ADDENDUM NO 1 CONFIRMATION

Project Name:	Rowan University - Rutgers	s Camden
	Joint Health Sciences Cente	er – Café Fitout
Addendum #1:	ONE (1) page and ONE (1)	drawing file
		16 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
		and fax back to McKernan Architects at (856
616-2963 or email to	trish@mckernanarchitects.o	com.
Bidder's Name Alian	o Brothers General Contra	actors, Inc.
bidder 5 Hairie		,
Δ.		Amalia Aliana
Received By:	ele alino	Amelia Aliano
	(Sign & Print)	
Mana	L 05 0000	
Date Received: Marc	n 25, 2020	

John McQuilkin, Project Architect





Joseph F. McKernan Jr. Architects and Associates, LLC

Joseph F. McKernan Jr.,RA • John J. McQuilkin,AIA • Richard J. Lake,RA
••
Francis A. Witt

Rowan University – Rutgers Camden

Joint Health Sciences Center – Café Fitout

Addendum No. 1

March 25, 2020

Architect's Project No. 917A

SPECIFICATIONS:

- Form of Proposal: The April 7, 2020 Bid Date has been extended until May. The new bid date will be specified at a later date.
- General Conditions of the Contract for Construction A232: Add the following Schedule of Insurance Coverages:

§ 11.1.4 .1 Schedule of Insurance Coverages

Commercial General Liability of not less than \$1,000,000.00 for each occurrence and \$2,000,000 aggregate, naming the Owner, Rowan University/Rutgers-Camden Board of Governors, the Joint Health Sciences Center Condominium Association, Inc., Architect and Construction Manager as additional insureds on a primary and non-contributory basis. Worker's Compensation in the Statutory amount together with Employer's Liability Insurance of \$500,000.00 for each accident. Comprehensive Automobile Liability Insurance of \$1,000,000.00, naming the Owner, Construction Manager and Architects as additional insureds on a primary and non-contributory basis.

Workers Compensation including limits of \$500,000 (or per statute). The Owner, Construction Manager and Architects, are to be included as additional insureds on a primary and non-contributory basis.

DRAWINGS:

Drawing FA-001.CF: Add attached correct Fire Alarm drawing FA-001.CF to bid set.

END OF ADDENDUM NO. 1

FIRE ALARM GENERAL NOTES

- SCOPE
 PROJECT SCOPE INCLUDES THE CONSTRUCTION OF A FOUR STORY MIXED OCCUPANCY BUILDING WHICH WILL CONSIST OF BUILDING CORE, LABORATORY SPACES, OFFICES AND MECHANICAL/ELECTRICAL EQUIPMENT SPACES.
- B. THE WORK UNDER THIS SECTION INCLUDES ALL LABOR, MATERIALS, FEES AND ACTIVITIES NECESSARY TO INSTALL, TEST & COMMISSION A FULLY FUNCTIONAL AND CODE COMPLIANT FIRE ALARM & SIGNALING SYSTEM.
- C. SUBMITTALS SHALL BE PREPARED AND FORWARDED TO THE ARCHITECT/ENGINEER FOR REVIEW. SUCCESSFULLY COMPLETING THE SUBMITTAL AND REVIEW PROCESS OF FIRE ALARM SYSTEM PRODUCT DATA, SHOP DRAWINGS, CALCULATIONS, AS-BUILT DRAWINGS AND TEST CERTIFICATES SHALL BE A PREREQUISITE TO ISSUING FINAL ENGINEER APPROVAL CERTIFICATION FOR OCCUPANCY.
- D. THE WORK SHALL BE DESCRIBED DIRECTLY BY THESE DRAWINGS AND RELATED DOCUMENTS UNDER THIS SECTION AND AS AFFECTED BY RELATED DOCUMENTS NOT EXCLUSIVE TO THE WORK OF THIS SECTION.
- E. PROVIDE VOLTAGE DROP AND BATTERY CALCULATIONS FOR FIRE ALARM SYSTEM.
- A. THE DRAWINGS ARE DIAGRAMMATIC IN NATURE AND ARE INTENDED FOR PURPOSES OF OBTAINING A BUILDING PERMIT AND AS THE BASIS OF DESIGN FOR PREPARATION OF DETAILED SHOP DRAWINGS. THE DRAWINGS ARE NOT INTENDED TO SHOW EXACT LOCATIONS, BUT TO DEMONSTRATE THE CONFIGURATION OF MAJOR SYSTEM COMPONENTS AND APPROXIMATE APPLIANCE AND DEVICE LOCATIONS. FIELD VERIFY LOCATIONS OF ALL DEVICES, APPLIANCES AND SYSTEM COMPONENTS.
- B. ALL COMPONENTS SHOWN ARE NEW UNLESS SPECIFICALLY NOTED AS EXISTING.
- 9. RELATED DOCUMENTS
 A. ARCHITECTURAL, STRUCTURAL & ENGINEERING DRAWINGS & SPECIFICATIONS
- B. OWNER AND/OR TENANT CONSTRUCTION STANDARDS OF PRACTICE C. FIRE ALARM SPECIFICATIONS

