

SCOPE OF WORK

THE WORK OF THIS SECTION SHALL PROVIDE COMPLETE ELECTRICAL SYSTEMS WHICH SHALL INCLUDE THE PROVIDING OF ALL CONDUCTORS, RACEWAYS, FITTINGS, CIRCUIT PROTECTIVE DEVICES, LIGHT FIXTURES, BOXES, SUPPORTS, AND ALL ASSOCIATED APPURTENANCES AND MISCELLANEOUS EQUIPMENT NECESSARY, ALL OF WHICH SHALL BE COMPLETELY CONNECTED, TESTED, ADJUSTED AND LEFT IN PROPER OPERATING CONDITION. THE ELECTRICAL SYSTEM TO BE PROVIDED SHALL INCLUDE SERVICE AND DISTRIBUTION FACILITIES POWER FOR MOTOR OPERATED EQUIPMENT, LIGHTING SYSTEMS, AND ALL OUTLETS AS COVERED HEREINAFTER.

GENERAL NOTES:

- ALL ELECTRICAL WORK SHALL BE PERFORMED IN STRICT ACCORDANCE WITH THE 2014 NATIONAL ELECTRICAL CODE (NEC), THE 2015 INTERNATIONAL BUILDING CODE (IBC), AND ANY LOCAL CODES, LAWS AND ORDINANCES WHICH MAY APPLY. WHERE DIFFERENCES EXIST BETWEEN THE CODES, THE STRICTER CODE SHALL APPLY.
- ALL CONDUITS SHALL CONTAIN A GROUNDING CONDUCTOR REGARDLESS OF USE.
- THE CONTRACTOR FOR THE WORK UNDER THIS SECTION SHALL PROCURE AND PAY FOR ALL PERMITS, FEES, AND LICENSES REQUIRED FOR THE EXECUTION OF THIS WORK. SATISFACTORY EVIDENCE OF COMPLIANCE WITH THE REQUIREMENT AND ALL CERTIFICATES OF INSPECTION SHALL BE DELIVERED TO THE OWNER PROMPTLY UPON REQUEST.
- TYPE MC CABLE MAY NOT BE USED ON THIS PROJECT.
- ALL LOW VOLTAGE WIRING FOR OCCUPANCY SENSOR APPLICATIONS SHALL BE RUN IN METAL CONDUIT.
- UNLESS OTHERWISE NOTED FOR 120-VOLT, 20-AMP CKTS: #10 AWG SHALL BE USED FOR HOMERUNS LONGER THAN 75 FEET #12 AWG SHALL BE USED FOR HOMERUNS 75 FEET OR SHORTER
- MULTI-WIRE BRANCH CIRCUITS USING A SHARED OR COMMON NEUTRAL ARE NOT PERMITTED ON THIS PROJECT. THE CONTRACTOR SHALL PULL A SEPARATE NEUTRAL FOR ALL 120V AND 277V CIRCUITS.
- MOUNT RECEPTACLES 16" AFF UNLESS OTHERWISE NOTED.
- ALL LIGHT SWITCHES AND RECEPTACLES SHALL BE BY THE SAME MANUFACTURER. COVER PLATES SHALL BE JUMBO STAINLESS STEEL DEVICE COLOR TO BE SELECTED BY THE ARCHITECT UNLESS STATED WITH THE DEVICE SYMBOL.
- ELECTRICAL METALLIC TUBING AND RIGID GALVANIZED STEEL CONDUIT SHALL BE THE ONLY TYPES OF CONDUIT INSTALLED WITHIN THE BUILDING. PVC IS PERMITTED UNDERGROUND.
- BRANCH CIRCUITS SHALL BE RUN CONCEALED WHERE PRACTICAL. BRANCH CIRCUITS RUN EXPOSED TO WEATHER ON EXTERIOR WALLS OR ON ROOFS SHALL BE RUN IN GRC OR IMC WITH SCREWED FITTINGS. BRANCH CIRCUITS RUN CONCEALED IN WALLS OR CEILING SHALL BE RUN IN EMT, GRC, OR IMC. BRANCH CIRCUITS RUN EXPOSED IN DRY, FINISHED SPACES SHALL BE RUN IN WIREMOLD SURFACE METAL RACEWAY. BRANCH CIRCUITS RUN EXPOSED IN DAMP LOCATIONS, UNFINISHED SPACES (ATTICS), AND UNOCCUPIED SPACES (STORAGE ROOM, EQUIPMENT ROOMS, JANITOR'S CLOSET, ETC.) MAY BE RUN IN EMT IN LIEU OF WIREMOLD.
- CONDUIT HOMERUNS TO PANELBOARDS AND CONDUITS SHOWN WITH MULTIPLE CIRCUITS SHALL BE 3/4" MINIMUM, OTHERWISE RACEWAYS SHALL BE 1/2" MINIMUM, EXCEPT THAT FLEXIBLE CONDUIT SHALL BE 3/8" MINIMUM.
- INTERIOR CONDUIT HOMERUNS TO PANELBOARDS SHALL BE RUN OVERHEAD IN EMT, GRC, OR IMC UNLESS NOTED OTHERWISE ON THE DRAWINGS.
