

ADDENDUM

Project: West Point Jr Seminary

Project No.: 501-9425-22020101

Addendum No.: 2

Project Address: 4342 W 920 S St, West Point, UT

Date: 5/24/2024

Owner: Corporation of the Presiding Bishop of The Church of Jesus Christ of Latter-day Saints, a Utah corporation sole

From (Architect): Uncommon Architects

Instructions to Prospective Bidders:

This Addendum forms a part of the Contract Documents and modifies the original Bidding Documents and/or prior Addenda as noted below. All conditions, requirements, materials and workmanship are to be as described in the Contract Documents unless specifically stated otherwise. This Addendum consists of 47 page(s) and the attached drawing(s), Sheet(s) listed below, dated 5/24/2024

1. Changes to prior Addenda:
 - a. Spec section 10 1495 – See description of revisions below
 - b.
2. Changes to Bidding Requirements:
 - a.
 - b.
3. Changes to Conditions of the Contract:
 - a.
 - b.
4. Changes to Specifications:
 - a. Revised Table of Contents to include new sections 06 6116, 07 5556, and 06 6001
 - b. Revised section 10 8200 - Model number of roof screen added to the specs and the numbering of subsections have been fixed.
 - c. Revised section 10 1495 – Specifications for interior signage updated to match the new details provided as part of this addendum.
 - d. New section 06 6116 added –Solid Surface Countertop specifications
 - e. New section 07 5556 added – Fluid Applied membrane specifications for the built-in gutter
 - f. New section 06 6001 – Specifications for the Solid Surface Window Stools
5. Changes to Drawings:
 - a. Sheet F101 – New details A5 and D5 added to clarify the interior signage design
 - Revised locations of artwork
 - Location of corner directional signage added to the 'Finish & Signage Plan'
 - b. Sheet A561 – New detail added for the metal awnings
 - New detail added for the roof screen added
 - b. Sheet A190 – Keynotes added to clarify the scope of the roof screen.

- c. Sheet ET101 – Change sheet keynote #1 to: "Provide 1.25" conduit to connect to intercom conduit to school.
- d. Sheet TA601 – Remove wireless audio equipment from equipment list
- e. Sheet TA602 – Diagram #5: update to show hardwired connection to school intercom.
- f. Sheet TT601 – Add "SD" cable to Audio-Video Cable Equipment List.
- g. Sheet E190 – Heat cable added to gutters and downspout
- h. Sheet E603- Heat tape added to Panel "M"
- i. Sheet E110.1 – Access control added to the power plan on the north and south entrances, along with an ADA door operator at the north entrance
- j. Sheet S600 – Sheet was missing in the bid set.

QUESTIONS

- 1. I can't seem to find a spec on the size of steel going on top of the two awnings. Also, I can't find any details on the fence that's on the roof that hides the mechanical units, I'm just wondering if it's made from steel or not.
 - a. Answer: See added detail A3/A561 (included in this addendum) for more information on the exterior louver awnings. The screen on the roof is a prefabricated screen supported by HSS posts, which are not provided by the manufacturer but are specified on the structural roof plan. Refer to the structural roof framing plan and details, as well as the specification section 10 8200 for more information.

End of Addendum



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THE CHURCH OF
JESUS CHRIST
OF LATTER-DAY SAINTS

WEST POINT SEMINARY

4342 W 920 SOUTH ST., WEST POINT, UTAH

BID SET

JOB NUMBER: 501-9425
OWNER: The Church of Jesus Christ of Latter-Day Saints

DATE: 05.08.2024

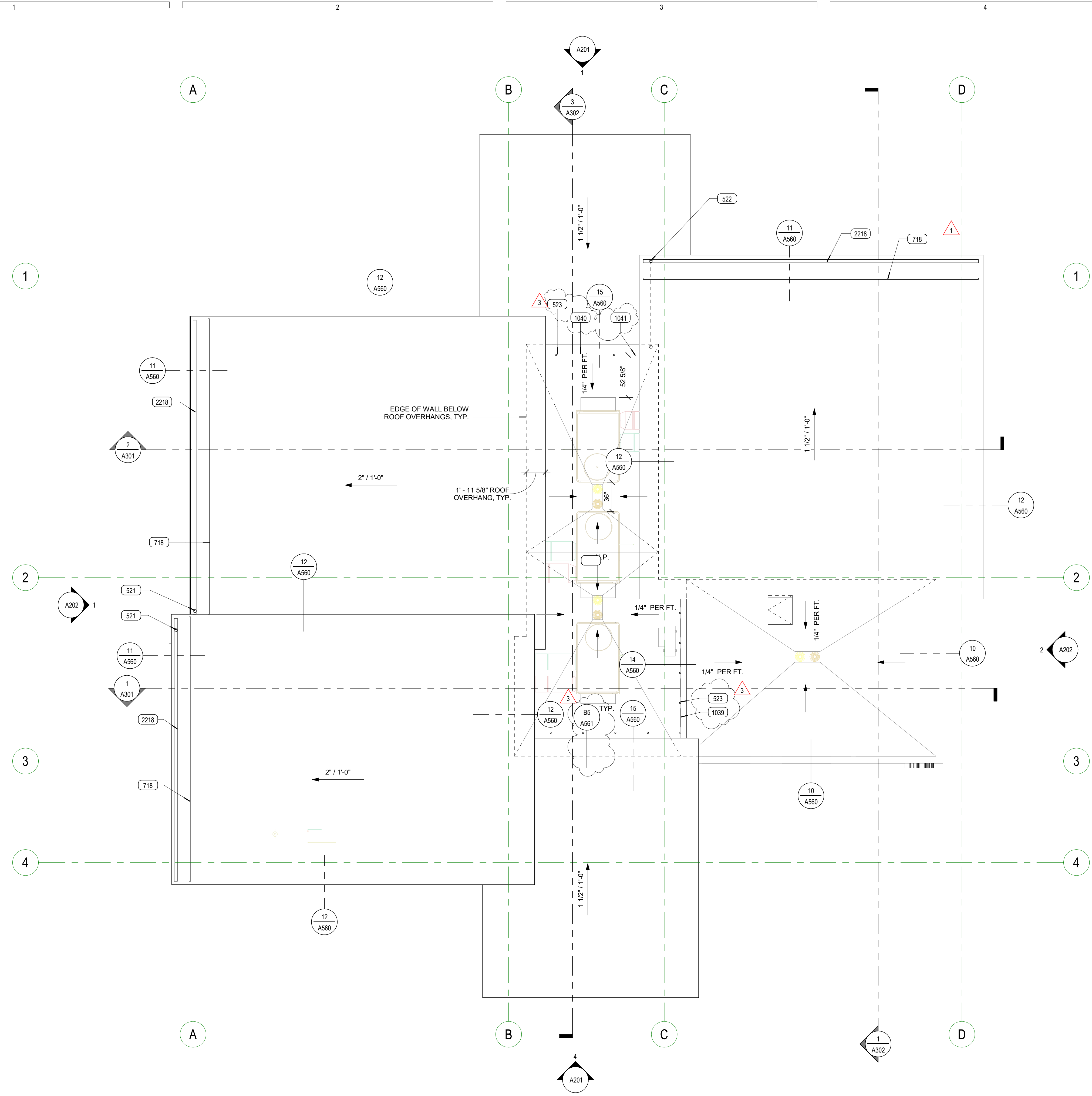
REV	DATE	DESCRIPTION
1	5/16/2024	Plan Check Revisions
3	5/22/2024	addendum 2

OVERALL ROOF
PLAN - LEVEL 01

A190

KEYED NOTE

- 1 521 DOWNSPOUTS, SEE CIVIL FOR DRAINAGE CONNECTION.
- 2 522 DOWNSPOUT ROUTED TO DRAIN ONTO THE FLAT ROOF AREA.
- 3 523 HSS POSTS TO SUPPORT ROOF SCREEN, SEE STRUCT. DWG.
- 4 718 SNOW GUARD ALONG ENTIRE ROOF WIDTH.
- 5 1039 6'-5" HT. PREFABRICATED ROOF SCREEN MOUNTED TO HSS POSTS. SEE SPEC.
- 6 1040 5'-0" HT. PREFABRICATED ROOF SCREEN MOUNTED TO HSS POSTS. SEE SPEC.
- 7 1041 4'-6" HT. SINGLE PANEL PREFABRICATED ROOF SCREEN MOUNTED TO HSS POSTS. SEE SPEC.
- 8 2218 BUILT-IN METAL GUTTER TO SLOPE TOWARDS DOWNSPOUT-SEE CIVIL AND PLUMBING.



1 FLOOR PLAN - ROOF PLAN
3/16" = 1'-0"

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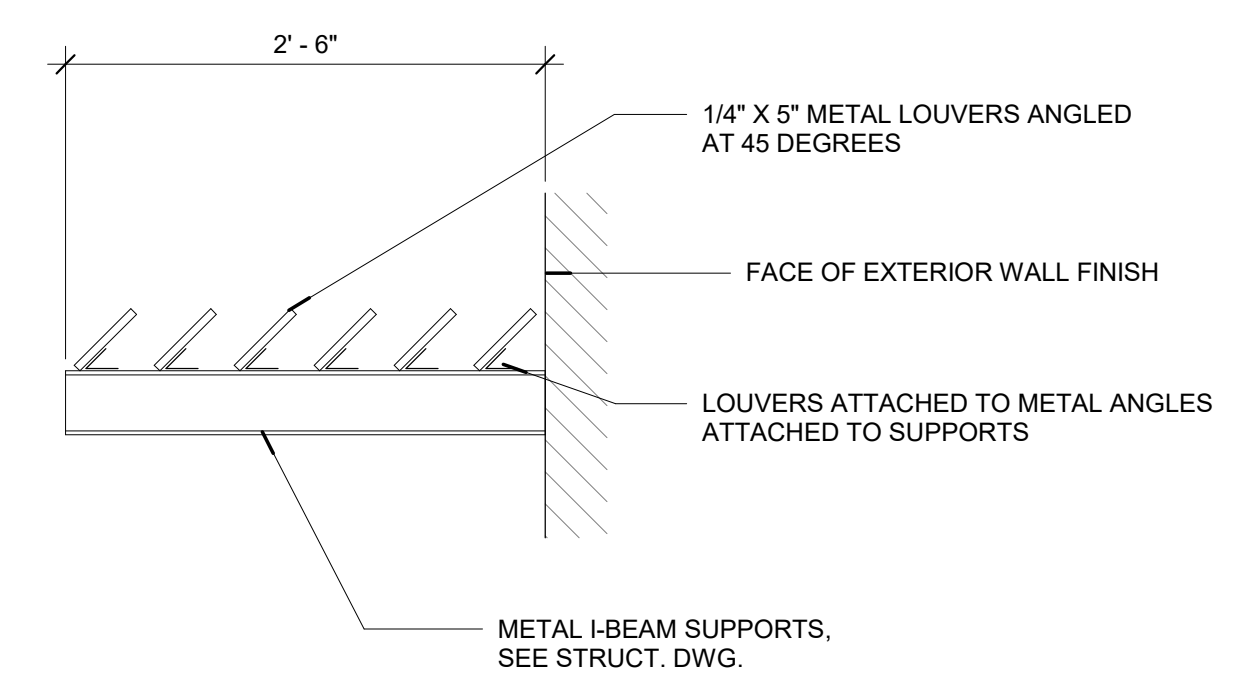
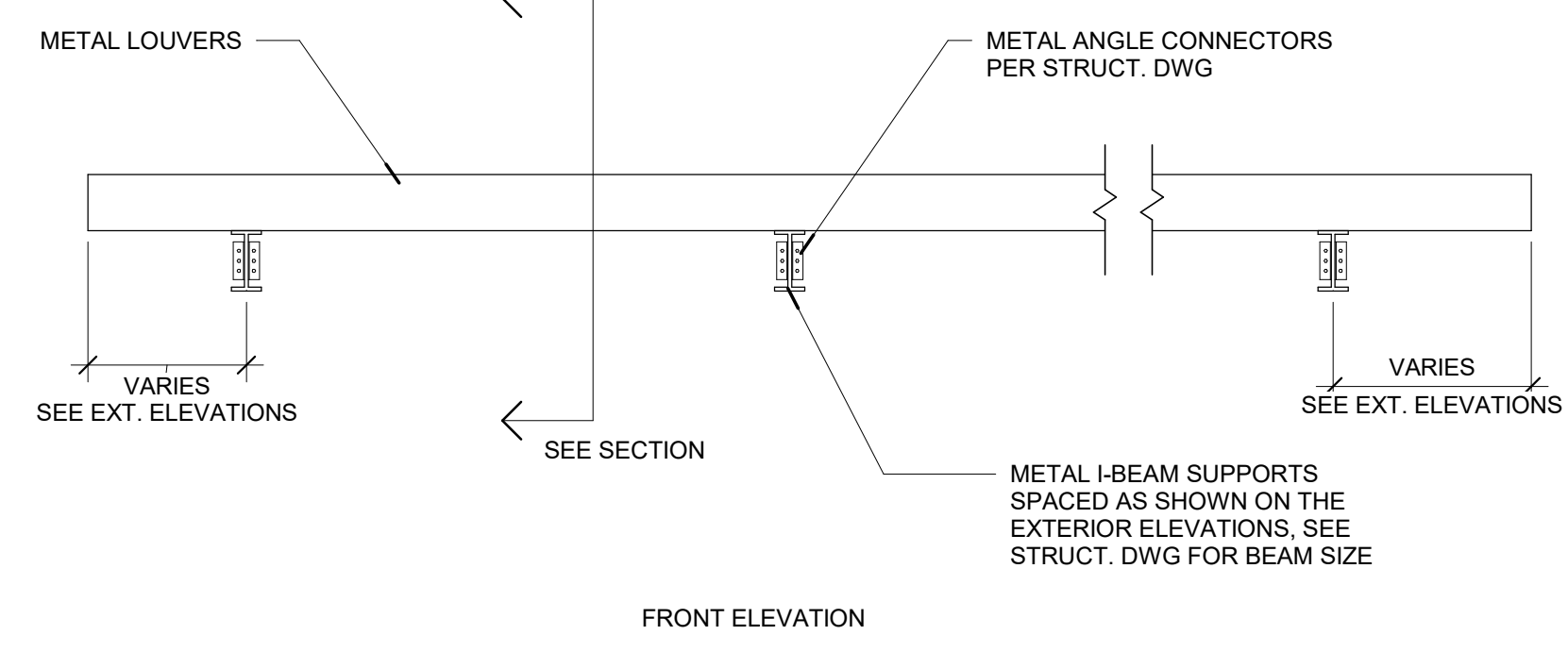
WEST POINT SEMINARY
4342 W 920 SOUTH ST., WEST POINT, UTAH
BID SET

JOB NUMBER: The Church of Jesus Christ of Latter-Day Saints
OWNER: The Church of Jesus Christ of Latter-Day Saints
DATE: 05.08.2024

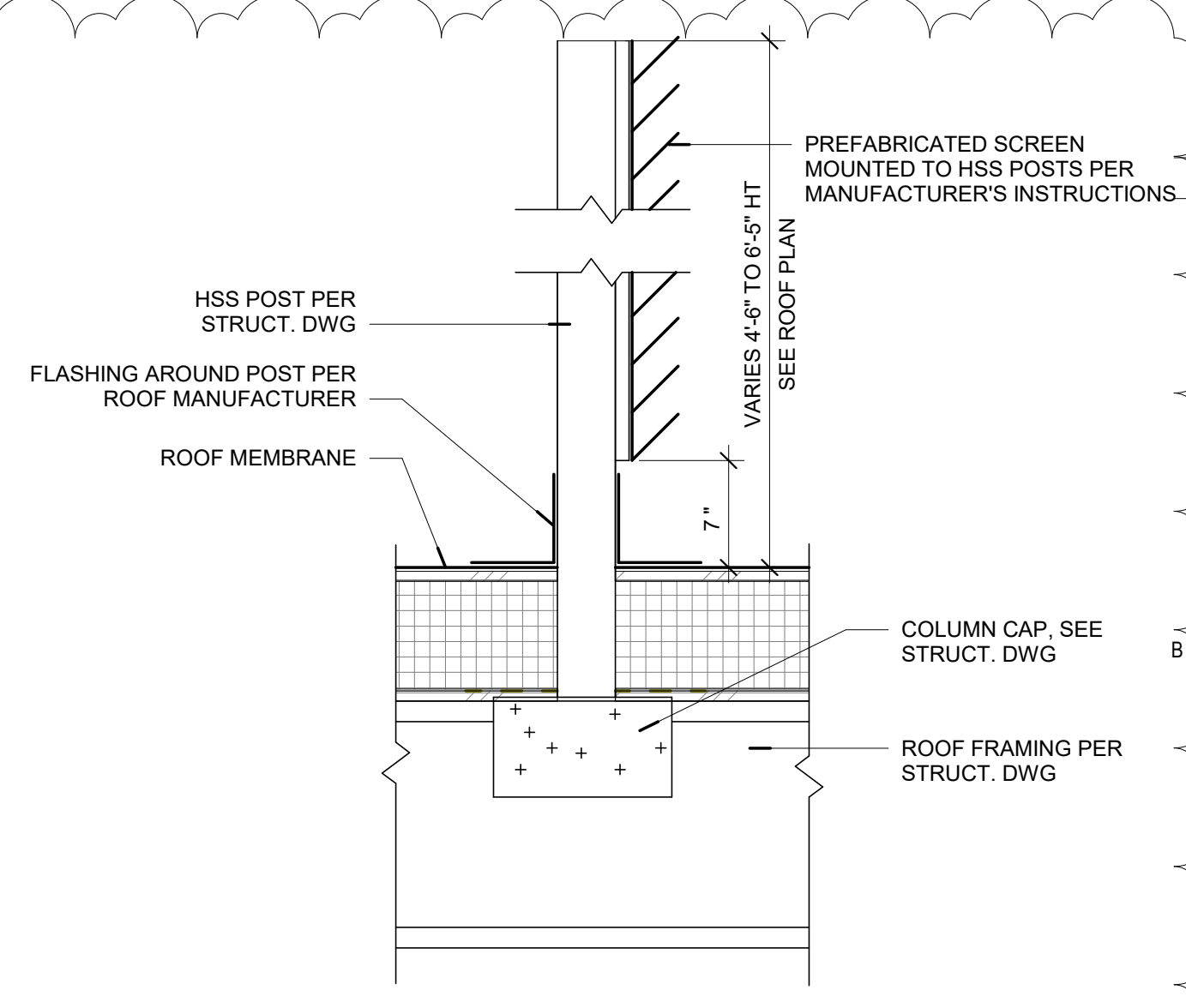
REV DATE DESCRIPTION
3 5/22/2024 addendum 2