PURPOSE OF ENGINEERING DRAWINGS

- 10. CODES & STANDARDS
- A. NEW JERSEY UNIFORM CONSTRUCTION CODE (NJUCC) AS DEFINED BY CHAPTER 23 OF THE NEW JERSEY ADMINISTRATIVE CODE.
 B. BUILDING CODE: 2015 INTERNATIONAL BUILDING CODE, NEW JERSEY EDITION.
 C. FIRE CODE: 2015 INTERNATIONAL FIRE CODE, NEW JERSEY EDITION.
- D. ELECTRICAL CODE: 2014 NATIONAL ELECTRIC CODE
 E. ELEVATOR CODE: 2007 ASME/A17.1 SAFETY CODE FOR ELEVATORS AND ESCALATORS
- F. MECHANICAL CODE: 2015 INTERNATIONAL MECHANICAL CODE, NEW JERSEY EDITION.
- G. ACCESSIBILITY CODE: 2003 ACCESSIBLE AND USEABLE BUILDINGS AND FACILITIES (A117.1)
- A. PRODUCTS: DOMESTICALLY MANUFACTURED, UL LISTED & FM APPROVED FOR USE WITH FIRE ALARM SYSTEMS.

B. INSTALLERS: LICENSED IN GOOD STANDING AS FIRE ALARM SYSTEMS INSTALLERS IN THE STATE OF NEW JERSEY.

- 7. <u>WARRANTEE</u>
 A. WARRANTEE WORK OF THIS SECTION IN WRITING FOR ONE YEAR FROM THE DATE OF OWNER'S ACCEPTANCE OF CERTIFICATE OF
- A. WARRANTEE WORK OF THIS SECTION IN WRITING FOR ONE YEAR FROM THE DATE OF OWNER'S ACCEPTANCE OF CERTIFICATE OF SUBSTANTIAL COMPLETION. REPAIR OR REPLACE DEFECTIVE MATERIALS, EQUIPMENT, WORKMANSHIP AND INSTALLATION THAT DEVELOP WITHIN THE PERIOD, PROMPTLY AND TO OWNER'S SATISFACTION AND CORRECT DAMAGE CAUSED IN MAKING NECESSARY REPAIRS AND REPLACEMENTS UNDER GUARANTEE WITH CONTRACT PRICE.