- ALL FIRE RATED WALLS, FLOORS, ETC WHICH HAVE A CONDUIT OR OTHER ELECTRICAL PENETRATION SHALL BE SEALED TO EQUAL THE RATING OF THE WALL, FLOOR, ETC. THAT IS PENETRATED. CONTRACTOR SHALL USE A U.L. RATED AND LISTED ASSEMBLY FOR THE SEALING MATERIAL AND METHOD. COORDINATE MANUFACTURER WITH THE GENERAL CONTRACTOR SO THAT ALL TRADES ON THE PROJECT USE THE SAME MANUFACTURER. THROUGH PENETRATIONS OF CONDUITS AND CABLES OF FIRE RESISTANCE RATED WALLS MUST COMPLY WITH SECTION 714.3.1 OF THE IBC. THROUGH PENETRATIONS OF FIRE RESISTANCE CEILING ASSEMBLIES MUST COMPLY WITH SECTION 714.4.1.1 OF THE IBC.
- ALL OUTLET BOXES 4"x4" OR SMALLER LOCATED ON OPPOSITE SIDES OF A RATED WALL SHALL HAVE A MINIMUM OF 2" HORIZONTAL SPACING OR SHALL BE PROTECTED WITH LISTED PUTTY PADS. ALL OUTLET BOXES LARGER THAN 4"x4" (COMMUNICATIONS OUTLETS, ETC.) LOCATED IN RATED WALLS SHALL BE PROTECTED WITH LISTED PUTTY PADS.
- REFER TO ARCHITECTURAL DRAWINGS FOR DIMENSIONS, LOCATIONS, CABINETS, ETC.
- CONCEAL ALL CONDUIT AND FITTINGS EXCEPT WHERE THE ARCHITECT GRANTS SPECIFIC PERMISSION.
- ALL WORK AND MATERIALS SHALL BE GUARANTEED FOR ONE YEAR FROM DATE OF ACCEPTANCE.
- PROVIDE ONE COMPLETE SET OF ELECTRICAL DRAWINGS MARKED UP FOR RECORD DRAWINGS. SHOW ALL LOCATIONS OF EQUIPMENT AND MATERIALS.
- INSTALL ALL MATERIALS PER MANUFACTURER'S INSTRUCTIONS.
- IDENTIFY MAJOR EQUIPMENT INSTALLED WITH LAMICOR LABELS (SEE SPECS). PROVIDE FLASH HAZARD SIGN AT ALL ELECTRICAL PANELS. PROVIDE A TYPED DIRECTORY IN ALL PANEL BOARDS CLEARLY DESCRIBING THE LOCATION OF AND TYPE OF LOAD BEING SERVED FOR ALL CIRCUITS.
- VISIT SITE TO DETERMINE EXISTING CONDITIONS PRIOR TO SUBMITTING BID.
- ALL RACEWAYS, FIXTURES, WIRING, DEVICES, AND EQUIPMENT RENDERED USELESS BY THIS WORK SHALL BE REMOVED AND DELIVERED TO THE OWNER'S STORAGE FACILITY AS DIRECTED. ANY MATERIAL NOT WANTED BY THE OWNER SHALL BE DISPOSED OF BY THE CONTRACTOR.
- ELECTRICAL CONTRACTOR SHALL DO ALL CUTTING AND PATCHING AS REQUIRED TO INSTALL HIS WORK. FINISH PATCHING AND PAINTING WILL BE DONE BY THE GENERAL CONTRACTOR.
- PRIOR TO DIGGING ANY TRENCHES, NOTIFY ALL UTILITIES AND OBTAIN LOCATIONS OF UNDERGROUND UTILITIES. ANY DAMAGES DONE TO UNDERGROUND UTILITIES OR PIPING BY THIS CONTRACTOR WILL BE REPAIRED BY THE OWNER OF THE LINE IN A SATISFACTORY MANNER. THIS CONTRACTOR WILL BEAR ALL COSTS FOR REPAIRS.
- CONDUITS TO BE RUN UNDER WALKWAYS AND PAVINGS SHALL BE INSTALLED BY JACKING OR BORING, UNLESS NOTED. DO NOT CUT WALKWAYS OR PAVEMENTS, UNLESS ACCEPTABLE TO THE ENGINEER. ALLOWED CUTS IN PAVEMENT OR CONCRETE SHALL BE MADE USING A PAVEMENT SAW, AND SHALL BE PATCHED TO MATCH THE EXISTING SURFACE.
- WHERE DISAGREEMENTS EXIST ON THE DESIGN DOCUMENTS, THE ITEM OR ARRANGEMENTS OF BETTER QUALITY, GREATER QUANTITY, OR HIGHER COST SHALL BE INCLUDED IN THE BASE BID. ANY DISCREPANCIES BETWEEN THE DRAWINGS, SPECIFICATIONS, AND FIELD CONDITIONS SHALL BE RESOLVED WITH THE ENGINEER PRIOR TO COMMENCING WORK. ALL AGREEMENTS SHALL BE VERIFIED IN WRITING.
- ALL WORK UNDER THIS SECTION SHALL BE COORDINATED WITH OTHER TRADES TO INSURE PROPER LOCATION OF OUTLETS AND EQUIPMENT CONNECTIONS, AND TO MINIMIZE CONFLICTS WITH STRUCTURAL MEMBERS, DUCT WORK, PIPING, ETC. CONFLICTS BETWEEN EQUIPMENT AND/OR MATERIAL LOCATIONS SHALL BE CORRECTED AS DIRECTED BY THE ARCHITECT-ENGINEER AT NO ADDITIONAL COST TO THE OWNER.