ROOF DETAILS

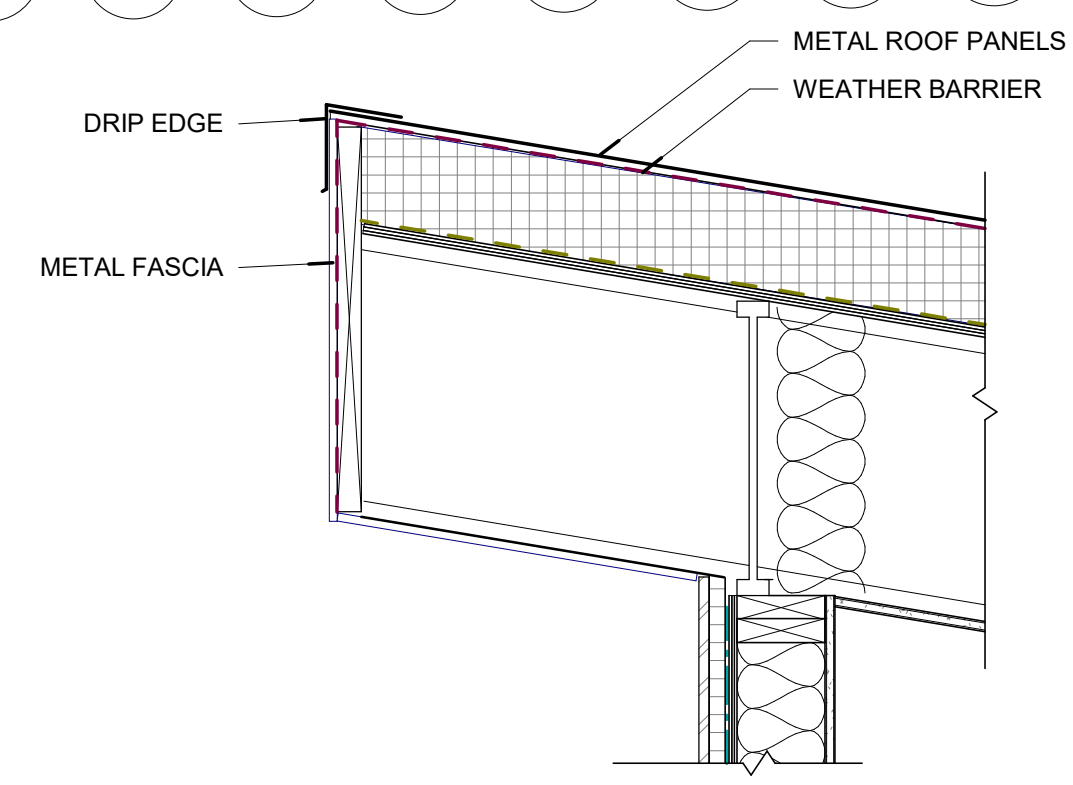
A561



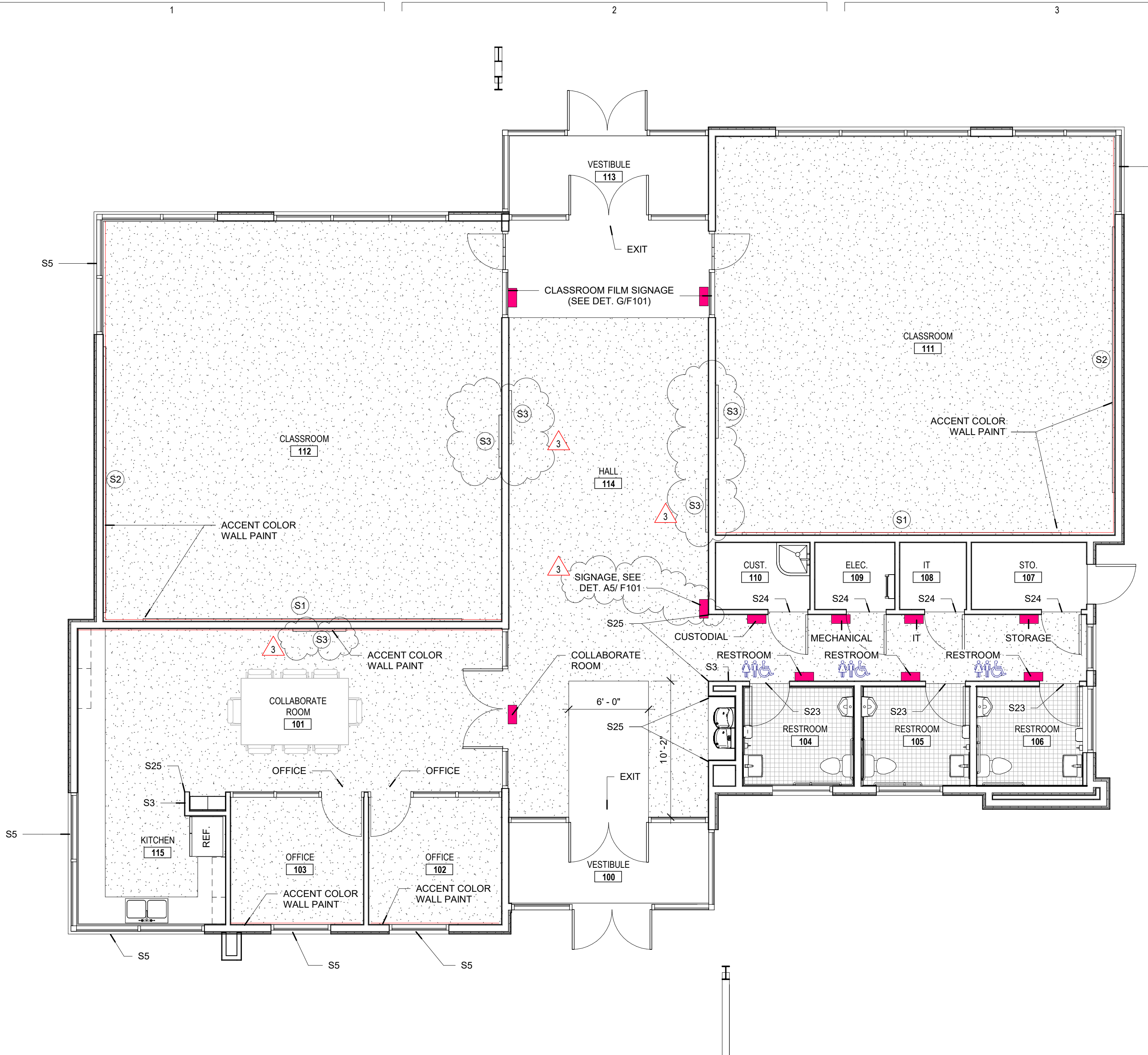
A3 AWNING DETAIL



B5 ROOF SCREEN SUPPORT DET.



A5 ROOF - FASCIA - TYPICAL CONDITION 2



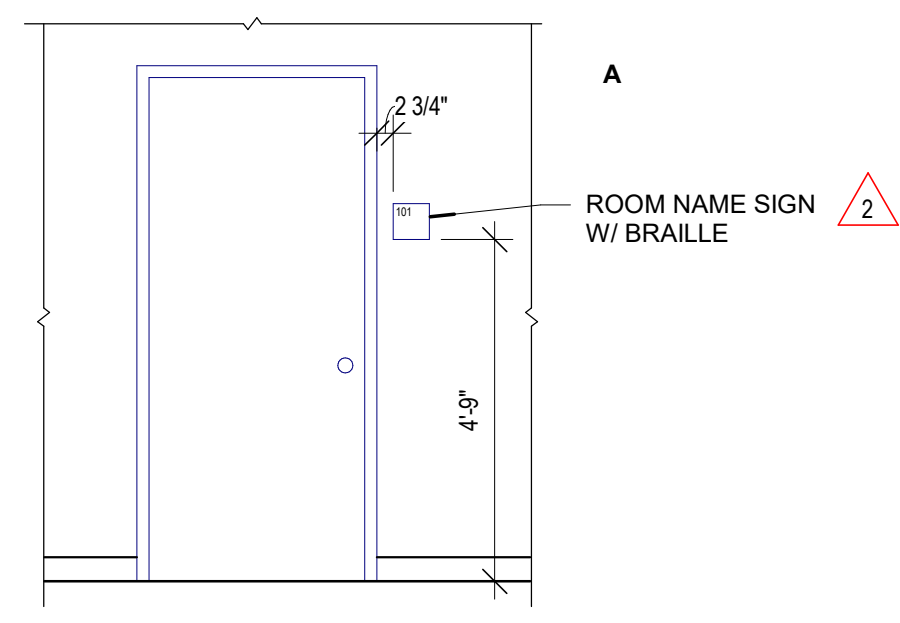
3 FINISH & SIGNAGE PLAN
3/16" = 1'-0"

FINISH SCHEDULE						
ROOM NO.	NAME	FLOOR	BASE	WALL	CEILING	SPECIAL TRIM OR EQUIP.
100	VESTIBULE	F5	B1	W1	C2	
101	COLLABORATE ROOM	F1	B1	W1	C2	S5, S22
102	OFFICE	F1	B1	W1	C2	S5
103	OFFICE	F1	B1	W1	C2	S5
104	RESTROOM	F2	B2	W1	C2	S18, S20, S22
105	RESTROOM	F2	B2	W1	C2	S18, S20, S22
106	RESTROOM	F2	B2	W1	C2	S18, S20, S22
107	STO.	F3	B3	W1	C2	S22
108	IT	F3	B3	W1	C2	S9, S17, S22, S25
109	ELEC.	F3	B3	W1	C2	S7
110	CUST.	F3	B3	W1	C2	S2, S7, S8, S9, S13, S21, S25
111	CLASSROOM	F1	B1	W1	C1	W2, S4, S5, S16, S19, S22
112	CLASSROOM	F1	B1	W1	C1	W2, S4, S5, S16, S19, S22
113	VESTIBULE	F5	B1	W1	C2	S1
114	HALL	F1, F5	B1	W1	C2	S5, S22
115	KITCHEN	F1	B1	W1	C2	S5, S12, S17, S22, S25
116	HALL	F1	B1	W1	C2	

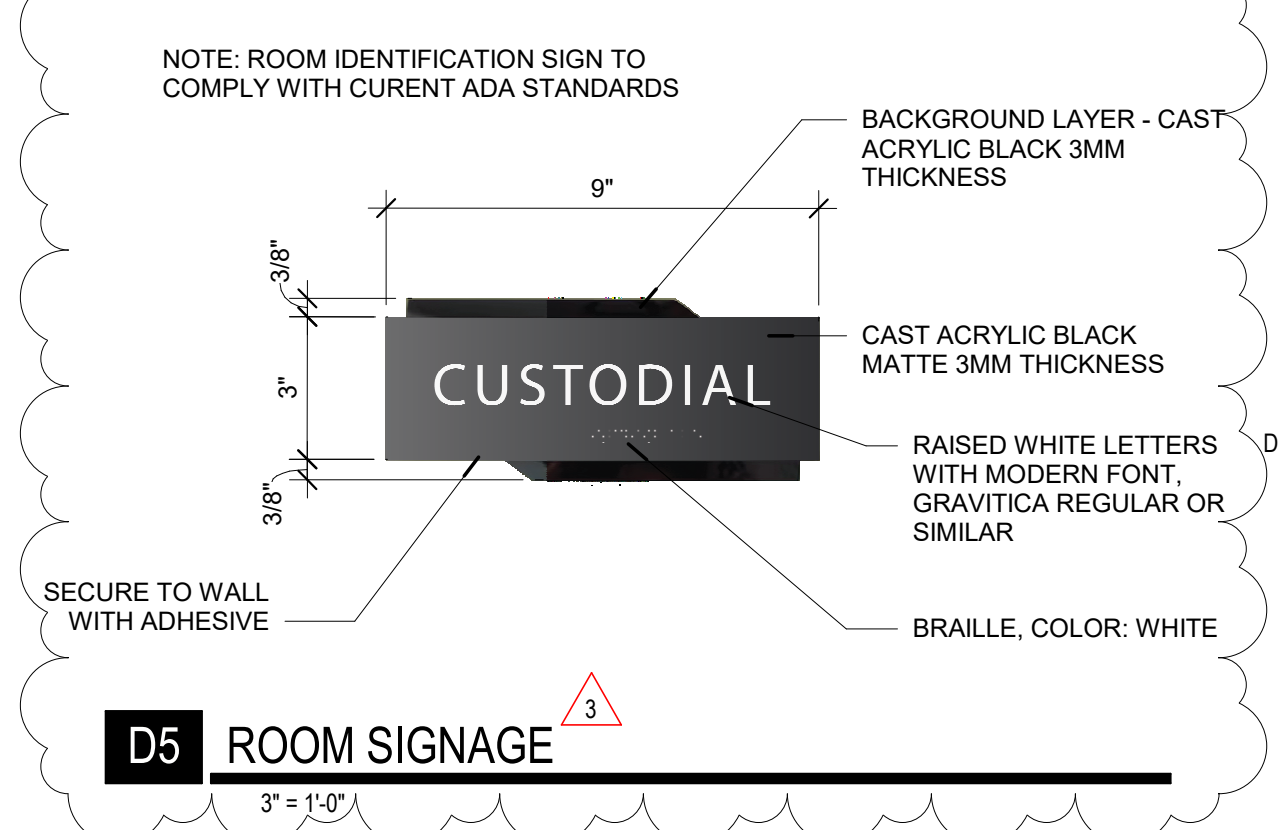
SIGNAGE SCHEDULE						
PLAN ROOM #	COUNT	SIGNAGE NAME ROOM OR NUMBER	SIZE	MOUNTING	COMMENTS	PLAN ROOM NAME
110	1					CUST.
111	1	CLASSROOM		B4/F101	MOUNT ON SIDELIGHT	CLASSROOM
112	1	CLASSROOM	6" X 6"	B4/F101	MOUNT ON SIDELIGHT	CLASSROOM
101	1	COLLABORATE ROOM	6" X 6"	B5/F101	MOUNT ON SIDELIGHT	COLLABORATE ROOM
110	1	CUSTODIAL CLOSET	6" X 6"	D4/F101		CUST.
109	1	ELECTRICAL	6" X 6"	D4/F101		ELEC.
108	1	IT	6" X 6"	D4/F101		IT
104	1	RESTROOM	6" X 6"	D4/F101		RESTROOM
105	1	RESTROOM	6" X 6"	D4/F101		RESTROOM
106	1	RESTROOM	6" X 6"	D4/F101		RESTROOM
107	1	STORAGE	6" X 6"	D4/F101		STO.