FIRE ALARM DESIGN NOTES

- . VISUAL NOTIFICATION APPLIANCES WILL FLASH IN SYNCHRONIZATION PER NFPA 72-2010.
- 2. INITIATING DEVICE CIRCUITS (IDC) WILL BE INSTALLED UTILIZING A CLASS "B" CONFIGURATION IN ACCORDANCE WITH NFPA 72-2010.
- 3. SIGNALING LINE CIRCUITS (SLC) WILL BE INSTALLED UTILIZING A CLASS "A" CONFIGURATION IN ACCORDANCE WITH NFPA 72-2010.
- 4. NOTIFICATION APPLIANCE CIRCUITS (NAC) SHALL BE INSTALLED UTILIZING A CLASS "B" CONFIGURATION IN ACCORDANCE WITH NFPA 72-2010.
- 5. BATTERY BACK-UP FOR THE SYSTEM SHALL PROVIDE SUFFICIENT POWER CAPACITY TO OPERATE THE FIRE ALARM SYSTEM UNDER QUIESCENT MODE FOR A MINIMUM OF 24 HOURS AND THEN BE CAPABLE OF OPERATING SYSTEM DURING A FIRE ALARM EVENT FOR A PERIOD OF 15 MINUTES AT MAXIMUM CONNECTED LOAD PER NFPA 72-2010.
- 6. ALL FIRE ALARM SIGNALS SHALL BE TRANSMITTED TO THE FIRE DEPARTMENT (CENTRAL STATION) VIA A DIGITAL ALARM COMMUNICATOR TRANSMITTER. TRANSMISSION WILL BE VIA TWO (PRIMARY & SECONDARY) DEDICATED TELEPHONE LINES.
- 7. CARBON MONOXIDE DETECTORS SHALL BE INSTALLED IN ACCORDANCE WITH NFPA 720 AND THE MANUFACTURER'S RECOMMENDATIONS.
- 8. HEAT DETECTORS LOCATED IN ELEVATOR MACHINE ROOMS AND/OR ELEVATOR SHAFTS THAT ARE PROTECTED BY SPRINKLERS SHALL BE INSTALLED WITHIN 2 FEET OF EACH SPRINKLER INSTALLED IN THOSE SPACES.
- REFER TO THE FIRE ALARM INPUT / OUTPUT MATRIX FOR SYSTEM SEQUENCE OF OPERATION AND FUNCTIONALITY REQUIREMENTS.
 WIRING DISTANCE FOR NOTIFICATION APPLIANCE CIRCUITS SHALL BE CALCULATED TO ENSURE THAT VOLTAGE AT THE MOST REMOTE DEVICE DOES NOT FALL BELOW THE MINIMUM OPERATING VOLTAGE ALLOWED BY NFPA CODE AND THE MANUFACTURERS
- 11. ALL SPRINKLER WATER FLOW SWITCHES SHALL BE MONITORED BY THE BUILDING FIRE ALARM SYSTEM VIA ADDRESSABLE MONITOR MODULES. REFER TO FIRE PROTECTION DRAWINGS FOR EXACT QUANTITY AND LOCATION OF SWITCHES AND DEVICES.
- 12. ALL SPRINKLER TAMPER SWITCHES SHALL BE MONITORED BY THE BUILDING FIRE ALARM SYSTEM FOR SUPERVISORY CONDITION VIA ADDRESSABLE MONITOR MODULES. REFER TO FIRE PROTECTION DRAWINGS FOR EXACT QUANTITY AND LOCATION OF SWITCHES AND DEVICES

FIRE ALARM INSTALLATION NOTES

- ALL FIRE RATED ASSEMBLIES THAT ARE PENETRATED DURING INSTALLATION WILL BE SEALED WITH AN APPROPRIATE UNDERWRITERS
 LABORATORIES (UL) OR FACTORY MUTUAL (FM) LISTED FIRE-RESISTIVE THROUGH PENETRATION SYSTEM TO CORRESPOND WITH THE
 WALL FIRE-RESISTANCE RATING.
- 2. T-TAPPING OF NOTIFICATION APPLIANCE CIRCUITS (NAC) AND SIGNALING LINE CIRCUITS (SLC) IS NOT PERMITTED.
- 3. POWER FOR THE DOOR HOLDERS SHALL BE 24 VAC. FIRE ALARM SYSTEM WILL CLOSE DOORS WHEN A FIRE ALARM IS REGISTERED IN THE BUILDING.
- 4. ALL ADDRESSABLE RELAY MODULES SHALL BE LOCATED WITHIN 3 FEET OF THE ASSOCIATED DEVICE BEING CONTROLLED OR SHUTDOWN.
- 5. WIRE NUTS SHALL NOT TO BE USED ON THIS PROJECT. USE WAGO-STYLE CONNECTORS OR TERMINAL STRIPS WHERE SPLICES ARE REQUIRED.
- 6. CONDUITS, CABLES, AND RACEWAYS SHALL NOT BE SUPPORTED BY CEILING GRID SYSTEMS. SECURE CONDUITS, CABLES, AND RACEWAYS TO THE BUILDING STRUCTURE.
- 7. ALL FIRE ALARM SYSTEM CONDUCTORS SHALL BE INSTALLED IN ELECTRICAL METAL TUBING (EMT) CONDUIT OR RIGID METALLIC CONDUIT (RMC). CONDUIT SHALL BE A MINIMUM OF 3/4" INSIDE DIAMETER PIPE. CONDUIT OR CABLE SHALL BE MARKED WITH RED PAINT OR TAPE EVERY 10 FEET, OR BE RED IN COLOR.

