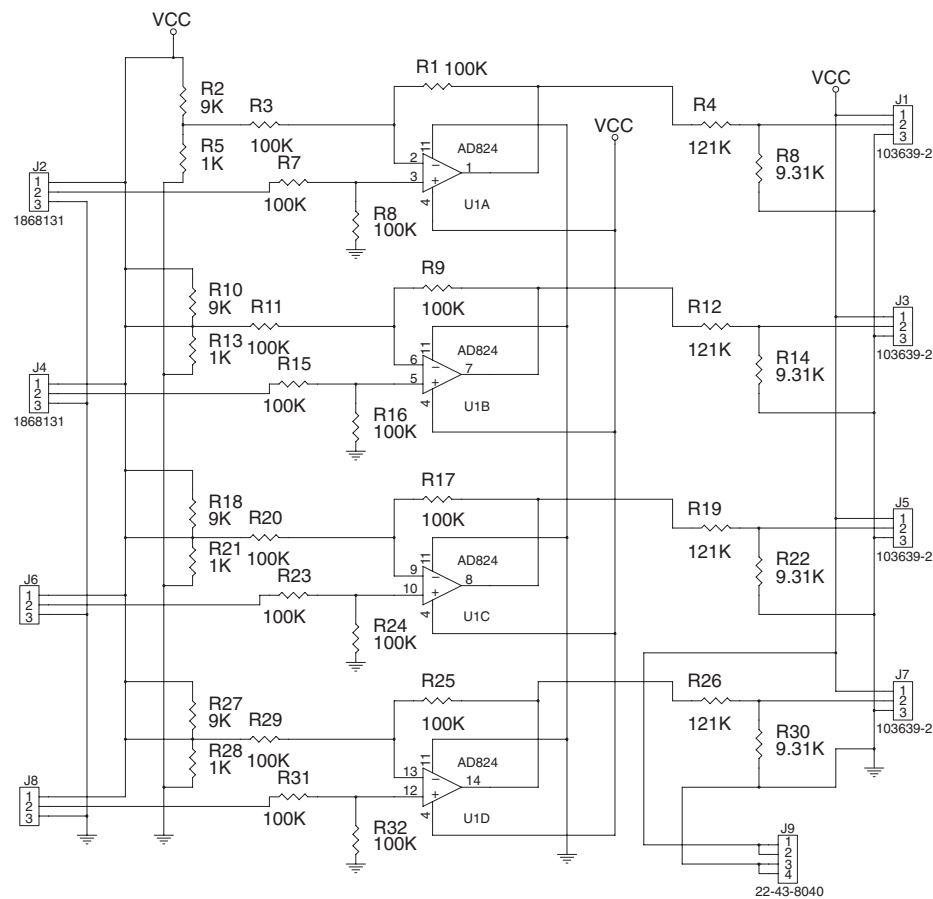
STYLE 4, STYLE 6, AND STYLE 7

2ND CONTROL VALVE

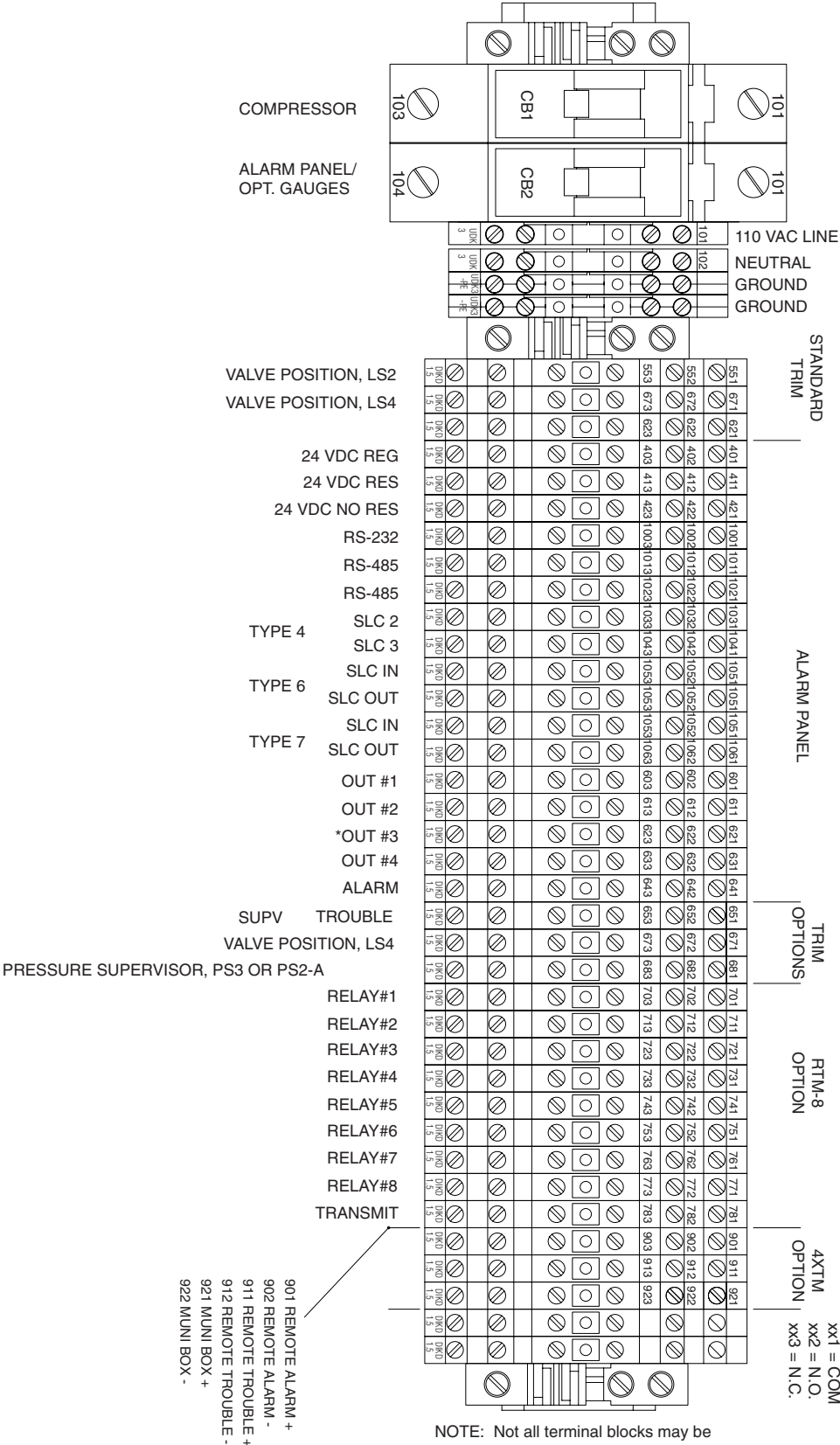
SUPERVISOR



Series 745 FireLock® Fire-Pac
STYLE 4, STYLE 6, AND STYLE 7



**ELECTRICAL JUNCTION BOX WIRING DIAGRAM FOR
ADDRESSABLE PANEL(NOTIFIER® AFP-200)
STYLE 4, STYLE 6, AND STYLE 7**





Victaulic Companies

WORLD HEADQUARTERS

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e-mail: pickvic@victaulic.com

Phone: 1-800-PICK-VIC (1-800-742-5842)
Phone: 610/559-3300 • Fax: 610/250-8817

VICTAULIC TOOL COMPANY

P.O. Box 31 • Easton, PA 18044-0031
Phone: 1-888-VIC-TOOL • Fax: 610/923-3090
e-mail: victools@victaulic.com

VICTAULIC CONSTRUCTION PIPING SERVICES DIV.

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