FINISH SCHEDULE LEGEND	
F FLOOR	S SPECIAL TRIM OR EQUIPMENT
F1 CARPET (OWNER PROVIDED, OWNER INSTALLED)	S1 24" WRITABLE SURFACE, OWNER PROVIDED & OWNER INSTALLED
F2 TILE	S2 20" WRITABLE SURFACE, OWNER PROVIDED & OWNER INSTALLED
F3 CONCRETE W/ SEALER	S3 ARTWORK, OWNER PROVIDED & CONTRACTOR TO INSTALL
F4 WOOD - PAINTED	S4 MIRROR
F5 WALK-OFF	S5 ROLLER SHADES
B BASE	S20 RESTROOM ACCESSORIES
B1 CARPET	S21 FLOOR MOUNTED CUSTODIAL SINK
B2 TILE, COVED	S22 BUILT-IN CABINETS AND/OR COUNTERTOPS
B3 4" RUBBER BASE	S23 STONE THRESHOLD
C CEILING	S24 METAL THRESHOLD
C1 ACOUSTIC CILING TILE	S25 CORNER GUARD
C2 GYP BOARD	
W WALLS	
W1 GYPSUM BOARD - TEXTURED FINISH - PAINTED	
W2 WALL RUB RAIL, 24" AFF TO BOTTOM OF RAIL	
W3 WALL COVERING "C" (ACOUSTICAL WALL CARPETING)	SEE SPECIFICATIONS FOR WALL FINISH TEXTURES
W4 CERAMIC TILE - VERTICAL STACK	
W5 7/16" WOOD SHEATHING, PAINTED	
W6 GYPSUM BOARD - TAPED - NOT PAINTED	
W7 CERAMIC TILE - HERRINGBONE PATTERN	
W8 GYPSUM BOARD - TEXTURED FINISH - ACCENT PAINT	

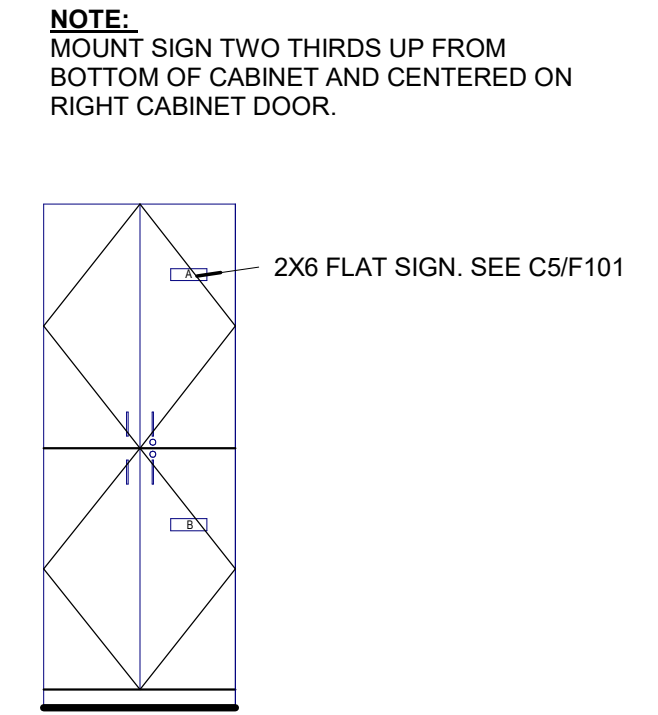
DISPLAY BOARD			
TYPE MARK	FAMILY	ROOM: NUMBER	ROOM: NAME



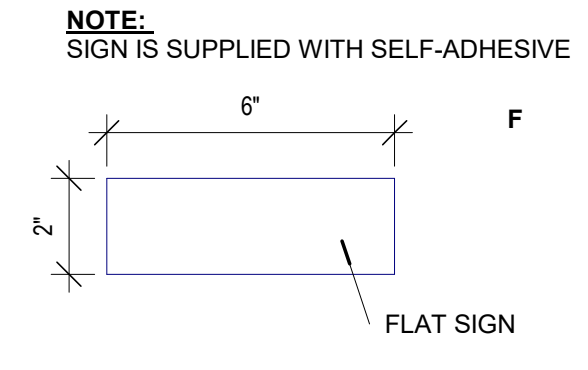
D4 MOLDED SIGN MOUNTING
3/8" = 1'-0"



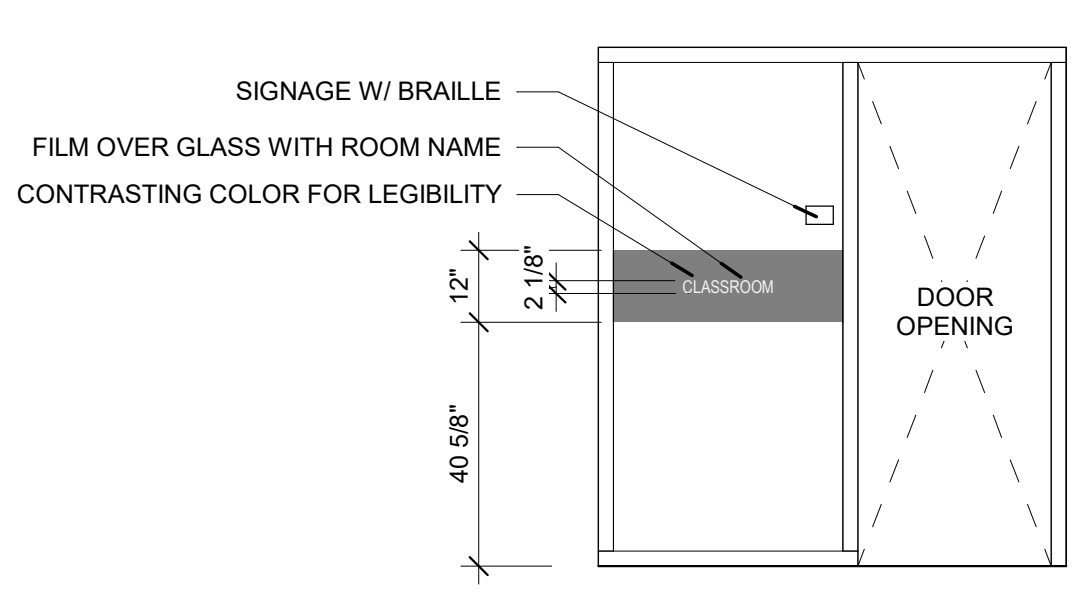
D5 ROOM SIGNAGE
3" = 1'-0"



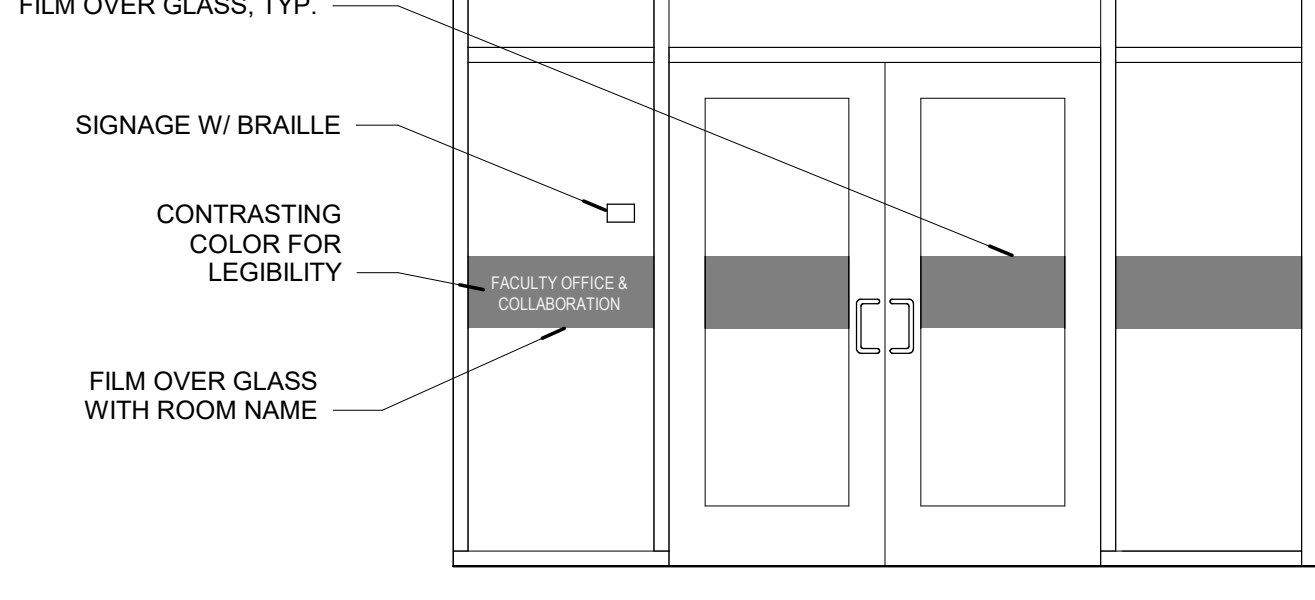
C4 FLAT SIGN CABINET MOUNTING
3/8" = 1'-0"



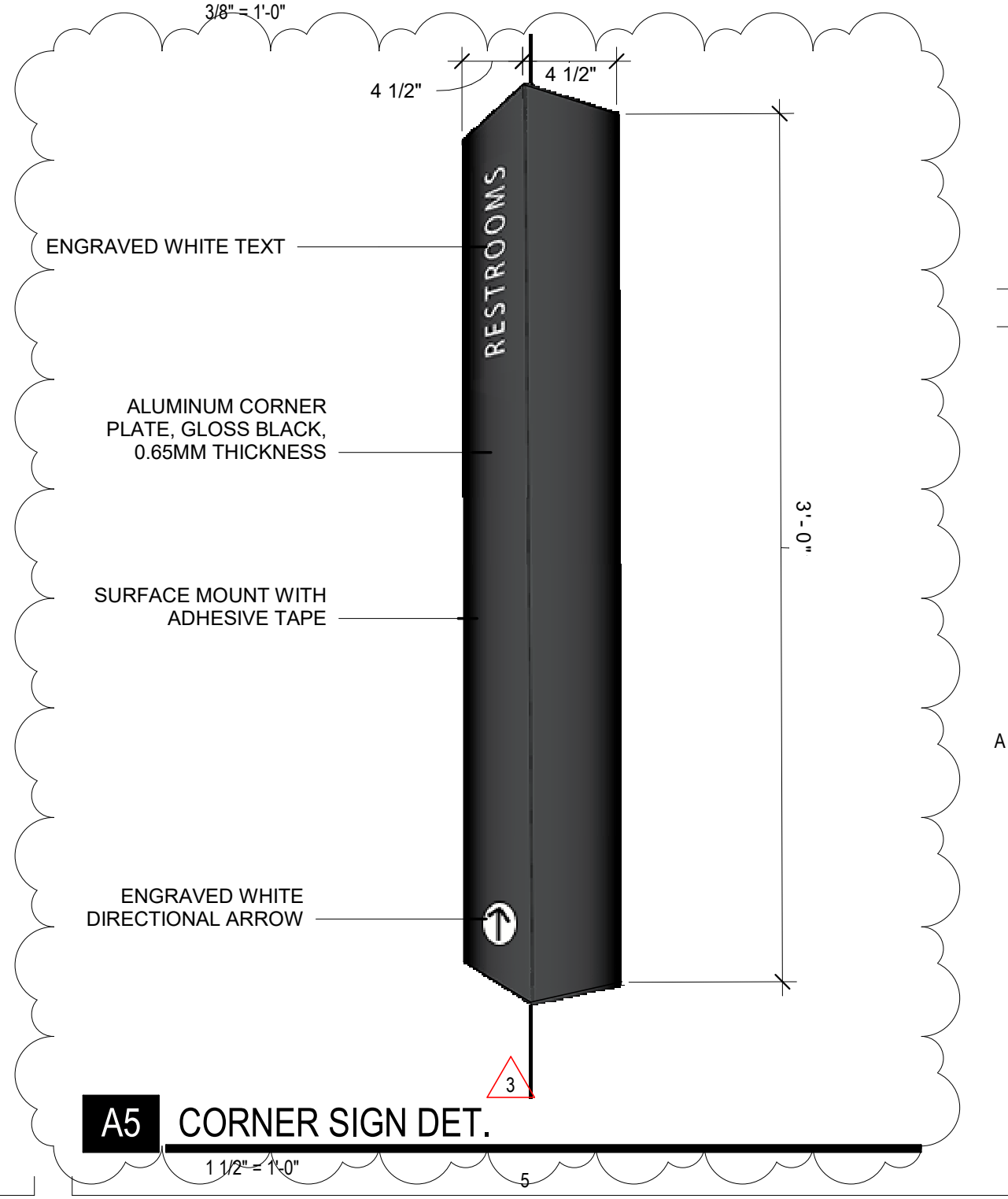
C5 FLAT SIGN DETAIL
3" = 1'-0"



B4 CLASSROOM SIGN
3/8" = 1'-0"



B5 COLLABORATIVE ROOM SIGN
3/8" = 1'-0"



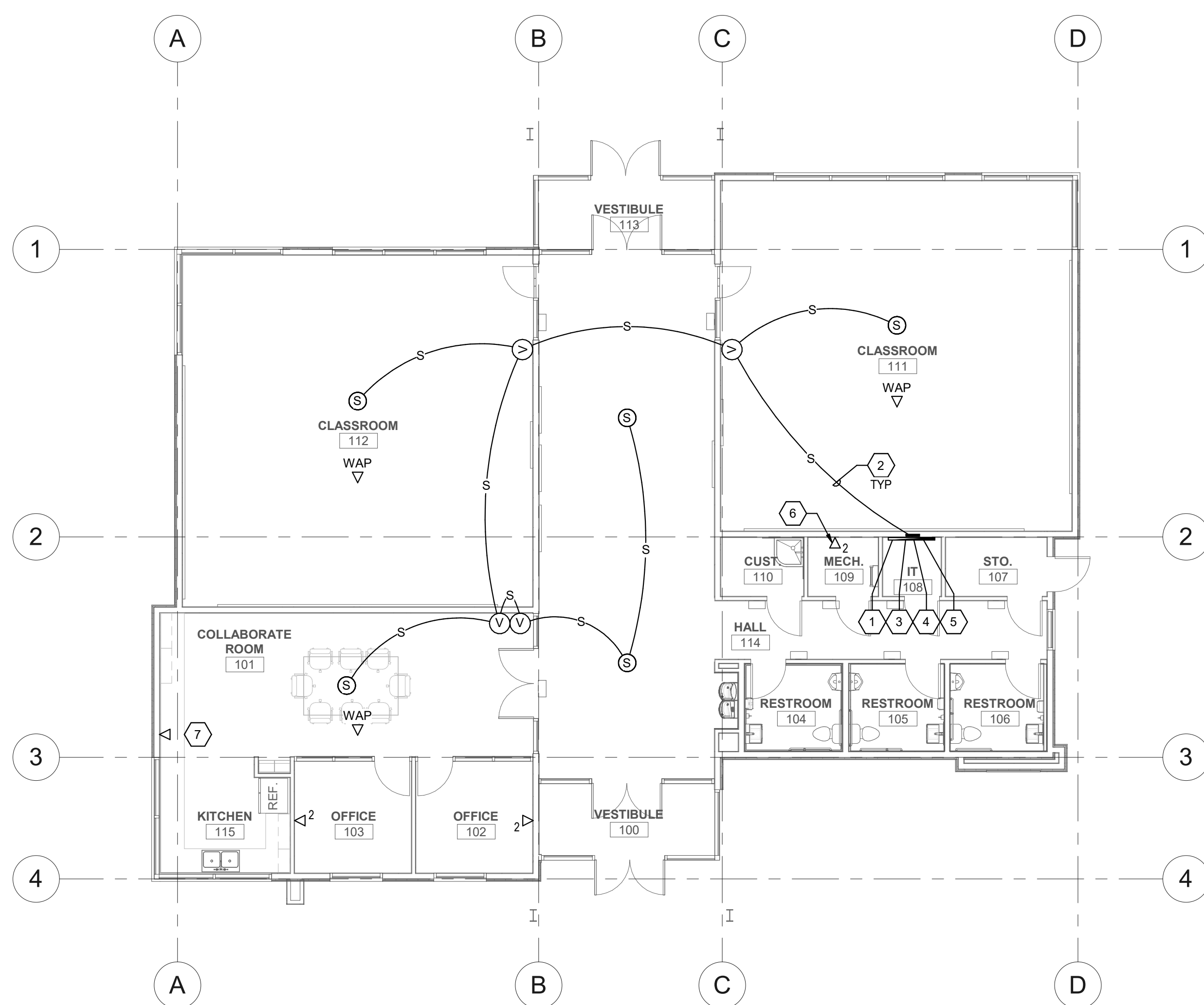
A5 CORNER SIGN DET.
1 1/2" = 1'-0"

GENERAL SHEET NOTES

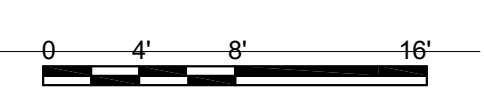
- NO CHANGES SHALL BE MADE WITHOUT THE PROJECT AV/STRUCTURED CABLING CONSULTANT'S WRITTEN CONSENT.
- REFER TO DRAWINGS FOR EXACT NUMBER OF COMPONENTS USED IF NOT SPECIFIED IN EQUIPMENT LIST.
- DIVISION 26 INSTALLER IS TO PROVIDE ALL ROUGH-IN INDICATED FOR DIVISION 27 INSTALLER. ALL ROUGH-IN SHALL COMPLY WITH ANSITIA/EIA 569-B STANDARDS. THIS INCLUDES, BUT IS NOT LIMITED TO, THE LIMITATION OF (2) 90° BEND FOR CONDUIT. IT IS THE DIVISION 26 INSTALLERS RESPONSIBILITY TO ENSURE COMPLIANCE WITH STANDARD. VOICE-DATA CABLE SHALL BE INSTALLED IN MINIMUM 1" CONDUIT.
- RACEWAY SHALL BE INSTALLED BY DIVISION 26. CABLING SHALL BE INSTALLED BY DIVISION 27. VOICE-DATA CABLING AND TERMINATIONS SHALL COMPLY WITH SECTION 27 1501.
- SPEAKER TRIM RINGS ARE FURNISHED BY DIVISION 27 AND INSTALLED BY DIVISION 26.
- ET SHEETS SHOW WORK AND MATERIALS BY DIVISION 26 AND DIVISION 27. SEE SPECIFICATIONS AND DRAWING NOTES FOR RESPONSIBILITY FOR EACH ITEM.
- ALL CONDUIT STUBS SHALL BE LABELED WITH DESTINATION.
- PROVIDE 200# NYLON PULL CORD IN ALL EMPTY CONDUITS AND TAG BOTH ENDS. CONDUITS SHALL COMPLY WITH ANSITIA/EIA 569-A STANDARDS.
- WHERE LOCATED IN INACCESSIBLE WALL, CEILING, OR ATTIC SPACES, AUDIO, VIDEO, AND CONTROL CABLE TO BE INSTALLED IN CONDUIT. CONDUIT SHALL BE A MINIMUM OF .75" UNLESS NOTED OTHERWISE.
- INSTALL ALL VOICE-DATA OUTLETS WITHIN 6" OF POWER.
- PROVIDE SEISMIC WIRES SECURED TO STRUCTURE FOR ALL SPEAKER LOCATIONS.