PRIMARY POWER SUPPLY SHALL BE FROM A SEPARATE FUSED CIRCUIT FREE FROM GROUND FAULTS, SHORTS, OPENS, STRAY OR

- INDUCED VOLTAGE FAULTS, ETC. EACH BREAKER SHALL BE LOCKABLE AND IDENTIFIED AT BOTH THE POWER PANEL AND THE FACP.
- 9. POWER LIMITED CIRCUITS SHALL NOT BE RUN IN THE SAME CONDUIT, RACEWAY, ETC. WITH NON-POWER LIMITED CIRCUITS, UNLESS MEASURES ARE TAKEN, PER CODE, TO ACCOMMODATE BOTH CIRCUITS IN THE SAME PATHWAYS.

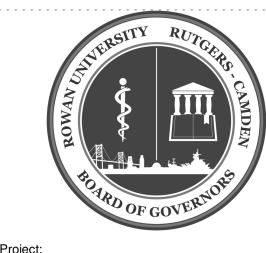
FIRE ALARM DEVICE/EQUIPMENT LEGEND			
	INITIATING DEVICES		
F	MANUAL PULL STATION		
(S)	SMOKE DETECTOR (SIDEWALL MOUNTED)		
Ψ	SMOKE DETECTOR (SIDEWALL MOUNTED)		
(S)	DUCT MOUNTED SMOKE DETECTOR		
<u> </u>	HEAT DETECTOR		
©	CARBON MONOXIDE DETECTOR		
AUTOMATIC DET	ECTOR SUBSCRIPT INDICATES ASSOCIATED CONTROL FUNCTION:		
CO CO(SMA)	COMBINATION SMOKE / CARBON MONOXIDE DETECTOR SINGLE / MULTI-STATION COMBINATION SMOKE / CARBON MONOXIDE DETECTOR		
SMA E	SINGLE / MULTI-STATION SMOKE DETECTOR ELEVATOR RECALL		
ES HV	ELEVATOR POWER SHUTDOWN ELEVATOR HOISTWAY VENT & RECALL		
FSD DR	FIRE/SMOKE DAMPER ACTUATION DOOR RELEASE		
SP S R	STAIR PRESSURIZATION SUPPLY FAN RETURN FAN		
	INTERFACE MODULES		
MM	MONITOR MODULE		
CM	CONTROL MODULE		
RM	RELAY MODULE		
<u></u>	DEVICE OR EQUIPMENT REQUIRING INTERFACE WITH FIRE ALARM SYSTEM		
ACD	AUTOMATIC CONTROL DAMPER (SMOKE CONTROL FAN)		
AV BFP	AUDIO / VISUAL EQUIPMENT FOR EVENT LIGHT AND SOUND SHUTDOWN BACKFLOW PREVENTER		
DR DRY	FIRE RATED DOOR RELEASE DRY ALARM VALVE		
ELEV FPC FS	ELEVATOR CONTROLLER FIRE PUMP CONTROLLER FIRE SUPPRESSION WATERFLOW SWITCH		
FSH FSD	FIRE SUPPRESSION WATERFLOW SWITCH FIRE SHUTTER FIRE SMOKE DAMPER - CONVENTIONAL DUCT DETECTOR		
FSRU GEN	FIRE SUPPRESSION RELEASING CONTROL UNIT GENERATOR INTERFACE		
