



**NOTES:**

1. These are typical door configurations meant to illustrate typical wiring requirements. Project implementations will vary and must be specified in contract documents.
2. For double doors, add two more 'A' cables for a Maglock and a Crash bar from ITB box to doors.
3. Refer to configuration drawings for standard hookups of equipment at communication room.
4. See elevation drawings for physical placement of hardware, Readers, intercoms, strobes, etc.
5. ITB to be installed 8' AFF.
6. If ITB is more than 300' away from comm/EQ room, PoE industrial SW, to be installed in the 10x10 enclosure near ITB. In this case fiber connection to be provided in between nearest comm room & this 10x10 enclosure.
7. JCI CK721A power supply & Altronix Maximal 77FE power supply to be connected individually from UPS backed power supply.
8. UPS powering up access control infrastructure to be powered from emergency CKT.
9. Horizontal PDU to be installed in comm room rack to distribute UPS backed power.
10. Another Horizontal PDU to be installed in comm room rack to distribute normal power.
11. All ACS enclosures to be provided with 270 lock cores.
12. CK721A, ITB & Altronix power supply enclosures to be supplied with tamper switches.
13. 10x10 enclosure & ITB to be connected via a 1.5" conduit.
14. CAT6 Cables layout on this block diagram are meant to illustrate typical requirements. For actual ACS IP devices (Biometric CR, Camera & Intercom) CAT6 cable counts, refer to dwg number ACS-Block-2.

24Vdc Altronix P/S: Altronix Maximal77FE  
 P/S-1: Altronix eFlow104NB (Part of Altronix Maximal77FE)  
 P/S-2: CK721A Power Supply SPS-5CE 24Vdc (Part of CK721A)  
 PDB: Altronix PDBULCB Power Distribution Module (Part of Altronix Maximal77FE)  
 IN BR: INGRESS BIOMETRIC CARD READER (MA SIGMA)  
 EG CR: EGRESS CARD READER (HID) WITH PIN PAD OR WITHOUT  
 IN IC: INGRESS INTERCOM  
 EG IC: EGRESS INTERCOM  
 H/S: HORN & STROBE  
 TB: Terminal Block  
 CB: Crash Bar (Exit Device)

WIRE LEGEND					
CODE	MANUF	MODEL	TYPE	COLORS	
A	WEST PENN	3241	4SHLD22	BLACK,RED,WHITE,GREEN	
B	"	"	430	2TSP22	BLACK/RED,RED, BLACK/WHITE,WHITE
C	"	"	440	2TSP18	BLACK/RED,RED, BLACK/WHITE,WHITE
D	"	"	D510	2TSP22	BLACK,RED,WHITE,GREEN
E	ALPHA	5198	8SHLD22	BLACK,RED,VIOLET,GREEN	
F	BELDEN	5102UE	4C14	ORANGE,BLUE,BROWN,YELLOW	
G			CAT 6	RED, BLAK, GREEN, WHITE	
J			1#14THHN	GREEN	

TITLE ACS Field Equipment BLOCK DIAGRAM		DATE 7/26/2019	
SIZE 11x17	FSCM NO.	DWG NO. ACS- BLOCK-1	REV A
DESIGNED BY N. SAHOTA	DRAWN BY J. Lee	FILE NAME ACS_Block1.dwg	SHEET 1/1