SHEET KEYNOTES

- PROVIDE 1.25" CONDUIT TO CONNECT TO INTERCOM CONDUIT TO SCHOOL. COORDINATE EXACT LOCATION WITH ARCHITECT.
- SPEAKER CABLE BY DIVISION 27. CONDUIT NOT REQUIRED IN LAY-IN CEILINGS.
- PROVIDE 3 EACH, 2" CONDUITS TO ACCESSIBLE RECEPTION AREA CEILING SPACE.
- PROVIDE CONDUIT TO TELCO PROVIDER. VERIFY CONDUIT SIZE WITH PROVIDER.
- PROVIDE CONDUIT TO CABLE PROVIDER. VERIFY CONDUIT SIZE WITH PROVIDER.
- MOUNT NEXT TO 'BMG' BUILDING MANAGEMENT GATEWAY NETWORK INTERFACE. SEE SHEET ME101.
- INSTALL DATA ADJACENT TO POWER FOR COPIER.

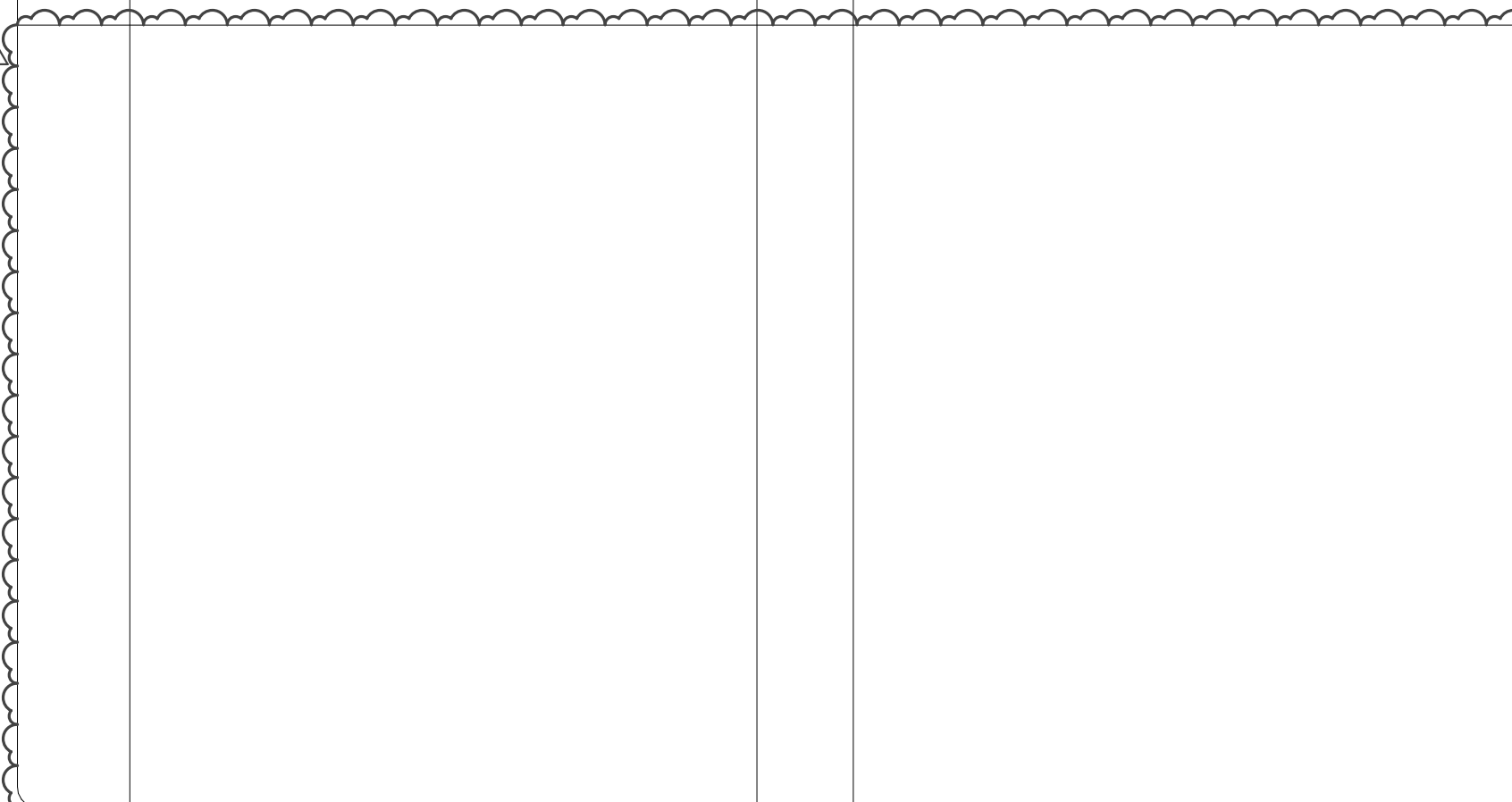


1 AV Rough-in Plan
SCALE: 1/8" = 1'-0"

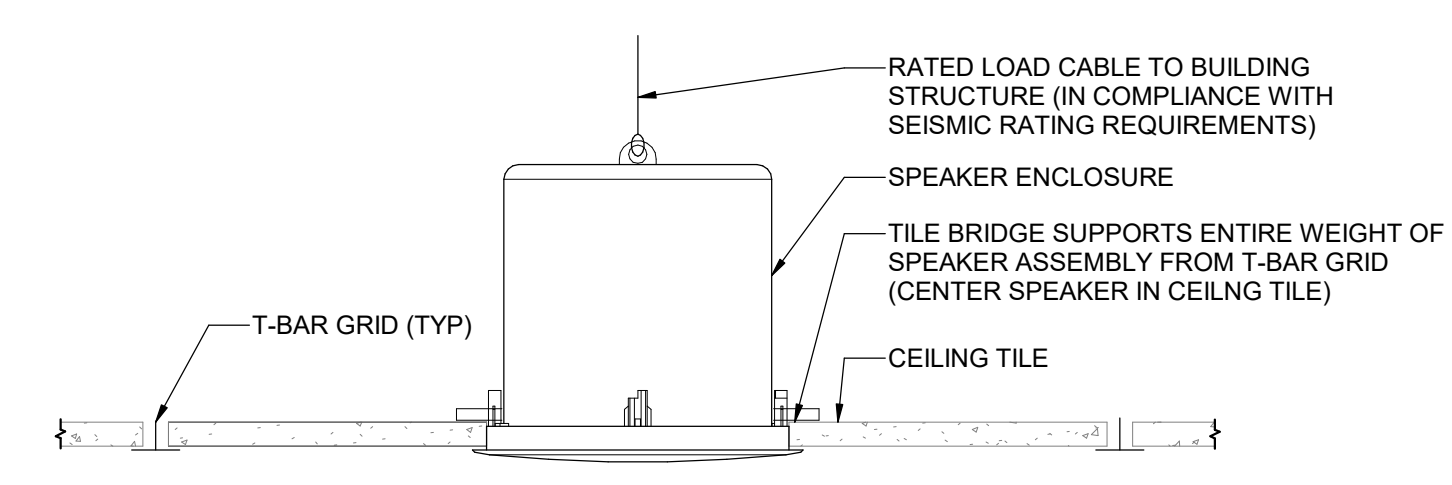


AUDIO-VIDEO SYSTEM EQUIPMENT LIST

SYM	DESCRIPTION	QTY	ACCEPTABLE TYPES
[A/D]	EQUIPMENT RACK, WALL MOUNTED, 12RU, AND DOOR	2	MIDDLE ATLANTIC DWR-12-22, PFD-12
[AI]	AUDIO INTERFACE, STEREO UNBALANCED TO MONO BALANCED, PASSIVE	A/R	EXTRON ASA141 RADIO DESIGN LABS TX-J2
[MA]	MIXER AMPLIFIER, 120 WATT	OFF	TOA A-712 ATLAS SOUND AA120
[TVSS]	TRANSIENT VOLTAGE SURGE SUPPRESSOR, 15 AMP, IN LECTERN	OFF	TRIPP-LITE ISOBAR 6 ULTRA, OR APPROVED EQUAL
[TVSS]	TRANSIENT VOLTAGE SURGE SUPPRESSOR, 20 AMP, RACK MOUNTED	OFF	TRIPP-LITE IBAR 12-20 ULTRA, OR APPROVED EQUAL
[S]	SPEAKER, 4" W/ GRILLE, ENCLOSURE, AND TILE BRIDGE, LAY-IN CEILING TILE	OFF	ATLAS SOUND FAP42T COMMUNITY C4
[V]	VOLUME CONTROL	OFF	EMTECH MSC-V35 ATLAS SOUND AT35D LABEL PER DETAIL
[V]	NYLON DECORA COVER PLATE, 1-GANG		HUBBELL OR LEVITON
[BSC]	BELL SYSTEM CONTROLLER	OFF	ALGO 8301 PAGING ADAPTER
	LINE TRANSFORMER	A/R	RADIO DESIGN LABS TX-1A PRO CO LOT-1



MANUFACTURER'S NAMES AND TELEPHONE NUMBERS ARE LISTED IN THE SPECIFICATIONS
A/R = AS REQUIRED, OFF = OBTAIN FROM PLANS
OFI = OWNER FURNISHED AND INSTALLED, OFCI = OWNER FURNISHED, CONTRACTOR INSTALLED



LAY-IN CEILING TILE

1 CEILING SPEAKER INSTALLATION DETAIL
SCALE: 1/8" = 1'-0"

GENERAL PROJECT NOTES

- NO CHANGES SHALL BE MADE WITHOUT THE PROJECT AUDIO-VISUAL/ACOUSTICAL CONSULTANT'S WRITTEN CONSENT.
- REFER TO DRAWINGS FOR EXACT NUMBER OF COMPONENTS USED IF NOT SPECIFIED IN EQUIPMENT LIST.
- SEE 'ET' SHEETS FOR DEVICE LOCATIONS AND COORDINATION.
- SEE 'TT' SHEETS FOR ADDITIONAL COORDINATION.
- PROVIDE ALL CONNECTORS, CABLES, POWER SUPPLIES, RACK MOUNT KITS, ETC. AS NECESSARY FOR A COMPLETE SYSTEM.

DEFINITIONS

NOTE: ALL DEFINITIONS MAY NOT BE USED.

INDICATED: THE TERM "INDICATED" REFERS TO GRAPHIC REPRESENTATIONS, NOTES, OR SCHEDULES ON THE DRAWINGS, OTHER PARAGRAPHS OR SCHEDULES IN THE SPECIFICATIONS, AND SIMILAR REQUIREMENTS IN THE CONTRACT DOCUMENTS. WHERE TERMS SUCH AS "SHOWN", "NOTED", "SCHEDULED", AND "SPECIFIED" ARE USED, IT IS TO HELP THE READER LOCATE THE REFERENCE. NO LIMITATION ON LOCATION IS INTENDED.

DIRECTED: TERMS SUCH AS "DIRECTED", "REQUESTED", "AUTHORIZED", "SELECTED", "APPROVED", "REQUIRED", AND "PERMITTED" MEAN "DIRECTED BY THE ENGINEER", "REQUESTED BY THE ENGINEER", AND SIMILAR PHRASES.

APPROVE: THE TERM "APPROVED", WHERE USED IN CONJUNCTION WITH THE ENGINEER'S ACTION ON THE CONTRACTOR'S SUBMITTALS, APPLICATIONS, AND REQUESTS, IS LIMITED TO THE ENGINEER'S DUTIES AND RESPONSIBILITIES AS STATED IN GENERAL AND SUPPLEMENTARY CONDITIONS.

FURNISH: THE TERM "FURNISH" IS USED TO MEAN "SUPPLY AND DELIVER TO THE PROJECT SITE, READY FOR UNLOADING, UNPACKING, ASSEMBLY, INSTALLATION, AND SIMILAR OPERATIONS."

INSTALL: THE TERM "INSTALL" IS USED TO DESCRIBE OPERATIONS AT PROJECT SITE INCLUDING THE ACTUAL "UNLOADING, UNPACKING, ASSEMBLY, ERECTION, PLACING, ANCHORING, APPLYING, WORKING TO DIMENSION, FINISHING, CURING, PROTECTING, CLEANING, AND SIMILAR OPERATIONS."

PROVIDE: THE TERM "PROVIDE" MEANS "TO FURNISH AND INSTALL, COMPLETE AND READY FOR THE INTENDED USE."

INSTALLER: AN "INSTALLER" IS THE CONTRACTOR OR AN ENTITY ENGAGED BY THE CONTRACTOR, EITHER AS AN EMPLOYEE, SUBCONTRACTOR, OR SUB-SUBCONTRACTOR, FOR PERFORMANCE OF A PARTICULAR CONSTRUCTION ACTIVITY, INCLUDING INSTALLATION, ERECTION, APPLICATION, AND SIMILAR OPERATIONS. INSTALLERS ARE REQUIRED TO BE EXPERIENCED IN THE OPERATIONS THEY ARE ENGAGED TO PERFORM.

TECHNOLOGY SYSTEMS: THE TERM "TECHNOLOGY SYSTEMS" IS USED TO DESCRIBE ALL LOW VOLTAGE SYSTEMS. THESE SYSTEMS INCLUDE BUT ARE NOT NECESSARILY LIMITED TO ALL SYSTEMS WHICH UTILIZE VOLTAGES OF LESS THAN 71 VOLTS SUCH AS SOUND SYSTEMS, VIDEO SYSTEMS, TV SYSTEMS, SECURITY SYSTEMS, VOICE AND DATA CABLING SYSTEMS, ETC...

ABBREVIATIONS

NOTE: ALL ABBREVIATIONS MAY NOT BE USED.