HVAC OWC	AIR HANDLING EQUIPMENT OPERABLE WINDOW CONTROLLER		
LPS PS	WATER SUPPLY LOW PRESSURE SWITCH SPRINKLER PRESSURE SWITCH		
SCF SEC TS	SMOKE CONTROL FAN INTERFACE SECURITY INTERFACE SPRINKLER SYSTEM VALVE TAMPER SWITCH		
ZCA ZCAP	SPRINKLER ZONE CONTROL ASSEMBLY SPRINKLER ZONE CONTROL ASSEMBLY WITH PRESSURE REDUCING VALVE		
	BOL REPRESENTS ONE OR MORE DISCRETE INTERFACE POINTS. REFER TO WIRING DETAIL FOR INFORMATION.		
	NOTIFICATION APPLIANCES		
# \\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\	COMBINATION VISUAL/AUDIBLE NOTIFICATION APPLIANCE		
c	AUDIBLE NOTIFICATION APPLIANCE		
* ¤	VISUAL NOTIFICATION APPLIANCE		
)®(i	EXTERIOR SIGNALING BEACON		
,©(1			
兌	SPRINKLER WATER FLOW ALARM BELL		
NOTIFICATION AP	PLIANCE SUBSCRIPT INDICATES THE FOLLOWING:		
"#" "C"	CANDELA RATING OF VISUAL ALARM CEILING MOUNTED		
	MISCELLANEOUS		
	OMNI-DIRECTIONAL REPEATER (BDA SYSTEM)		
	MAGNETIC DOOR HOLD-OPEN		
ISM	ISOLATION MODULE		
KB	FIRE DEPARTMENT KEY BOX		
[RAI]	REMOTE ALARM INDICATOR		
<u> </u>	REMOTE ALARM INDICATOR WITH REMOTE TEST SWITCH		
I	EQUIPMENT		
FACU	FIRE ALARM CONTROL UNIT "#" DENOTES NODE NETWORK DESIGNATION		
NODE-#	EMERGENCY COMMUNICATION SYSTEM		
	(INTEGRATED WITH FIRE ALARM CONTROL UNIT)		
FATC	FIRE ALARM TERMINAL CABINET		
RPS	REMOTE POWER SUPPLY		
RAMP	REMOTE AMPLIFIER CABINET		
BDAP	BI-DIRECTIONAL AMPLIFIER BI-DIRECTIONAL AMPLIFIER ALARM PANEL		
	FIRE ALARM REMOTE ANNUNCIATOR		
[FAA]	(LOCATIONS PER OWNER/FIRE DEPT. REQUIREMENTS)		
M	FIRE ALARM MASTER BOX		
DACT	DIGITAL ALARM COMMUNICATOR TRANSMITTER		
FFCP	FIRE FIGHTER'S SMOKE CONTROL PANEL		
PFSP	POST FIRE SMOKE PURGE PANEL (DIV 23)		
GEN	GENERATOR ANNUNCIATOR PANEL (DIV 26)		
NOTES:	l ' '		
I '	ILS USED FOR THIS PROJECT TO A DEVICE DENOTES WEATHERPROOF		