ABBREVIATIONS

A	AMPERES	LTG	LIGHTING
AFB	ABOVE FINISHED FLOOR	MFR	MANUFACTURER
AFG	ABOVE FINISHED GRADE	MLO	MAIN LUGS ONLY
AWG	AMERICAN WIRE GAUGE	NEC	NATIONAL ELECTRICAL CODE
AHJ	AUTHORITY HAVING JURISDICTION	NEMA	NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION
CKT	CIRCUIT	NIC	NOT IN CONTRACT
CU	COPPER	PH#	PHASE
EC	EMPTY CONDUIT	RCPT	RECEPTACLE
EQPT	EQUIPMENT	RE:	REFER TO
EXIST	EXISTING	TYP	TYPICAL
FWE	FURNISHED WITH EQUIPMENT	UNO	UNLESS NOTED OTHERWISE
GF	GROUND FAULT INTERRUPTER	V	VOLTS
IN	IN ACCORDANCE WITH	W	WIRE OR WATTS
KVA	KILOVOLTAMPERES	WP	WEATHERPROOF
KW	KILOWATTS		

ELECTRICAL DEMOLITION NOTES

- IT IS THE GENERAL INTENTION OF THESE DRAWINGS TO COVER ALL SITUATIONS WHERE AN ITEM IS TO BE REMOVED, WHETHER IT HAPPENS TO BE A LIGHT FIXTURE, DUPLEX RECEPTACLE, LIGHT SWITCH, FIRE ALARM DEVICE, OR OTHER ELECTRICAL ITEM. THE ELECTRICAL CONTRACTOR SHALL ASSIST THE GENERAL CONTRACTOR IN REMOVAL OF EQUIPMENT WITH ELECTRICAL CONNECTIONS BEING REMOVED BY THESE CONTRACTORS.
- PRIOR TO SUBMITTING BID, THE CONTRACTOR SHALL SURVEY THE EXISTING BUILDING AND MAKE NOTE OF ANY ADDITIONAL DEMOLITION AND/OR ANY ADDITIONAL REMOVAL AND RELOCATION WHICH MAY BE REQUIRED IN ORDER TO ACCOMPLISH RENOVATIONS INDICATED IN CONTRACT DOCUMENTS. NO CHANGE ORDER WILL BE ISSUED FOR ADDITIONAL WORK REQUIRED FOR DEMOLITION, REMOVAL, OR RELOCATION WORK NOT INDICATED ON THESE DRAWINGS BUT NECESSARY TO COMPLETE WORK.
- IN AREAS WHERE DEMOLITION WORK IS OCCURRING, REMOVE EXISTING FIRE ALARM DEVICES NOT BEING REUSED, AND EXISTING WIRING AND CONDUIT NOT BEING REUSED. EXISTING CONDUIT RUN CONCEALED IN EXISTING WALLS NOT BEING REMOVED AND/OR REPLACED MAY BE ABANDONED. ALL DEMOLITION MUST BE COORDINATED WITH THE ARCHITECT AND WITH ALL OTHER TRADES TO AVOID CONFLICTS.
- NO EXISTING ELECTRICAL MATERIALS, EQUIPMENT, WIRING, OR CONDUIT BEING REMOVED MAY BE REUSED ON THIS PROJECT UNLESS SPECIFICALLY NOTED OTHERWISE ON THESE DRAWINGS. ALL EXISTING ELECTRICAL MATERIALS AND EQUIPMENT NOT BEING REUSED SHALL BE DISPOSED OF AS INDICATED IN GENERAL NOTES.
- EXISTING FIRE ALARM PANEL IS TO REMAIN, REFER TO FIRE ALARM DEMOLITION PLANS AND TO FIRE ALARM DEMOLITION NOTES THIS SHEET.