A	-----	AUDIO
A/R ADJ	-----	AS REQUIRED
C	-----	ADJACENT
CAT	-----	CONDUIT
CFI	-----	CATEGORY
CV	-----	CONTRACTOR FURNISHED AND INSTALLED
DVI	-----	COMPOSITE VIDEO
DVD	-----	DIGITAL VISUAL INTERFACE
E	-----	DIGITAL VERSATILE DISK
EA	-----	ENHANCED
EX	-----	EACH
GR	-----	EXISTING
HDMI	-----	GROUND
I.O.F.	-----	HIGH-DEFINITION DIGITAL MEDIA INTERFACE
L	-----	INSTALLATION OF OWNER FURNISHED EQUIPMENT
MIC	-----	LEFT AUDIO CHANNEL, LINE LEVEL
N/A	-----	MIC LEVEL AUDIO
N/A	-----	NOT APPLICABLE
N.I.C.	-----	NOT IN CONTRACT
OFCI	-----	OWNER FURNISHED AND CONTRACTOR INSTALLED
OFI	-----	OWNER FURNISHED AND INSTALLED
QTY	-----	OBTAIN FROM PLANS
OP	-----	QUANTITY
POE	-----	OWNER PROVIDED
R	-----	POWER OVER ETHERNET
RGBHV	-----	RIGHT AUDIO CHANNEL, LINE LEVEL
RMK	-----	COMPUTER VIDEO
RU	-----	RACK MOUNT KIT
TYP	-----	RACK UNIT, 1.75"
V	-----	TYPICAL
VGA	-----	VOLT
VHS	-----	VIDEO GRAPHICS ARRAY
W/	-----	VIDEO HOME SYSTEM
YC	-----	WITH
YPP	-----	S-VIDEO
	-----	COMPONENT VIDEO



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THE CHURCH OF
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OF LATTER-DAY SAINTS



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WEST POINT SEMINARY

+/- 4450 W 920 S, WEST POINT, UTAH

BID SET

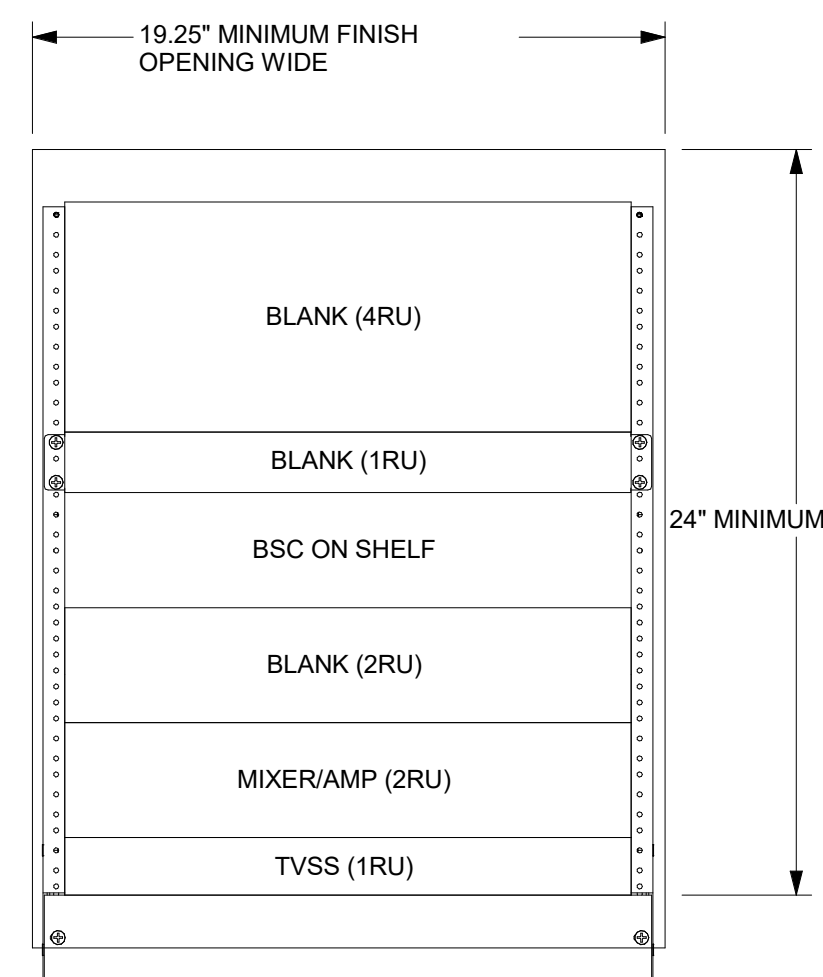
JOB NUMBER: 501-9425
OWNER: The Church of Jesus Christ of LDS

DATE: 03.20.2024

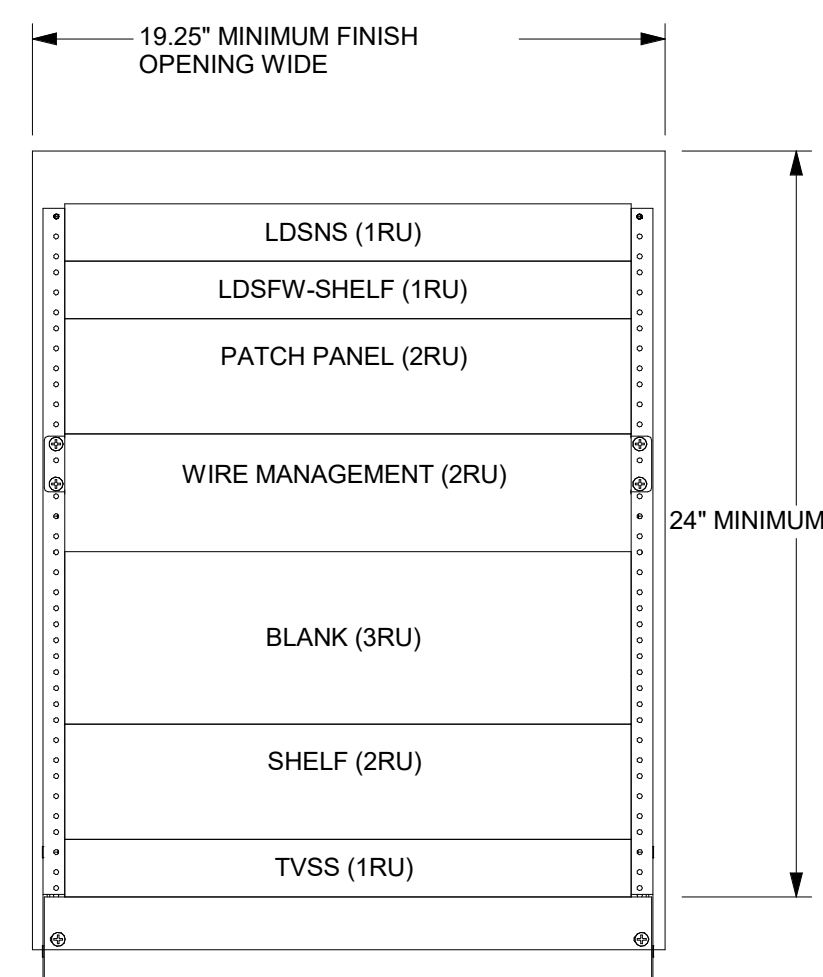
REV DATE DESCRIPTION
1 05.23.2024 ADDENDUM #2

AV Rough-in
Diagrams and
Details

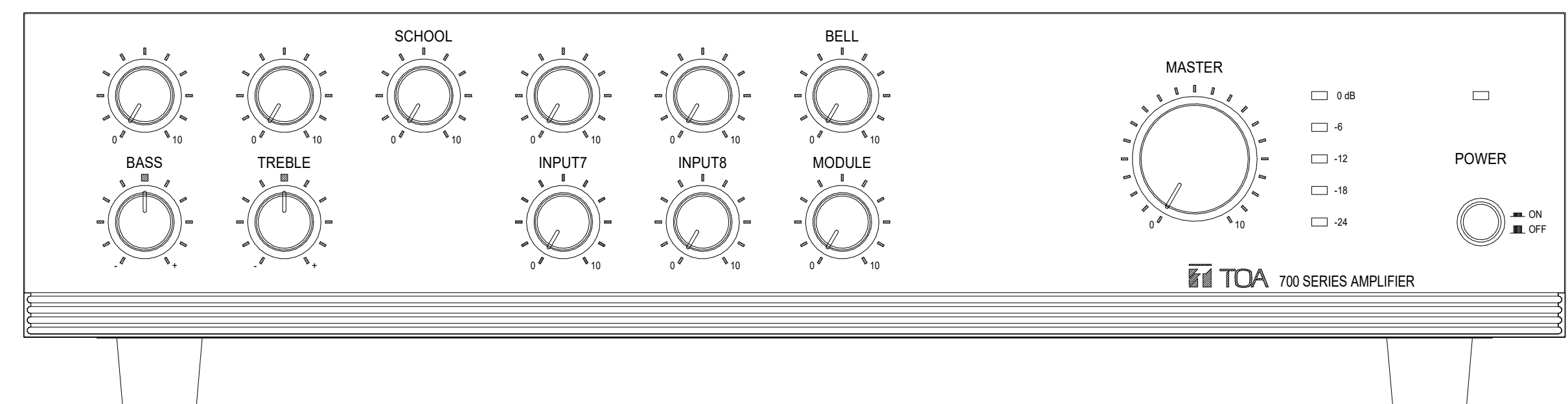
TA602



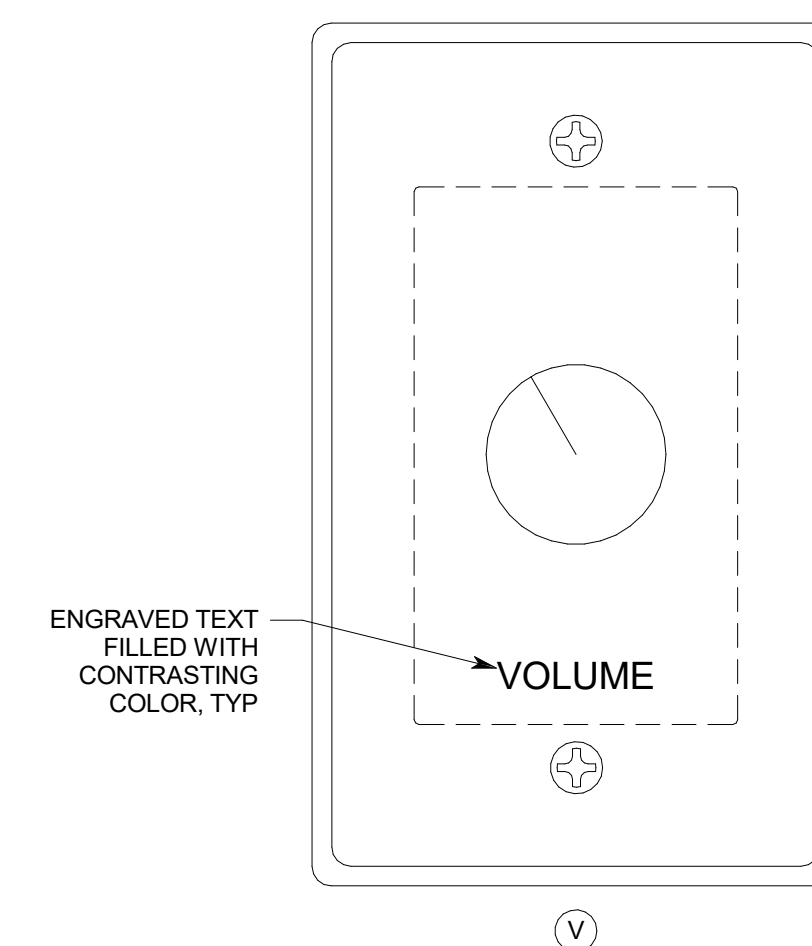
4 AV SUPPORT SPECIALIST EQUIPMENT RACK DETAIL
NTS



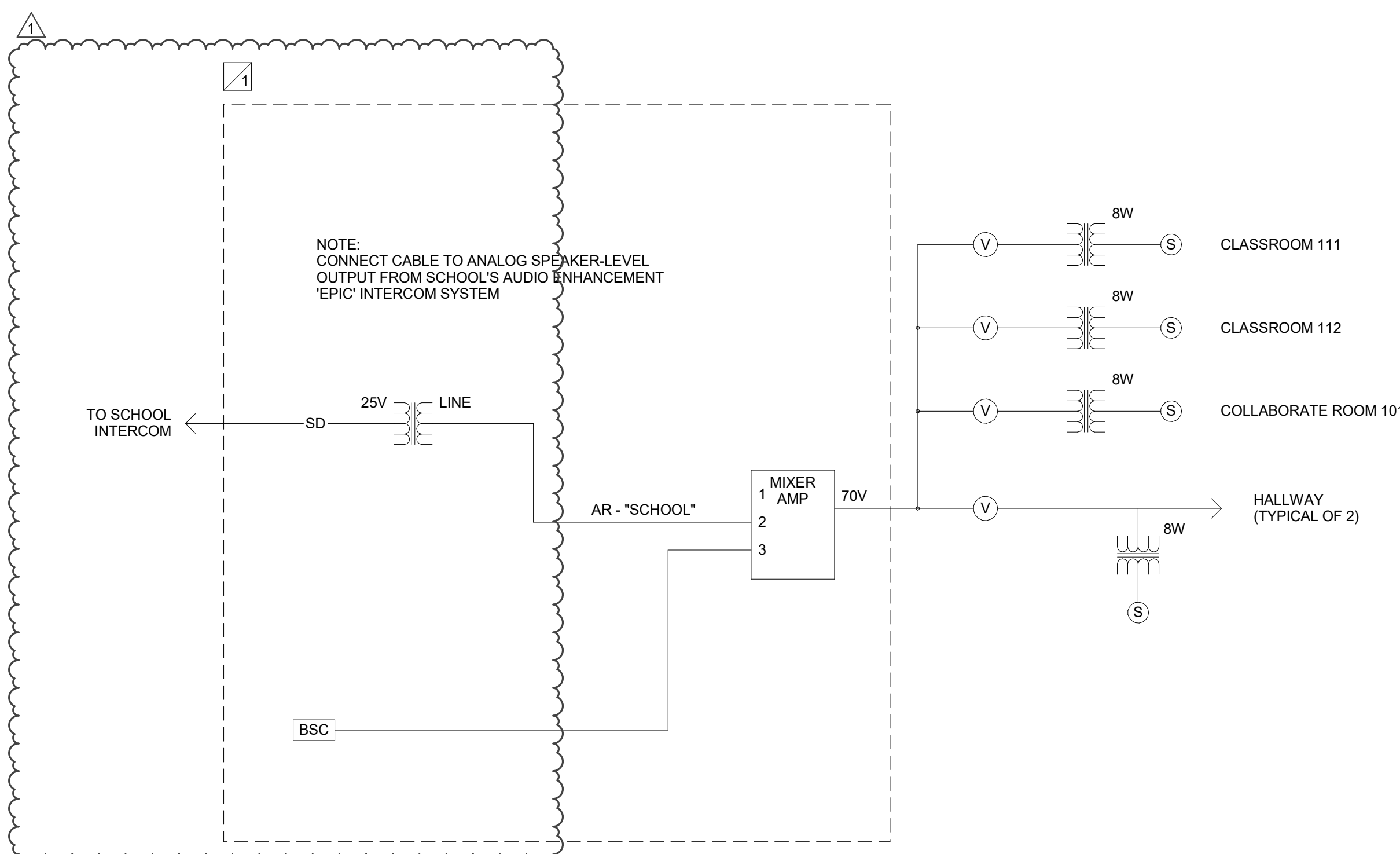
3 IT SUPPORT SPECIALIST EQUIPMENT RACK DETAIL
NTS



2 MIXER AMPLIFIER LABELS "MA"
NTS



1 VOLUME CONTROLS "V"
NTS



5 SUPPORT SPECIALIST
NTS

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VOICE-DATA SYSTEM EQUIPMENT/CABLE LIST

THE FOLLOWING IS A PARTIAL LIST OF MATERIALS FOR THE DATA/PHONE SYSTEM. REFER TO SPECIFICATION 27 1501 FOR FULL REQUIREMENTS. VERIFY ALL PART NUMBERS WITH MANUFACTURER'S CATALOG NUMBERS AND NOTIFY CONSULTANT OF DISCREPANCIES PRIOR TO BIDDING. FURNISH MISCELLANEOUS HARDWARE NOT LISTED TO PROVIDE A COMPLETE SYSTEM.