HEAT DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE DUCT MOUNTED SMOKE DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE BE UPSTREAM OF ANY FILTERS, EXHAUST AIR				2) "WP" ADJACENT TO A DEVICE DENOTES WEATHERPROOF		
AREA SMOKE DETECTOR - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR LOBBIES, ELEVATOR AND SPACING PER NFPA 72. - LOCATION AND SPACING PER NFPA 72. - ALL ELEVATOR MACHINE ROOMS CONTAINING MOTORS - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN - ALL ELEVATOR MACHINE ROOM AND HOISTWAY PIT. - AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE - DETECTOR OF ANY FILTERS, EXHAUST AIR - AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE - DETECTOR OF ANY FILTERS, EXHAUST AIR	FIRE ALARM - INITIATING DEVICE SCHEDULE					
MANUAL PULL STATION FWITHIN 200 FT. OF ALL FLOOR AREAS MEASURED ALONG THE PATH OF EGRESSON BOTH SIDES GROUPED OPENINGS OVER 40 FT WIDE WITHIN 5 FT OF EACH SIDE. AREA SMOKE DETECTOR -ALL ELEC/TEL/DATA CLOSETS, ELEVATOR MACHINE ROOMS, ELEVATOR LOBBIES, ELEVATOR HOISTWAYS WHERE SMOKE RELIEF VENTING EQUIPMENT IS LOCATEDOUTSIDE STAIRWELLS WITH STAIR PRESSURIZATION. -ADJACENT TO MAGNETICALLY HELD OPEN FIRE DOORSLOCAL TO ALL FIRE ALARM CONTROL UNITS & REMOTE AMPLIFIERSMECHANICAL ROOMS CONTAINING MOTORS -ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN -ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN -ALL ELEVATOR MACHINE ROOM AND HOISTWAY PIT. -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE DUCT MOUNTED DUCT MOUNTED DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE DETECTOR AND FILTERS, EXHAUST AIR	INITIATING DEVICE	SYMBOL	REQUIRED LOCATIONS	NOTES		
AREA SMOKE DETECTOR ELEVATOR HOISTWAYS WHERE SMOKE RELIEF VENTING EQUIPMENT IS LOCATED. OUTSIDE STAIRWELLS WITH STAIR PRESSURIZATION. - ADJACENT TO MAGNETICALLY HELD OPEN FIRE DOORS. -LOCAL TO ALL FIRE ALARM CONTROL UNITS & REMOTE AMPLIFIERS. -MECHANICAL ROOMS CONTAINING MOTORS - ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN - ALL ELEVATOR MACHINE ROOM AND HOISTWAY PIT. DUCT MOUNTED SMOKE DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE DETECTOR SASSOCIATED WITH AIR HANDLING UNITS SHALL BE UPSTREAM OF ANY FILTERS, EXHAUST AIR		F	- WITHIN 200 FT. OF ALL FLOOR AREAS MEASURED ALONG THE PATH OF EGRESS.			
HEAT DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE DUCT MOUNTED SMOKE DETECTOR -AT ALL FIRE/SMOKE AND SMOKE DAMPER LOCATIONS WHERE FULL SPOT-TYPE SMOKE BE UPSTREAM OF ANY FILTERS, EXHAUST AIR		②	ELEVATOR HOISTWAYS WHERE SMOKE RELIEF VENTING EQUIPMENT IS LOCATED. - OUTSIDE STAIRWELLS WITH STAIR PRESSURIZATION. - ADJACENT TO MAGNETICALLY HELD OPEN FIRE DOORS. -LOCAL TO ALL FIRE ALARM CONTROL UNITS & REMOTE AMPLIFIERS.	-LOCATION AND SPACING PER NFPA 72.		
DUCT MOUNTED DETECTION COVERAGE IS NOT PROVIDED. BE UPSTREAM OF ANY FILTERS, EXHAUST AIR	HEAT DETECTOR	1)	- ALL ELEVATOR MACHINE ROOMS FOR ELEVATOR SHUTDOWN	-INSTALL WITHIN 24 IN. OF EACH SPRINKLER INSTALLED IN AN ELEVATOR MACHINE ROOM AND HOISTWAY PIT.		
- RETURN AIR SYSTEMS OVER 2,000 CFM ON THE SUPPLY SIDE RETURN AIR SYSTEMS 15,000 CFM WITH RETURN AIR RISERS SERVING 2 OR MORE STORIES. LOCATED AT EACH CONNECTION TO THE RISER. - RETURN AIR SYSTEMS OVER 2,000 CFM ON THE SUPPLY SIDE RETURN AIR SYSTEMS OVER 2,000 CFM ON THE SUPPLY SIDE RETURN AIR SYSTEMS OVER 2,000 CFM ON THE SUPPLY SIDE DECONNECTIONS, OUTDOOR AIR COMMENTS OR DECONTAMINATION EQUIPMENT AND APPLIANCES DETECTORS ASSOCIATED WITH FIRE/SMOKE DAMPERS SHALL BE INSTALLED WITHIN 5 FT OF THE DAMPER.	DUCT MOUNTED SMOKE DETECTOR	₩	DETECTION COVERAGE IS NOT PROVIDED RETURN AIR SYSTEMS OVER 2,000 CFM ON THE SUPPLY SIDE RETURN AIR SYSTEMS 15,000 CFM WITH RETURN AIR RISERS SERVING 2 OR MORE STORIES.	CONNECTIONS, OUTDOOR AIR COMMENTS OR DECONTAMINATION EQUIPMENT AND APPLIANCESDETECTORS ASSOCIATED WITH FIRE/SMOKE DAMPERS		
DEVICE OR EQUIP. REQUIRING INTERFACE - INTERFACE MODULE (MONITOR, CONTROL OR RELAY) WITHIN 3' OF ALL EQUIPMENT/DEVICES REQUIRING INTERFACE WITH FIRE ALARM SYSTEM (TAMPER, FLOW & PRESSURE SWITCH, FIRE SMOKE DAMPERS, ETC.). REFER TO FIRE ALARM DETAILS FOR ADDITIONAL INFORMATION.			REQUIRING INTERFACE WITH FIRE ALARM SYSTEM (TAMPER, FLOW & PRESSURE SWITCH, FIRE			