FIRE ALARM SYSTEM DEMOLITION NOTES

- THE EXISTING FIRE ALARM SYSTEM MUST REMAIN OPERATIONAL DURING THE INSTALLATION OF THE NEW FIRE ALARM SYSTEM DEVICES EXCEPT IN PHASED AREAS WHERE EXISTING DEVICES ARE BEING REMOVED AND NEW DEVICES ARE BEING INSTALLED. ONCE WORK IS COMPLETE ON A PHASED AREA THE DEVICES IN THAT AREA SHALL BE TESTED AND DEEMED ACCEPTABLE PRIOR TO MOVING TO THE NEXT PHASED AREA. ONCE ALL WORK IS COMPLETE THE ENTIRE FIRE ALARM SYSTEM SHALL BE TESTED AND RETESTED UNTIL IT IS DEEMED ACCEPTABLE TO THE AHJ.
- IN ALL AREAS WHERE EXISTING FIRE ALARM DEVICES ARE BEING REMOVED, AND WHERE OTHER DEMOLITION WORK IS OCCURRING, REMOVE ALL EXISTING FIRE ALARM DEVICES AND OTHER RELATED EQUIPMENT NOT BEING REUSED, AND ALL ASSOCIATED WIRING AND CONDUIT NOT BEING REUSED. EXISTING CONDUIT RUN CONCEALED IN EXISTING WALLS NOT BEING REMOVED AND/OR REPLACED MAY BE ABANDONED. WHERE EXISTING DEVICES ARE SURFACE MOUNTED, THE EXISTING DEVICE, BOX, CONDUIT AND WIRE MUST BE REMOVED.
- PROVIDE BLANK JUMBO STAINLESS STEEL COVERPLATES OVER ALL OPEN BOXES RENDERED UNUSED BY DEMOLITION.