SYM	DESCRIPTION	ACCEPTABLE TYPES
TELCO DEMARC	TELECOMMUNICATIONS PROVIDER DEMARCATION POINT	FURNISHED AND INSTALLED BY PROVIDER
ISP DEMARC	INTERNET SERVICE PROVIDER DEMARCATION POINT	FURNISHED AND INSTALLED BY PROVIDER
DPP	PATCH PANEL, DATA, 48-PORT W/ CAT 6 INSERT, BLUE (QUANTITIES OF PORTS AS REQUIRED +25%)	SEE SPECIFICATION 271501
TVSS	SURGE SUPPRESSOR AND SWITCHER W/ UL LISTED POWER STRIP	FURNISHED AND INSTALLED BY AV INSTALLER
	UL LISTED POWER STRIP	6 OUTLET POWER STRIP OR EQUAL
D(#)	STATION CABLE, DATA-CAT 6, DATA, (#) INDICATES NUMBER OF CABLES IF MORE THAN ONE	SEE SPECIFICATION 271501
WAP	DATA OUTLET, WIRELESS ACCESS POINT SINGLE GANG BEZEL	SEE SPECIFICATION 271501
	BEZEL INSERTS	SEE SPECIFICATION 271501
	CAT 6 JACK-DATA (1)	SEE SPECIFICATION 271501
	DATA OUTLET SINGLE GANG BEZEL	SEE SPECIFICATION 271501
X	BEZEL INSERTS	SEE SPECIFICATION 271501
	CAT 6 JACK-DATA (X) INDICATED # OF JACKS, IF MORE THAN ONE	SEE SPECIFICATION 271501
	COPPER CAT 6 PATCH CABLES (1 DROP +25%)	SEE SPECIFICATION 271501
	CAT 6 J-HOOKS	CADDY CAT32234
HWM	HORIZONTAL WIRE MANAGER HORIZONTAL WIRE MANAGER SHALL NOT HAVE A DEPTH OF MORE THAN 3"	SEE SPECIFICATION 271501
NS	NETWORK SWITCH, OWNER STANDARD (IEA-IS FOR INTERNET ENABLED APPLIANCES) CONNECT NETWORK DEVICES REQUIRING 'POE' TO 'POE' PORTS ON SWITCH	OWNER FURNISHED-CONTRACTOR INSTALLED
	2 RACK UNIT SHELF FOR 'POE' SWITCH	MIDDLE ATLANTIC USM-11.5
FW	INTERNET FIREWALL, OWNER STANDARD	OWNER FURNISHED-CONTRACTOR INSTALLED
	2 RACK UNIT SHELF	MIDDLE ATLANTIC USM-11.5
ISP MODEM	INTERNET SERVICE MODEM	OWNER FURNISHED-CONTRACTOR INSTALLED
110 BLOCK	110 PUNCH DOWN BLOCK, CAT6	SEE SPECIFICATIONS 271501
WAP	WIRELESS ACCESS POINT, OWNER STANDARD, INSTALL AT EACH WAP LOCATION SHOWN ON ET101.	OWNER FURNISHED-CONTRACTOR INSTALLED

NOTE: ALL PATCH PANELS AND ACCESSORIES SHALL BE BLACK IN COLOR

AUDIO-VIDEO CABLE EQUIPMENT LIST

SYM	DESCRIPTION	QTY	ACCEPTABLE TYPES
L(X)	LINE LEVEL CABLE, (X) INDICATES NUMBER OF CABLES, IF MORE THAN ONE	A/R	BELDEN 9451 WEST PENN 454 LIBERTY 22-1P-EZ OR AS APPROVED BY CONSULTANT
S(X)	SPEAKER CABLE, (X) INDICATES NUMBER OF CABLES, IF MORE THAN ONE	A/R	BELDEN 8471 WEST PENN 225 LIBERTY 16-2C-GRY OR AS APPROVED BY CONSULTANT
SD	SPEAKER CABLE, 12AWG, DIRECT BURIAL RATED	A/R	BELDEN 1311A WEST PENN AQ227 OR AS APPROVED BY CONSULTANT

MANUFACTURER'S NAMES AND TELEPHONE NUMBERS ARE LISTED IN THE SPECIFICATIONS
A/R = AS REQUIRED

GENERAL PROJECT NOTES

- LABEL ALL CABLE REGARDLESS OF LENGTH.
- THE EQUIPMENT LABELING IDENTIFIED ON DETAILS IN THESE DRAWINGS ARE EXAMPLES ONLY. PRIOR TO FABRICATION, SUBMIT THE NOMENCLATURE FOR ALL CABLING AND EQUIPMENT TO THE CONSULTANT APPROVAL.
- COIL 5 FEET OF EXTRA VOICE-DATA CABLE AT THE TECHNOLOGY ROOM AND 18" AT THE OUTLET FOR EACH CABLE RUN.
- USE CADDY CLIPS FOR ALL CABLE OUTSIDE OF CONDUIT.
- ALL CABLE AND UTP TO TERMINATE ON BOTH ENDS.
- ALL VOICE-DATA OUTLETS ON WALLS SHALL BE MOUNTED WITHIN 6" OF A POWER OUTLET. IF CONTRADICTIONS ARISE ON PLANS, NOTIFY ENGINEER.
- REFER TO SHEET ET101 FOR VOICE-DATA JACK LOCATIONS, AND SHEET TAB01 FOR ROUTING OF AV CABLE.
- EQUIPMENT RACK TO BE INSTALLED BY AV INSTALLER.
- ALL VOICE-DATA CABLING AND EQUIPMENT SHALL BE INSTALLED ACCORDING TO DIVISION 27 1501.
- INSTALL OWNER FURNISHED LDS NETWORK EQUIPMENT SHOWN, AS PART OF INSTALLATION SET UP AND CONFIGURE DEVICES IN ACCORDANCE WITH LDS REQUIREMENTS. COORDINATE WITH LOCAL FACILITIES MANAGER.
- COORDINATE WITH FACILITIES MANAGER AND PROJECT MANAGER WELL IN ADVANCE OF PROJECT COMPLETION TO ENSURE INSTALLATION OF ALL OWNER FURNISHED EQUIPMENT IS INSTALLED AND SET UP PROPERLY. IN ADDITION, ENSURE OWNER PROVIDES INTERNET SERVICE TO BUILDING PRIOR TO FINAL INSTALLATION OF AV AND VOICE DATA EQUIPMENT.
- INSTALL A DATA PATCH CABLE TO NS FOR ALL DATA LOCATIONS SHOWN ON PLANS.
- FURNISH AND INSTALL ALL AUDIO-VIDEO CABLE SHOWN. PROVIDE 3 FEET EXTRA CABLE AT OUTLET END AND 15' EXTRA CABLE AT EQUIPMENT RACK. COIL AND LABEL.
- INSTALL PATCH IN AND SET-UP OWNER FURNISHED WIRELESS ACCESS POINTS.
- SEE 'TA' AND 'ET' SHEETS FOR DEVICE LOCATIONS AND ADDITIONAL COORDINATION.



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WEST POINT SEMINARY

+/- 4450 W 920 S, WEST POINT, UTAH

BID SET

JOB NUMBER: 501-9425
OWNER:

The Church of Jesus Christ of LDS

DATE: 03.20.2024

REV	DATE	DESCRIPTION
1	05.23.2024	ADDENDUM #2

AV Systems Data Schedules

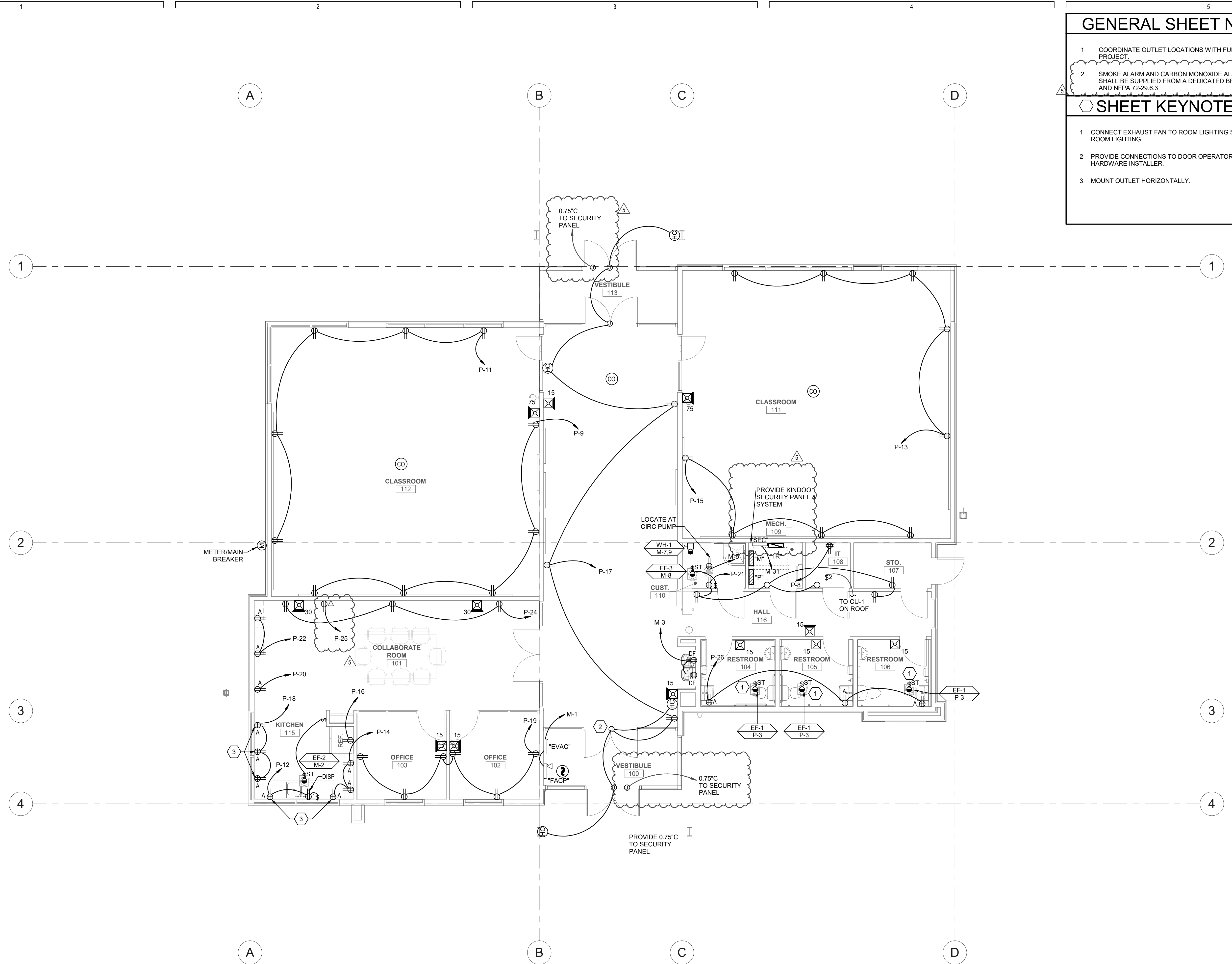
TT601

GENERAL SHEET NOTES

- COORDINATE OUTLET LOCATIONS WITH FURNITURE THROUGHOUT PROJECT.
- SMOKE ALARM AND CARBON MONOXIDE ALARMS PRIMARY POWER SUPPLY SHALL BE SUPPLIED FROM A DEDICATED BRANCH CIRCUIT PER IFC 907.2.10 AND NFPA 72-29.6.3

SHEET KEYNOTES

- CONNECT EXHAUST FAN TO ROOM LIGHTING SO THAT IT TURNS ON/OFF WITH ROOM LIGHTING.
- PROVIDE CONNECTIONS TO DOOR OPERATOR. COORDINATE WITH DOOR HARDWARE INSTALLER.
- MOUNT OUTLET HORIZONTALLY.



A1 POWER PLAN
SCALE: 3/16" = 1'-0"



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WEST POINT SEMINARY

4342 W 920 S, West Point, UT

REVIEW

JOB NUMBER: 501-9425
OWNER:

The Church of Jesus Christ of LDS
DATE: 03.19.2024

REV	DATE	DESCRIPTION
5	5-3-24	Addendum #2

ROOF POWER PLAN

E190

GENERAL SHEET NOTES

- COORDINATE OUTLET LOCATIONS WITH FURNITURE THROUGHOUT PROJECT.
- SMOKE ALARM AND CARBON MONOXIDE ALARMS PRIMARY POWER SUPPLY SHALL BE PROVIDED FROM A DEDICATED BRANCH CIRCUIT PER IFC 907.2.10

SHEET KEYNOTES

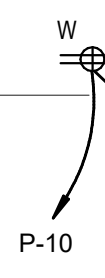
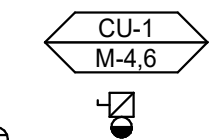
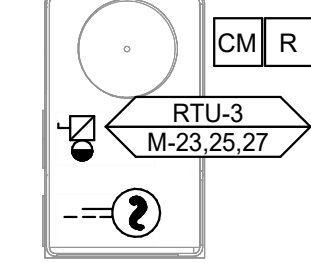
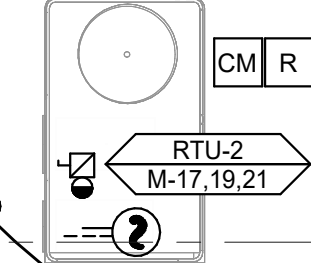
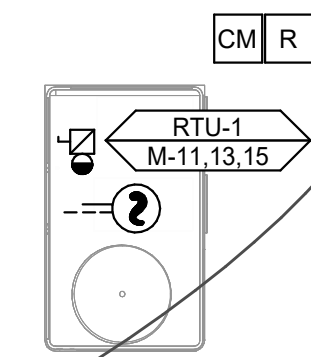
PROVIDE 5 WATT PER FOOT HEAT TRACE IN DOWNSPOUT WITH ASSOCIATED SUPPORTS, SENSORS AND ALL REQUIRED COMPONENTS. RUN LENGTH OF DOWNSPOUT AND 5' BEYOND

PROVIDE 5 WATT PER FOOT HEAT TRACE IN GUTTER WITH ASSOCIATED SUPPORTS, SENSORS AND ALL REQUIRED COMPONENTS.

PROVIDE 5 WATT PER FOOT HEAT TRACE IN GUTTER WITH ASSOCIATED SUPPORTS, SENSORS AND ALL REQUIRED COMPONENTS.

PROVIDE 5 WATT PER FOOT HEAT TRACE IN DOWNSPOUT WITH ASSOCIATED SUPPORTS, SENSORS AND ALL REQUIRED COMPONENTS. RUN LENGTH OF DOWNSPOUT AND 5' BEYOND

PROVIDE 5 WATT PER FOOT HEAT TRACE IN GUTTER WITH ASSOCIATED SUPPORTS, SENSORS AND ALL REQUIRED COMPONENTS.



CM R

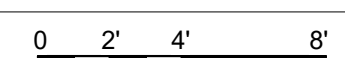
CM R

CM R

M-29

A1 ROOF POWER PLAN

SCALE: 3/16" = 1'-0"



5/22/2024 10:59:19 AM

PANEL: "M"

VOLTS/PHASE/WIRE:		PANEL SIZE & TYPE:		MAIN SIZE AND TYPE:		FED FROM:	CABINET:	LOCATION:	NOTES:			
120/208V, 3 PH 4 WIRE		22" W x 6" D, BOLT-ON		400 AMPERE MAIN LUGS			FLUSH	MECH. 109				
ACCESSORIES: PANEL DIRECTORY, IDENTIFICATION, GROUNDING BAR												
AIC RATING: 22,000												
CKT NO	AMP	POLE	BKR	LTG	PWR	CO	DESCRIPTION	PHASE LOAD	LOAD (KVA)	OCB	CKT NO	
								A B C	CO PWR LTG			
1	20	1		0.0	0.5	0.0	FACP	0.5 0.0	0.0 0.0 0.0		1 20 2	
3	20	1	GF	0.0	1.4	0.0	DRINKING FOUNTAIN	1.4 2.0	0.0 4.0 0.0		2 30 4	
5	20	1		0.0	0.0	0.2	RECIRC PUMP CUST. 109	0.2 2.0	0.0 0.0 0.0		2 30 4	
7	20	2		0.0	3.0	0.0	WATER HEATER	1.5 0.0	0.0 0.0 0.0		1 15 8	
9	--	--	--	--	--	--	--	1.5 --	0.0 0.0 0.0		1 -- 10	
11	60	3		0.0	17.3	0.0	RTU-1	5.8 --	0.0 0.0 0.0		1 -- 12	
13	--	--	--	--	--	--	--	5.8 --	0.0 0.0 0.0		1 -- 14	
15	--	--	--	--	--	--	--	5.8 --	0.0 0.0 0.0		1 -- 16	
17	60	3		0.0	15.1	0.0	RTU-2	5.0 --	0.0 0.0 0.0		1 -- 18	
19	--	--	--	--	--	--	--	5.0 --	0.0 0.0 0.0		1 -- 20	
21	--	--	--	--	--	--	--	5.0 --	0.0 0.0 0.0		1 -- 22	
23	60	3		0.0	13.7	0.0	RTU-3	4.6 --	0.0 0.0 0.0		1 -- 24	
25	--	--	--	--	--	--	--	4.6 0.0	0.0 0.0 0.0		1 20 26	
27	--	--	--	--	--	--	--	4.6 --	0.0 0.0 0.0		1 -- 28	
29	20	1	GF30	0.0	0.2	0.0	HEAT TAPE	0.2 --	0.0 0.0 0.0		1 -- 30	
31	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 32	
33	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 34	
35	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 36	
37	20	1		0.0	0.0	0.0	SPARE	0.0 6.9	9.9 2.4 6.2	3	125 38	
39	20	1		0.0	0.0	0.0	SPARE	0.0 6.2	0.0 0.0 0.0		1 -- 40	
41	20	1		0.0	0.0	0.0	SPARE	0.0 5.4	0.0 0.0 0.0		1 -- 42	
TOTALS:				CONNECTED KVA PER PHASE			24	26	23	CONNECTED TOTAL KVA = 73		
				CONNECTED AMPS PER PHASE			203	222	193	AVERAGE CONNECTED AMPS PER PHASE = 203		
NEC DIVERSIFIED LOAD CALCULATIONS												
LIGHTING & CONTINUOUS LOADS: 6.2 kVA @ 125% = 7.8 kVA				- 100% CONNECTED LOAD PLUS 25%				DIVERSIFIED TOTAL KVA = 79				
RECEPTACLES: 10.1 kVA @ 100% = 10.0 kVA				- FIRST 10kVA @ 100%, REMAINDER @ 50%				AVERAGE AMPS PER PHASE = 220				
ALL OTHER LOADS @ 100%: 61.3 kVA				- MOTOR TOTALS INCLUDED IN ALL OTHER LOADS WITH LARGEST MOTOR CALCULATED @ 125% PER NEC								
BKR: GF=GFCI, GF3=30mA GFCI CAPABLE OF BEING LOCKED OUT IN OPEN POSITION, IG=ISOLATED GROUND, AF=AFCI, ST=SHUNT TRIP, RED=PROVIDE RED COLORED BREAKER, AF=ARC FAULT CURRENT INTERRUPTER, GA=COMBINATION OF GROUND FAULT AND ARC FAULT CIRCUIT INTERRUPTER, GS=COMBINATION OF SHUNT TRIP WITH GFCI												