	GENERAL ABE		
A	AMPERES	kVA	KILOVOLT AMPERES
ADA	AMERICANS WITH DISABILITIES ACT	kW	KILOWATTS
AFF	ABOVE FINISH FLOOR	LTG	LIGHTING
AFG	ABOVE FINISH GRADE	LFMC	LIQUID TIGHT FLEXIBLE METAL CONDUIT
AHJ	AUTHORITY HAVING JURISDICTION	LS	LIFE SAFETY
AHU	AIR HANDLING UNIT	MBP	MAINTENANCE BYPASS PANEL
AIC	AMPERE INTERRUPTING CAPACITY	МС	METAL CLAD CABLE
AL	ALUMINUM	МСВ	MAIN CIRCUIT BREAKER
ANSI	AMERICAN NATIONAL STANDARDS INSTITUTE	MCC	MOTOR CONTROL CENTER
ARCH	ARCHITECT	MCP	MOTOR CIRCUIT PROTECTOR
ATS	AUTOMATIC TRANSFER SWITCH	MISC	MISCELLANEOUS
			MAIN LUGS ONLY
ATC	AUTOMATIC TEMPERATURE CONTROL	MLO	
AWG	AMERICAN WIRE GAUGE	MMS	MANUAL MOTOR STARTER
BFG	BELOW FINISH GRADE	MNS	MASS NOTIFICATION SYSTEM
BLDG	BUILDING	NC	NORMALLY CLOSED
BOD	BASIS OF DESIGN	NEC	NATIONAL ELECTRIC CODE
C	CONDUIT	NEMA	NATIONAL ELECTRICAL
CAT	CATALOG		MANUFACTURES ASSOCIATION
СВ	CIRCUIT BREAKER	NFPA	NATIONAL FIRE PROTECTION ASSOCIATI
СВМ	CERTIFIED BALLAST MANUFACTURERS	N.I.C.	NOT IN CONTRACT
СКТ	CIRCUIT	NO	NORMALLY OPEN OR NUMBER
CL	CENTERLINE	NTS	NOT TO SCALE
CLF	CURRENT LIMITING FUSE	P	POLE
COL	COLUMN	PB	PUSHBUTTON
COM	NETWORK COMMUNICATIONS	PNL	PANEL
CP	CONTROL PANEL	POS	PROVIDED UNDER OTHER SECTIONS
CT	CURRENT TRANSFORMER	PT	POTENTIAL TRANSFORMER
CU	COPPER	PVC	POLYVINYL CHLORIDE
CUH	CABINET UNIT HEATER	PWR	POWER
DDL	DIRECT DIGITAL CONTROL	QTY	QUANTITY
DIST.	DISTRIBUTION	REQ'D	REQUIRED
DS	DISCONNECT SWITCH	REF	REFRIGERATOR
DVC	DIGITAL VOICE COMMUNICATION	RM	ROOM
DWG	DRAWING	RMC	RIGID METAL CONDUIT
EC	ELECTRICAL CONTRACTOR	RMS	ROOT MEAN SQUARED
EF	EXHAUST FAN	RNMC	RIGID NON-METALLIC CONDUIT
EM	EMERGENCY		
EMT	ELECTRICAL METALLIC TUBING	RSA	RED STONE ARSENAL FACILITIES DEPT.
		RTU	ROOF TOP UNIT
EPE	EXTERIOR POWER ENCLOSURE	RVNR	REDUCED VOLTAGE NON-REVERSING
EPO	EMERGENCY POWER OFF	SB	STAND BY
EWC	ELECTRIC WATER COOLER	SE	SERVICE ENTRANCE
F	FUSE	SP	SPEAKER CIRCUIT
FA	FIRE ALARM	SW	SWITCH
FCU	FAN COIL UNIT	SYM	SYMMETRICAL
FDS	FUSED DISCONNECT SWITCH	TEL	TELEPHONE
FLA	FULL LOAD AMPERES	TMCB	THERMAL MAGNETIC CIRCUIT BREAKER
FMC	FLEXIBLE METAL CONDUIT	TOC	TOP OF CEILING
FSD	FIRE SMOKE DAMPER	TRAP.	TRAPEZE
		UG .	UNDERGROUND OR UNDERGRADE
FT	FEET GROUND FAULT INTERRUPTER	UL	UNDERWRITERS LABORATORIES
GFI			
GND,G	GROUND OR GROUNDING	U.O.N.	UNLESS OTHERWISE NOTED
GRMC	GALVANIZED RIGID METALLIC CONDUIT	UH	UNIT HEATER
HOA	HAND, OFF, AUTOMATIC SWITCH	UPS	UNINTERRUPTABLE POWER SUPPLY
HPF	HIGH POWER FACTOR	V	VISUAL CIRCUIT
HPU	HYDRAULIC POWER UNIT	VFD	VARIABLE FREQUENCY DRIVE
IG	ISOLATED GROUND	W	WIRE
IEEE	INSTITUTE OF ELECTRICAL AND	WH	WATER HEATER
	ELECTRONIC ENGINEERS	WP	WEATHERPROOF
IMC	INTERMEDIATE METAL CONDUIT	WR	WITHSTAND RATING (AMPS)
INT	INTERLOCK	XFMR	TRANSFORMER
		 	