FIRE ALARM SYMBOL SCHEDULE

	FIRE ALARM CONTROL PANEL, SEMI-FLUSH MOUNT UNLESS NOTED OTHERWISE.
	FIRE ALARM ANNUNCIATOR, 48" AFF. FLUSH MOUNT UNLESS NOTED OTHERWISE.
	FIRE ALARM POWER EXTENDER PANEL, SURFACE MOUNT.
	FIRE ALARM VOICE COMMAND CENTER, 48" AFF. FLUSH MOUNT UNLESS NOTED OTHERWISE.
	REMOTE FIRE ALARM VOICE COMMAND CENTER, 48" AFF. SEMI-FLUSH MOUNT UNLESS NOTED OTHERWISE.
	NOT USED.
	FIRE ALARM MANUAL PULL STATION, 48" AFF TO TOP OF BOX.
	FIRE ALARM WALL MOUNTED SPEAKER WITH STROBE LIGHT, CANDELA RATING AS NOTED. MOUNT BETWEEN 80" AND 96" AFF PER NFPA 72 AND ADA REQUIREMENTS.
	FIRE ALARM WALL MOUNTED STROBE LIGHT, CANDELA RATING AS NOTED. MOUNT BETWEEN 80" AND 96" AFF PER NFPA 72 AND ADA REQUIREMENTS.
	FIRE ALARM WALL MOUNTED SPEAKER. MOUNT BETWEEN 80" AND 90" AFF PER NFPA 72 AND ADA REQUIREMENTS.
	CEILING MOUNTED FIRE ALARM SPEAKER WITH STROBE LIGHT, CANDELA RATING AS NOTED.
	CEILING MOUNTED FIRE ALARM STROBE LIGHT, CANDELA RATING AS NOTED.
	CEILING MOUNTED FIRE ALARM SPEAKER.
	MULTI SENSOR DETECTOR, CEILING MOUNTED, UNLESS NOTED OTHERWISE.
	HEAT DETECTOR, CEILING MOUNTED, UNLESS NOTED OTHERWISE.
	CARBON MONOXIDE DETECTOR, CONNECTED TO FIRE ALARM SYSTEM. FURNISHED & INSTALLED UNDER DIVISION 28. SEE DRAWINGS AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.
	DUCT MOUNTED SMOKE DETECTOR. SEE FIRE ALARM SYSTEM NOTES AND DETAIL ON DRAWINGS.
	FIRE/SMOKE DAMPER, SEE DRAWINGS AND SPECIFICATIONS FOR ADDITIONAL INFORMATION.
	FIRE ALARM SYSTEM REMOTE ALARM INDICATOR WITH INTEGRATED KEYED TEST SWITCH, FOR CEILING UP TO 12'-0" HIGH LOCATE ON CEILING DIRECTLY BELOW ASSOCIATED DUCT DETECTOR FOR OTHER INSTALLATIONS LOCATE ON WALL AT 80" AFF. PROVIDE STICKY-BACK LABEL OF ASSOCIATED HVAC UNIT.
	WALL MOUNTED MAGNETIC DOOR HOLDER, 120V. 76" AFF, UNLESS NOTED, FIELD VERIFY WITH DOORS. WIRE TO 120V CIRCUIT AS INDICATED ON DRAWINGS.
	FIRE ALARM MONITORING MODULE.
	FIRE ALARM CONTROL MODULE.
	SPRINKLER SYSTEM TAMPER SWITCH MONITORING MODULE (TROUBLE).
	SPRINKLER SYSTEM FLOW SWITCH MONITORING MODULE (ALARM).
	DPENOTES WEATHERPROOF DEVICE, PROVIDE BACKBOX AND COVER UL LISTED AS WEATHERPROOF.
	DPENOTES WIREGUARD, PROVIDE MANUFACTURER'S WIREGUARD FOR DEVICE.

FIRE ALARM SYMBOL SCHEDULE NOTES:

- WALL MOUNTED NOTIFICATION DEVICES SHALL BE LOCATED AT UNIFORM ELEVATION ABOVE FINISHED FLOOR WHERE CEILING HEIGHTS ALLOW.
- DUCT DETECTOR FOR FIRE/SMOKE DAMPER SHALL BE LOCATED WITHIN 5' OF DAMPER OPENING.

BOLD SYMBOLS DENOTE NEW DEVICES AS INDICATED ABOVE

LIGHT SYMBOLS DENOTE EXISTING DEVICES AS INDICATED BELOW.

FIRE ALARM EXISTING DEVICE LEGEND AND NOTES:

- DENOTES EXISTING FIRE ALARM SYSTEM INITIATING DEVICE OR OTHER FIRE ALARM SYSTEM DEVICE TO REMAIN, MAINTAIN EXISTING WIRING AS REQUIRED TO MAINTAIN OPERATION OF DEVICE.
 - DENOTES EXISTING MANUAL PULL STATION TO REMAIN, TO BE LOWERED TO CORRECT HEIGHT, REFER TO FIRE ALARM PLANS.
 - DENOTES EXISTING FIRE ALARM SYSTEM NOTIFICATION APPLIANCE AND ASSOCIATED WIRING AND CONDUIT NOT BEING REUSED TO BE REMOVED. PROVIDE JUMBO STAINLESS STEEL BLANK COVERPLATE OVER OPEN FIRE ALARM OUTLET BOXES RENDERED UNUSED BY DEMOLITION. EXISTING OUTLET BOX AND CONDUIT MAY BE REUSED WHERE LOCATION ALIGNS WITH NEW FIRE ALARM DEVICE BEING ADDED (DENOTED BY "TB" ON FIRE ALARM PLANS).
 - DENOTES EXISTING DUCT MOUNTED SMOKE DETECTOR AND ASSOCIATED CONTROL MODULE AND KEYED SWITCH TO REMAIN. MAINTAIN EXISTING WIRING AS REQUIRED TO MAINTAIN OPERATION OF DEVICE AND SHUTDOWN OF HVAC UNIT AND/OR FIRE-SMOKE DAMPER. "D" DENOTES EXISTING HVAC UNIT DUCT DETECTOR. "SD" DENOTES EXISTING DUCT DETECTOR LOCATED AT FIRE-SMOKE DAMPER. SEE EXISTING FIRE ALARM SYSTEM TESTING ON E001.
- PHASING: DEMOLITION AND INSTALLATION ARE TO BE PHASED SO THAT ONLY ONE WING/AREA/SECTION OF SCHOOL IS OFFLINE AT A TIME. COORDINATE PHASING AND SCHEDULE WITH OWNER AND ENGINEER AT PRE-CONSTRUCTION MEETING PRIOR TO STARTING WORK. SUBMIT A WRITTEN PHASING PLAN AND SCHEDULE TO THE OWNER AND ENGINEER FOR REVIEW PRIOR TO STARTING WORK.
 - EXISTING FIRE ALARM CONTROL PANEL(S) AND FIRE ALARM ANNUNCIATOR(S) TO REMAIN, INCLUDING ANY NOT INDICATED ON THESE DRAWINGS. MAINTAIN EXISTING WIRING, ETC. AS REQUIRED TO MAINTAIN OPERATION OF THE FIRE ALARM SYSTEM DURING DEMOLITION AND CONSTRUCTION.
 - EXISTING SMOKE AND HEAT DETECTORS TO REMAIN UNLESS NOTED OTHERWISE.
 - EXISTING FIRE ALARM DACT/PDACT TO REMAIN UNLESS NOTED OTHERWISE.
 - EXISTING MONITORING MODULES TO REMAIN UNLESS NOTED OTHERWISE.
 - EXISTING MAGNETIC DOOR HOLDERS AND ASSOCIATED SMOKE DETECTORS AND CONTROL MODULES TO REMAIN UNLESS NOTED OTHERWISE.
 - EXISTING MANUAL PULL STATIONS TO REMAIN UNLESS NOTED OTHERWISE. LOWER MANUAL PULL STATIONS WHERE NOTED.
 - EXISTING DUCT MOUNTED SMOKE DETECTORS AND ASSOCIATED KEY SWITCHES AND CONTROL MODULES TO BE REMOVED AND REPLACED UNLESS NOTED OTHERWISE.
 - EXISTING NOTIFICATION APPLIANCES (HORNS AND HORN/STROBES) TO BE REMOVED. EXISTING NAC PANELS NO LONGER IN USE TO BE REMOVED.
 - PROVIDE JUMBO STAINLESS STEEL BLANK COVERPLATE OVER ALL OPEN FIRE ALARM OUTLET BOXES RENDERED UNUSED BY DEMOLITION. EXISTING OUTLET BOX AND CONDUIT MAY BE REUSED WHERE LOCATION ALIGNS WITH NEW FIRE ALARM DEVICES BEING ADDED, REFER TO E500 SHEETS.
 - GENERAL NOTE:** THE EXISTING FIRE ALARM SYSTEM IS TO REMAIN IN OPERATION DURING DEMOLITION AND DURING INSTALLATION OF NEW DEVICES. EXISTING CONDUIT, WIRING, AND BOXES FOR ITEMS BEING REMOVED MAY BE REUSED ONLY WHERE THEY COMPLY WITH THE REQUIREMENTS OF THE CONTRACT DOCUMENTS IN TERMS OF LOCATIONS, MOUNTING HEIGHTS, ROUTING, CONDUIT FILL, ETC.
 - GENERAL NOTE:** EXISTING FIRE ALARM DEVICES ARE SHOWN FOR INFORMATION PURPOSES ONLY AND ARE NOT INTENDED TO REFLECT ALL EXISTING DEVICES INSTALLED. DEVICES INDICATED ARE BASED ON AVAILABLE RECORD DRAWINGS AND A SITE VISIT PERFORMED BY SIMS GROUP ENGINEERS, INC. THE CONTRACTOR IS RESPONSIBLE FOR REMOVAL OF ALL EXISTING FIRE ALARM DEVICES AND ASSOCIATED WIRING AND CONDUIT NO LONGER IN USE WHETHER OR NOT THE DEVICES ARE INDICATED ON THESE PLANS. REFER TO DEMOLITION NOTES ON E001.