PANEL: "P"

VOLTS/PHASE/WIRE:		PANEL SIZE & TYPE:		MAIN SIZE AND TYPE:		FED FROM:	CABINET:	LOCATION:	NOTES:			
120/208V, 3 PH 4 WIRE		22" W x 6" D, BOLT-ON		125 AMPERE MAIN LUGS		M	SURFACE	MECH. 109				
ACCESSORIES: PANEL DIRECTORY, IDENTIFICATION, GROUNDING BAR												
AIC RATING: 22,000												
CKT NO	AMP	POLE	BKR	LTG	PWR	CO	DESCRIPTION	PHASE LOAD	LOAD (KVA)	OCB	CKT NO	
								A B C	CO PWR LTG			
1	20	1		1.1	0.0	0.0	LIGHTING CORRIDOR	1.1 0.8	0.0 0.0 0.8		1 20 2	
3	20	1		1.4	0.0	0.0	LIGHTING CLASSROOM/RESTRM	1.4 0.3	0.0 0.0 0.3		1 20 4	
5	20	1		1.0	0.0	0.0	LIGHTING CLASSROOM 105	1.0 0.2	0.0 0.0 0.2		1 20 6	
7	20	1		1.2	0.0	0.0	LIGHTING COLLABORATE/OFFICE	1.2 0.4	0.4 0.0 0.0		1 20 8	
9	20	1		0.0	0.0	0.9	CO CLASSROOM 105	0.9 0.4	0.4 0.0 0.0		1 20 10	
11	20	1		0.0	0.0	0.9	CO CLASSROOM 105	0.9 1.0	0.2 0.8 0.0		1 20 12	
13	20	1		0.0	0.0	0.9	CO CLASSROOM 108	0.9 0.5	0.5 0.0 0.0		1 20 14	
15	20	1		0.0	0.0	0.7	CO CLASSROOM 108	0.7 0.8	0.0 0.8 0.0		1 20 16	
17	20	1		0.0	0.7	0.5	CO HALL 106	1.3 0.5	0.5 0.0 0.0		1 20 18	
19	20	1		0.0	0.0	1.1	CO ROOM 102, 101	1.1 0.2	0.2 0.0 0.0		1 20 20	
21	20	1		0.0	0.0	1.1	CO ROOM 112, 110, 106, 109	1.1 0.4	0.4 0.0 0.0		1 20 22	
23	20	1		0.1	0.0	0.0	LIGHTING SITE (1R-4)	0.1 0.5	0.5 0.0 0.0		1 20 24	
25	20	1		0.0	0.0	0.2	CO COLLABORATE ROOM 101	0.2 0.5	0.5 0.0 0.0		1 20 26	
27	20	1		0.3	0.0	0.0	HALL LIGHTING COVE	0.3 --	0.0 0.0 0.0		1 -- 28	
29	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 30	
31	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 32	
33	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 34	
35	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 36	
37	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 38	
39	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 40	
41	20	1		0.0	0.0	0.0	SPARE	0.0 --	0.0 0.0 0.0		1 -- 42	
TOTALS:				CONNECTED KVA PER PHASE			7	6	5	CONNECTED TOTAL KVA = 18		
				CONNECTED AMPS PER PHASE			58	53	45	AVERAGE CONNECTED AMPS PER PHASE = 51		
NEC DIVERSIFIED LOAD CALCULATIONS												
LIGHTING & CONTINUOUS LOADS: 6.2 kVA @ 125% = 7.8 kVA				- 100% CONNECTED LOAD PLUS 25%				DIVERSIFIED TOTAL KVA = 20				
RECEPTACLES: 9.9 kVA @ 100% = 9.9 kVA				- FIRST 10kVA @ 100%, REMAINDER @ 50%				AVERAGE AMPS PER PHASE = 56				
ALL OTHER LOADS @ 100%: 2.4 kVA				- MOTOR TOTALS INCLUDED IN ALL OTHER LOADS WITH LARGEST MOTOR CALCULATED @ 125% PER NEC								
BKR: GF=GFCI, GF3=30mA GFCI CAPABLE OF BEING LOCKED OUT IN OPEN POSITION, IG=ISOLATED GROUND, AF=AFCI, ST=SHUNT TRIP, RED=PROVIDE RED COLORED BREAKER, AF=ARC FAULT CURRENT INTERRUPTER, GA=COMBINATION OF GROUND FAULT AND ARC FAULT CIRCUIT INTERRUPTER, GS=COMBINATION OF SHUNT TRIP WITH GFCI												

LIGHTING RELAY PANEL "1R"

LOCATION: MECH. 109		MOUNTING: SURFACE		ENCLOSUR... NEMA 1						
RELAY	DIMMING	PANEL CIRCUIT	DESCRIPTION	CONTROL CHANNEL	LOAD (WATTS)	CONTROL CHANNEL	DESCRIPTION	PANEL CIRCUIT	DIMMING	RELAY
1		P-2	EXTERIOR LIGHTING		764 300		EXTERIOR SLOT LIGHTING	P-4		2
3		P-6	EXTERIOR TAPE LIGHTING		178 70		LIGHTING SITE	P-23		4



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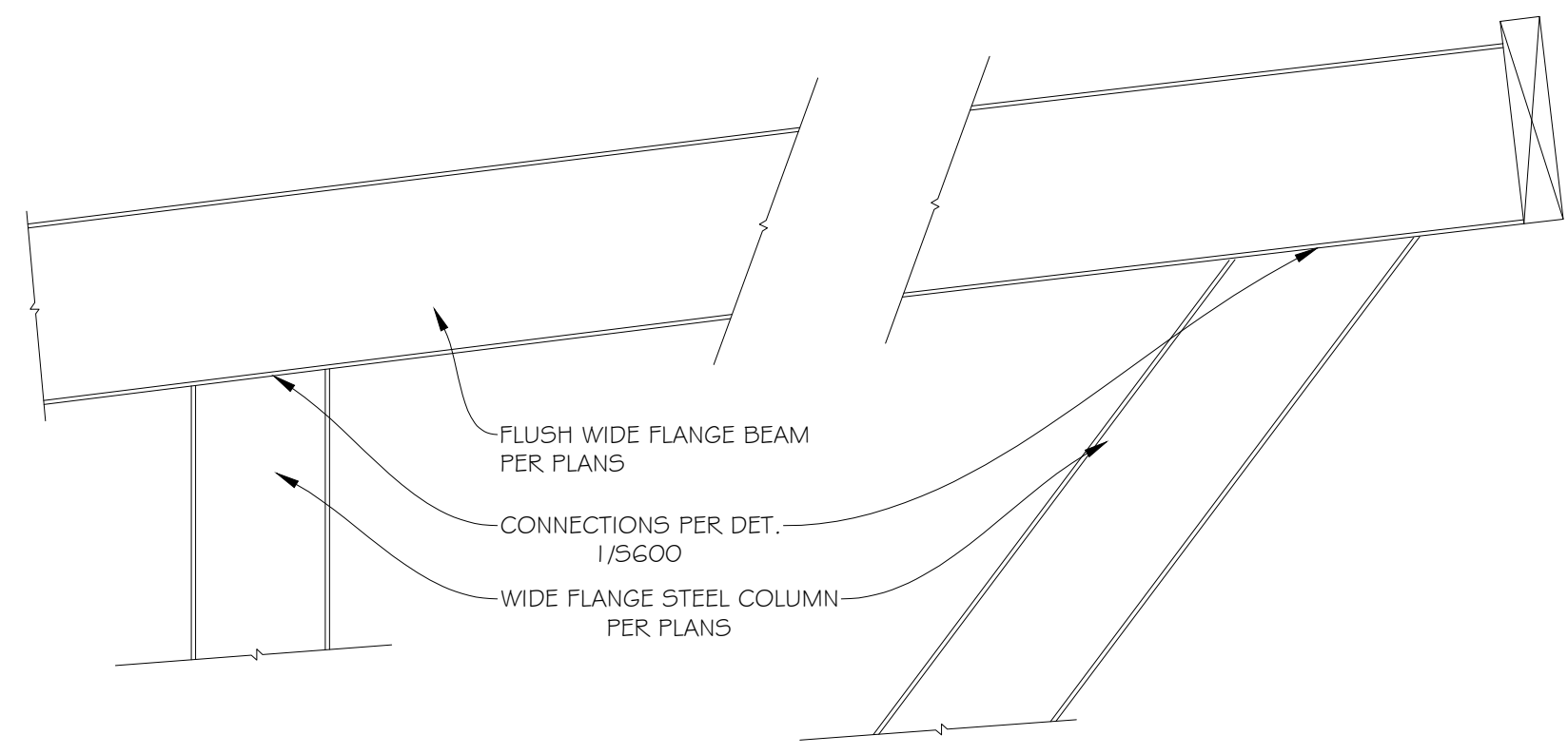
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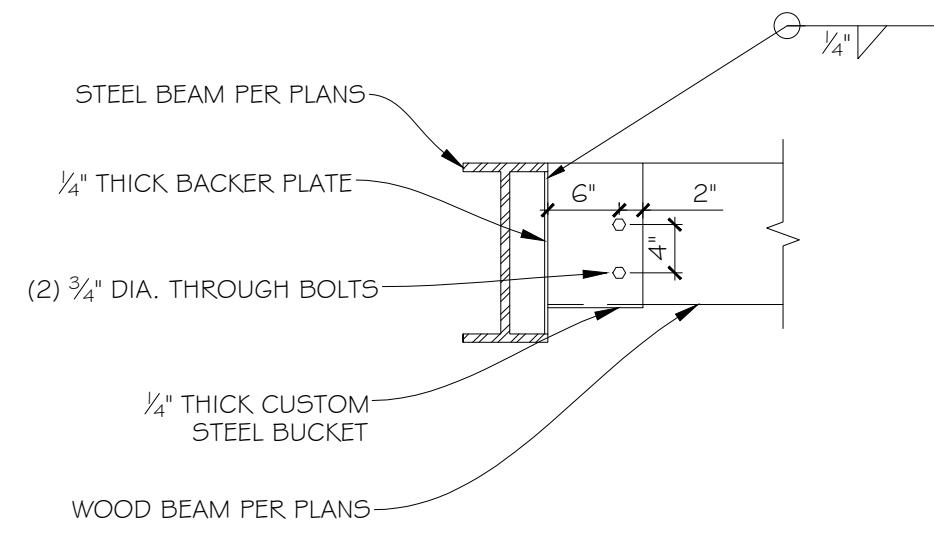
JOB NUMBER: 501-9425
OWNER:
The Church of Jesus Christ of LDS
DATE: 03.19.2024
REV DATE DESCRIPTION
5 5-3-24 Addendum #2

PANEL SCHEDULES
E603

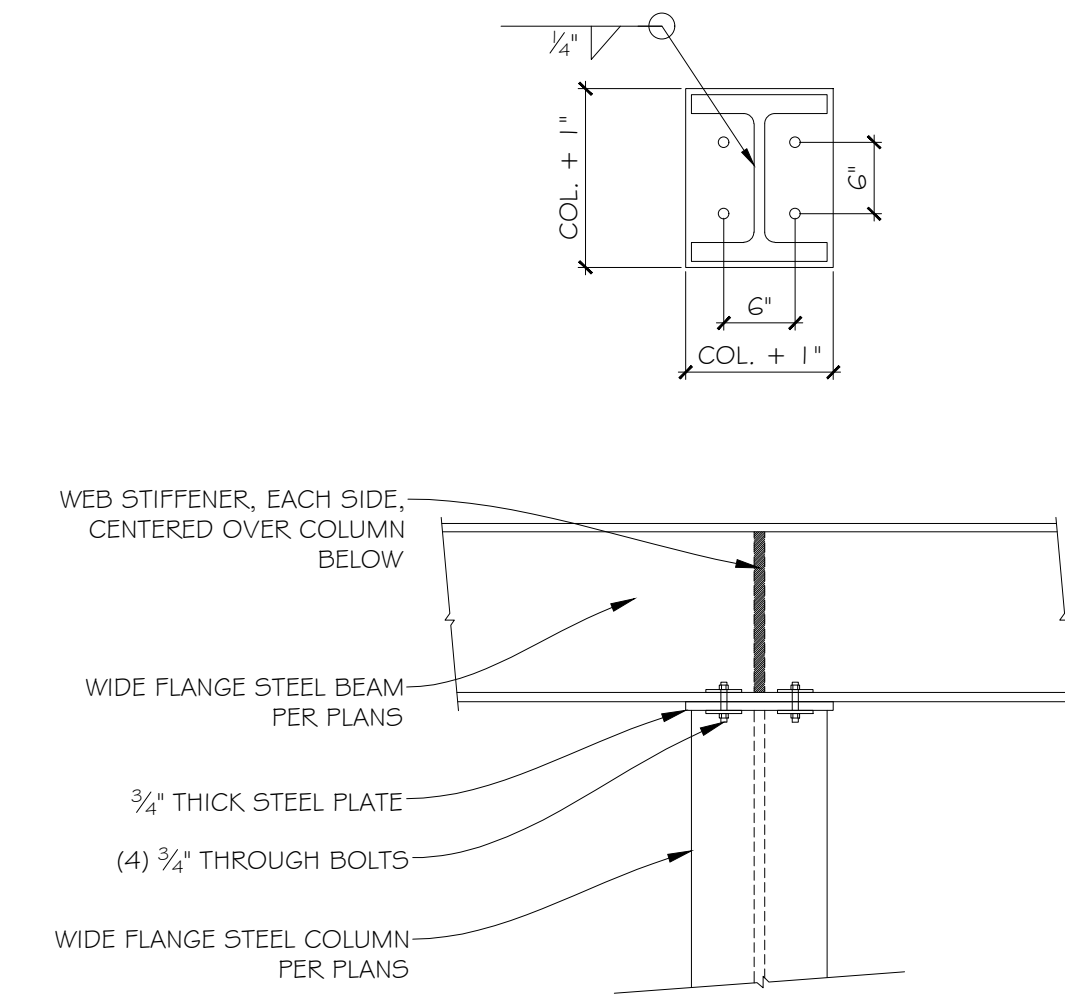
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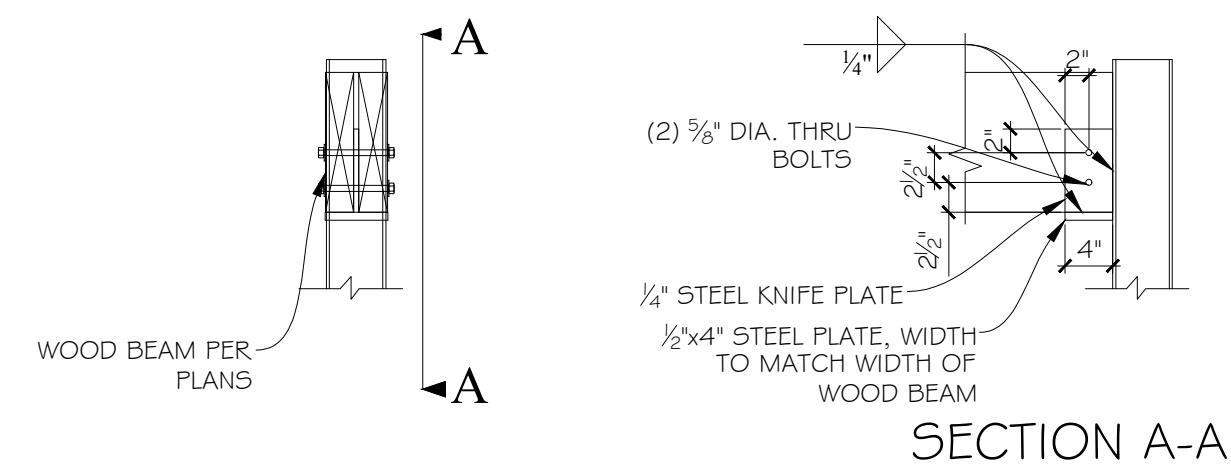
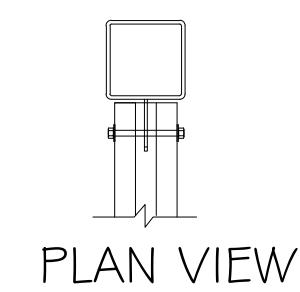
7 TYP. CANOPY STEEL CONNECTIONS