JB	JUNCTION BOX		DELTA
kcmil	THOUSAND CIRCULAR MILS	Y	WYE
KO	KNOCK OUT	Φ	PHASE

DELEGATED DESIGN SUBMISSION

THE FIRE ALARM DRAWINGS ARE PERFORMANCE BASED. THE ELECTRICAL / FIRE ALARM CONTRACTOR SHALL SUBMIT FOR REVIEW AND APPROVAL AS A DEFERRED SUBMITTAL TO THE AUTHORITY HAVING JURISDICTION THREE (3) SETS OF SIGNED AND SEALED SHOP DRAWINGS AND CALCULATIONS INDICATING THE FIRE ALARM SYSTEM LAYOUT INCLUDING FINAL DEVICE LOCATIONS. THE PROFESSIONAL SHALL REVIEW THE SHOP DRAWINGS AND CALCULATIONS PRIOR TO THE DEFERRED SUBMISSION TO THE AHJ AND PROVIDE NOTATION ON THE DRAWINGS INDICATING THEY WERE REVIEWED AND APPROVED BY THE PROFESSIONAL. SUBMIT APPROVED DRAWINGS AND CALCULATIONS WITH THE REQUIRED APPLICATION FEE PRIOR TO INSTALLATION. SIGNED AND SEALED DOCUMENTS SHALL BE PREPARED BY A LICENSED ENGINEER CERTIFIED IN THE STATE WHICH THE PROJECT IS LOCATED.



JOINT HEALTH SCIENCES CENTER - CAFE FITOUT

Rowan University - Rutgers Camden Board of Governors 200 Federal Street, Suite 300 Camden, NJ 08103 Contract No: 16.07011.12



HOK

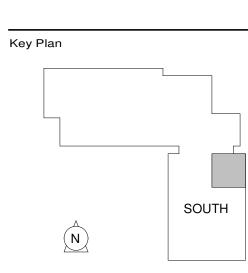
One Logan Square, Suite 1510 Philadelphia, PA 19103 USA t +1 215 940 3570 f +1 215 940 3571

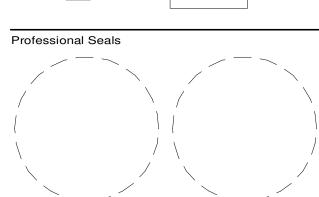
All reproduction & intellectual property rights reserved © 2016
In Association with:

J.F. McKernan Jr. Architects
& Assoc., LLC
100 Dobbs Lane, Suite 204
Cherry Hill, NJ 08034

R.G. Vanderweil Engineers,

VANDERWEIL 101 Grovers Mill Road Lawrenceville, NJ 08648





No.	Description	Da
1	ISSUED FOR CONSTRUCTION	01/17/2020
	1	

Drawn by: JD Reviewed by: BC Project No: 16.07011.12

ISSUED FOR CONSTRUCTION - 01.17.20
Sheet Title

FIRE ALARM LEGEND SHEET