ELECTRICAL SUBMITTALS

ELECTRICAL SHOP DRAWINGS SHALL BE SUBMITTED IN ONE COMPLETE PACKAGE CONTAINING ALL ITEMS REQUIRED BY THE ELECTRICAL DRAWINGS AND THE DIVISION 28-28 SPECIFICATIONS IN PARTIAL SHOP DRAWING SUBMITTALS MAY BE REJECTED BY THE ARCHITECT-ENGINEER. REFER TO SECTION 280510 OF THE ELECTRICAL SPECIFICATIONS FOR REQUIRED SUBMITTAL FORMAT AND FOR ADDITIONAL REQUIREMENTS.

EXISTING FIRE ALARM SYSTEM TESTING

PRIOR TO STARTING WORK, PERFORM A TEST OF THE EXISTING FIRE ALARM SYSTEM, INCLUDING TESTING OF ALL INITIATING DEVICES, MONITORING MODULES, & CONTROL MODULES. TESTING SHALL INCLUDE BUT NOT BE LIMITED TO THE FOLLOWING:

- SMOKE TEST OF DUCT MOUNTED SMOKE DETECTORS, INCLUDING VERIFICATION OF PROPER SHUTDOWN OF ASSOCIATED HVAC UNIT(S) AND CLOSING OF ASSOCIATED FIRE SMOKE DAMPER(S).
- SMOKE TEST OF SMOKE DETECTORS FOR RATED DOORS, INCLUDING VERIFICATION OF PROPER OPERATION OF MAGNETIC DOOR HOLDERS.
- SMOKE AND HEAT TEST OF ALL SPOT SMOKE AND HEAT DETECTORS.
- VERIFICATION OF PROPER OPERATION OF ALL FIRE SPRINKLER SYSTEM FLOW AND TAMPER SWITCH MONITORING MODULES (MAKE NOTE OF ANY FLOW AND TAMPER SWITCHES THAT ARE NOT MONITORED, INCLUDING THOSE AT PIVs).
- VERIFICATION OF PROPER OPERATION OF ALL KITCHEN HOOD MONITORING MODULES, INCLUDING ANY IN NUTRITION LABS AND OTHER LIKE SPACES (MAKE NOTE OF ANY KITCHEN HOODS THAT ARE NOT MONITORED).
- VERIFICATION OF PROPER OPERATION OF ALL MANUAL PULL STATIONS.
- VERIFICATION OF PROPER OPERATION OF ANY INITIATING DEVICES, MONITORING MODULES, OR CONTROL MODULES NOT DESCRIBED ABOVE.
- VERIFICATION OF PROPER UL MONITORING AND DIAL-OUT TIMES.

UPON COMPLETION OF TESTING PROVIDE A REPORT TO THE OWNER AND THE ENGINEER IN PDF OR MS WORD FORMAT DOCUMENTING TEST RESULTS, INCLUDING ALL DEFICIENCIES NOTES. INCLUDE RECORD DRAWINGS REFLECTING ALL DEFICIENCIES NOTED IN THE REPORT. ALL COST ASSOCIATED WITH ABOVE TESTING TO BE INCLUDED IN BID. TESTING TO BE SCHEDULED WITH OWNER AND ENGINEER, AND SHALL BE PERFORMED AFTER SCHOOL HOURS, ON WEEKENDS, AND/OR ON SCHOOL HOLIDAYS.

SPARE PARTS

ADDITIONAL FIRE ALARM DEVICES: THE ELECTRICAL CONTRACTOR AND FIRE ALARM SYSTEM INSTALLER SHALL FURNISH AND INSTALL ADDITIONAL FIRE ALARM DEVICES AT THE DISCRETION OF THE ARCHITECT/ENGINEER AND/OR THE AUTHORITY HAVING JURISDICTION IN THE FOLLOWING QUANTITIES:

- (8) SPEAKER/STROBE LIGHTS
- (6) SPEAKERS OR STROBE LIGHTS
- (6) MANUAL PULL STATIONS
- (6) SMOKE DETECTORS OR HEAT DETECTORS
- (6) MONITORING MODULES OR CONTROL MODULES
- (2) MAGNETIC DOOR HOLDERS

INCLUDE COMPLETE COSTS TO FURNISH AND INSTALL THE ABOVE ADDITIONAL DEVICES IN BASE BID, INCLUDING ALL CONDUIT, OUTLET BOXES, 120V POWER, WIRING, AND SYSTEM PROGRAMMING. ANY DEVICES NOT USED SHALL BE TURNED OVER TO THE OWNER AS SPARE DEVICES AT THE END OF THE PROJECT. THESE SPARE DEVICES ARE IN ADDITION TO THE ALLOWANCE.

ALLOWANCE - DUCT DETECTORS

INCLUDE A SEPARATE LUMP SUM CASH ALLOWANCE OF \$20,000 IN BID TO REPLACE EXISTING DUCT MOUNTED SMOKE DETECTOR ASSEMBLIES DETERMINED TO BE FAULTY/INOPERABLE DURING THE FIRE ALARM SYSTEM TESTING. REPLACEMENT COSTS SHALL BE BASED ON UNIT PRICING INCLUDED WITH BID. AT END OF PROJECT CREDIT OWNER WITH ANY AMOUNT NOT SPENT.

FIRE ALARM SYSTEM UNIT PRICING

UNIT PRICING:

- UNIT PRICE QUOTATIONS SHALL BE INSERTED IN THE APPROPRIATE SPACES IN THE BID FORM FOR EACH UNIT PRICE ITEM OF WORK DESCRIBED HEREIN.
- UNIT PRICES SHALL BE USED TO COMPUTE ADJUSTMENTS OF THE CONTRACT SUM FOR APPROVED UNIT PRICE ITEMS OF WORK. SUCH ADJUSTMENTS SHALL BE MADE BY CHANGE ORDER.
- UNIT PRICES SHALL INCLUDE ALL LABOR, MATERIALS, TOOLS, AND EQUIPMENT; ALL OTHER DIRECT AND INDIRECT COSTS NECESSARY TO COMPLETE THE ITEM OF WORK AND TO COORDINATE THE UNIT PRICE WORK WITH ADJACENT WORK; AND SHALL INCLUDE ALL OVERHEAD AND PROFIT. CONTRACTOR SHALL ACCEPT COMPENSATION COMPUTED IN ACCORDANCE WITH THE UNIT PRICES FOR WORK INSTALLED IN PLACE AS FULL COMPENSATION FOR FURNISHING SUCH WORK.
- COMPENSATION WILL BE PAID FOR THOSE ITEMS OF WORK DESCRIBED IN BELOW, UNIT PRICES.

UNIT PRICE #1: HVAC UNIT DUCT MOUNTED SMOKE DETECTOR WITH CONTROL RELAY AND KEYED ALARM/SWITCH.

UNIT PRICE #2: FIRE/SMOKE DAMPER DUCT MOUNTED SMOKE DETECTOR WITH CONTROL RELAY AND KEYED ALARM/SWITCH.

UNIT PRICE #3: CONTROL RELAY FOR OPERATION WITH EXISTING DUCT MOUNTED SMOKE DETECTOR AND KEYED ALARM/SWITCH.

ELECTRICAL SHEET LIST

- E001 - FIRE ALARM SYMBOLS & NOTES
- E002 - OVERALL KEY PLAN
- E003 - DEMOLITION FIRE ALARM PLAN - AREA A
- E004 - DEMOLITION FIRE ALARM PLAN - AREA B
- E005 - DEMOLITION FIRE ALARM PLAN - AREA C
- E006 - DEMOLITION FIRE ALARM PLAN - AREA D&E
- E501 - FIRE ALARM PLAN - AREA A
- E502 - FIRE ALARM PLAN - AREA B
- E503 - FIRE ALARM PLAN - AREA C
- E504 - FIRE ALARM PLAN - AREA D&E
- E601 - FIRE ALARM DETAILS

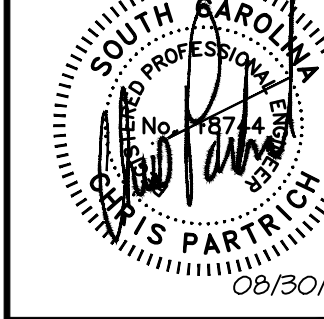
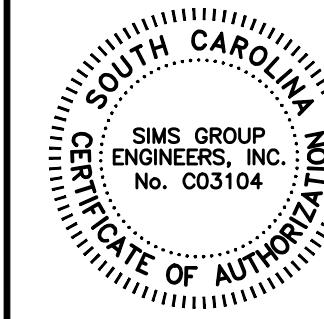
Jumper

Carter

Sease

ARCHITECTS

412 Meeting Street
West Columbia
South Carolina



FIRE ALARM REPLACEMENT
AIRPORT HIGH SCHOOL
LEXINGTON SCHOOL DISTRICT TWO

OSF PERMIT SET

Date	Description
No	

DRAWN BY: JMO

CHECKED BY: CLP

COMM NO: 18019

DATE: AUGUST 2018

SHEET TITLE:
FIRE ALARM
SYMBOLS AND
NOTES

SHEET NO:
E-001

OSF PERMIT SET c18030

sims group

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