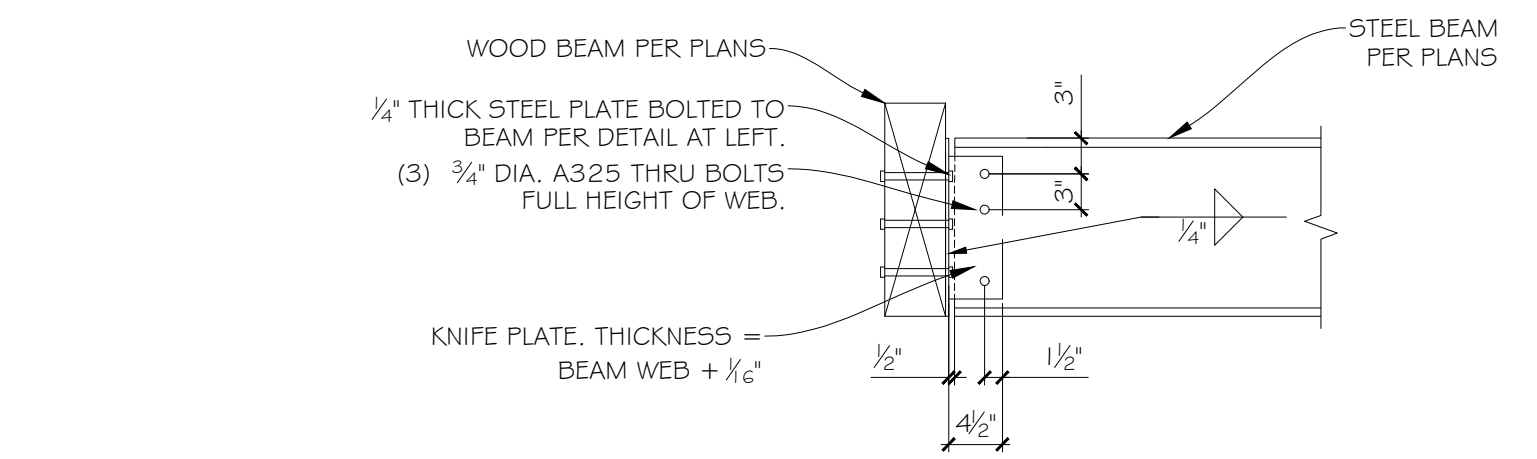
4 WOOD BEAM TO STEEL BEAM



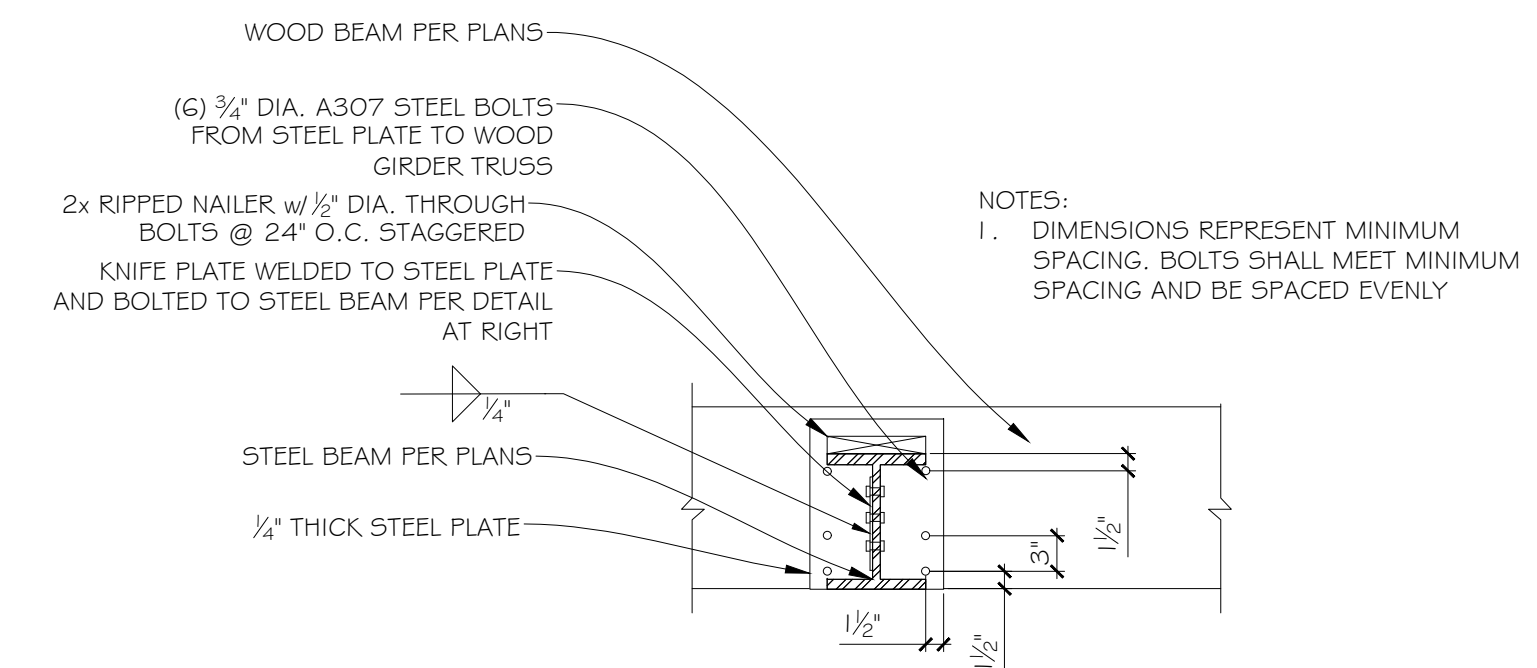
1 WIDE FLANGE BEAM TO WIDE FLANGE COLUMN (BEARING)



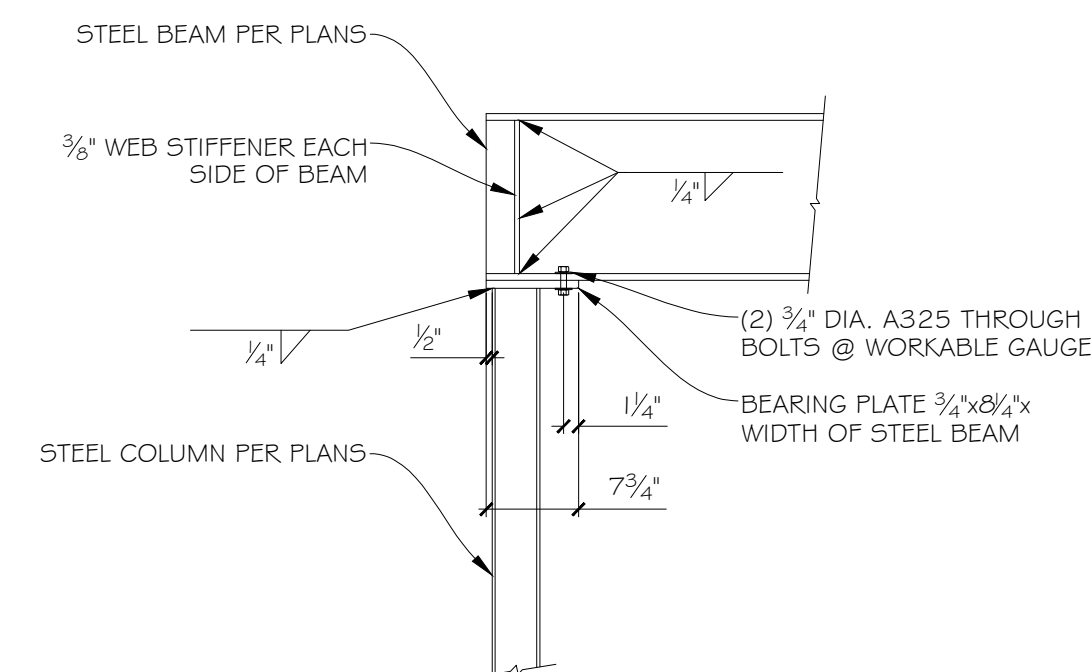
5 WOOD BEAM TO STEEL COLUMN



2 STEEL BEAM TO WOOD BEAM

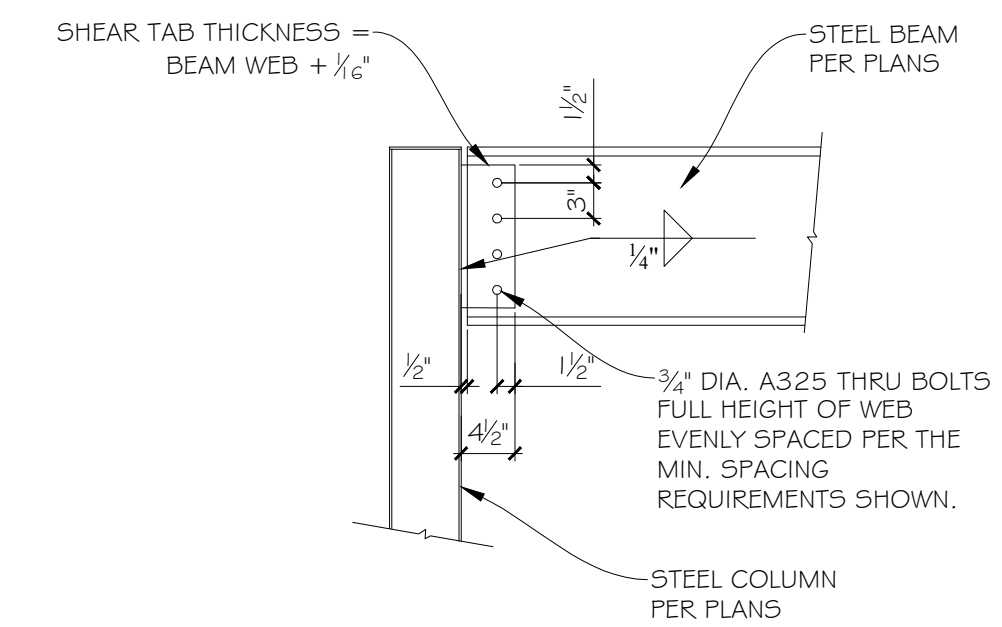


2 STEEL BEAM TO WOOD BEAM



6 STEEL BEAM TO STEEL COLUMN (BEAM BEARING)

NOTES:
1. IF BEAM IS CONTINUOUS, THE WIDTH OF PLATE SHALL EQUAL THE COLUMN WIDTH + 6". PROVIDE (4) 3/4" DIA. BOLTS.



3 STEEL BEAM TO COLUMN (KNIFE PLATE)

SECTION 06 6116**SOLID SURFACE COUNTERTOP****PART 1 - GENERAL****1.01 SUMMARY**

- A. Section Includes: Provide solid surfacing fabrications including but not limited to following:
1. millwork counter tops with sinks and cove backsplashes.
- B. Related Sections: Following description of work is included for reference only and shall not be presumed complete:
1. Provision of general LEED® requirements: Section 01 33 29, General LEED® Requirements.
 2. Provision of general LEED® Product requirements: Section 01 60 13, LEED® Product Requirements.
 3. Waste management and disposal requirements: Section 01 74 19, Waste Management and Disposal.
 4. Provision of indoor air quality requirements: Section 01 81 19, Indoor Air Quality Requirements.
 5. Provision of finish carpentry and architectural woodwork: Section 06 40 00, Architectural Woodwork.
 6. Provision of elastomeric joint sealants: Section 07 92 00, Joint Sealants.
 7. Provision of tile work: Section 09 30 00, Tiling.
 8. Provision of wall coverings: Section 09 72 00, Wall Coverings.
 9. Provision of plumbing and plumbing fixtures: [Division 22, Plumbing] [Mechanical].

1.02 REFERENCES

- A. Abbreviations and Acronyms:
1. LEED®: Leadership in Energy and Environmental Design; www.cagbc.org.
 2. MDF: Medium Density Fiberboard.
 3. SCAQMD: South Coast Air Quality Management District; www.aqmd.gov.
 4. VOC: Volatile Organic Compound.
- B. Definitions:
1. Solid Surface: Non-porous, homogeneous material maintaining the same composition throughout the part with a composition of acrylic polymer, aluminum trihydrate filler and pigment.
- C. Reference Standards:
1. ANSI/NPA A208.2-09 - Medium Density Fiberboard (MDF) For Interior Applications
 2. ASTM C920-14a - Standard Specification for Elastomeric Joint Sealants
 3. ASTM D638-10 - Standard Test Method for Tensile Properties of Plastics
 4. ASTM D785-08 - Standard Test Method for Rockwell Hardness of Plastics and Electrical Insulating Materials

- | | | |
|-----|--------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------|
| 5. | ASTM D790-10 | - Standard Test Methods for Flexural Properties of Unreinforced and Reinforced Plastics and Electrical Insulating Materials |
| 6. | ASTM D5420-10
Rigid | - Standard Test Method for Impact Resistance of Flat, Plastic Specimen by Means of a Striker Impacted by a Falling Weight (Gardner Impact) |
| 7. | ASTM E84-14 | - Standard Test Method for Surface Burning Characteristics of Building Materials |
| 8. | ASTM E228-11 | - Standard Test Method for Linear Thermal Expansion of Solid Materials with a Push-Rod Dilatometer |
| 9. | ASTM G21-13 | - Standard Practice for Determining Resistance of Synthetic Polymeric Materials to Fungi |
| 10. | ASTM G22-76(96) | - Standard Practice for Determining Resistance of Plastics to Bacteria |
| 11. | ASTM G155-13 | - Standard Practice for Operating Xenon Arc Light Apparatus for Exposure of Non-Metallic Materials |
| 12. | CSA B45.5-11/
IAPMO Z124-2011 | - Plastic Plumbing Fixtures |
| 13. | NFPA 255-06 | - Standard Method of Test of Surface Burning Characteristics of Building Materials |
| 14. | NSF/ANSI 51-07 | - Food Equipment Materials |
| 15. | SCAQMD Rule 1168 | - Adhesive and Sealant Applications (amended January 2005) |
| 16. | UL 723 | - Standard for Test for Surface Burning Characteristics of Building Materials |
| 17. | UL Environment/
Materials,
GREENGUARD
UL 2818 | - Standard for Chemical Emissions for Building Finishes and Furnishings, Section 7.1 |
| 18. | UL Environment/
Materials,
GREENGUARD
UL 2818 | - Gold Standard for Chemical Emissions for Building Finishes and Furnishings, Section 7.1 and 7.2 |
| 19. | UL 2824 | - GREENGUARD Certification Program, Method for Measuring Microbial Resistance from Various Sources Using Static Environmental Chambers |

1.03 ADMINISTRATIVE REQUIREMENTS

- A. Preinstallation Meetings: Arrange preinstallation meeting 1 week prior to commencing work with all parties associated with trade as designated in Contract Documents or as requested by Architect. Presided over by Contractor, include Architect who may attend, Subcontractor performing work of this trade, Owner's representative, testing company's representative and consultants of applicable discipline. Review Contract Documents for work included under this trade and determine complete understanding of requirements and responsibilities relative to work included, storage and handling of materials, materials to be used, installation of materials, sequence and quality control, Project staffing, restrictions on areas of work and other matters affecting construction, to permit compliance with intent of work of this Section.

1.04 SUBMITTALS

- A. Product Data: Indicate Product description including solid surface sheets, sinks, bowls and illustrating full range of standard colors, fabrication information and compliance with specified performance requirements. Submit Product data with resistance to list of chemicals.
- B. Shop Drawings: Submit Shop Drawings for work of this Section in accordance with Section 01 30 00. Indicate plans, sections, dimensions, component sizes, edge details, thermosetting requirements, fabrication details, attachment provisions, sizes of furring, blocking, including concealed blocking and coordination requirements with adjacent work. Show locations and sizes of cutouts and holes for plumbing fixtures, faucets, soap dispensers, waste receptacles and other items installed in solid surface.
- C. Coordination Drawings: Submit coordination drawings indicating plumbing and miscellaneous steel work indicating locations of wall rated or non-rated, blocking requirements, locations and recessed wall items and similar items.
- D. Samples: Submit samples in accordance with Section 01 30 00. Submit minimum 6" x 6" samples. Cut sample and seam together for representation of inconspicuous seam. Indicate full range of color and pattern variation. Approved samples will be retained as standards for work.
- E. Test and Evaluation Reports: Submit flammability test reports [and food preparation zone certifications/listing confirming compliance with NSF/ANSI 51. Refer to www.nsf.org for the latest compliance to NSF/ANSI 51 for Food Zone — all food types.]

1.05 CLOSEOUT SUBMITTALS

- A. Operational and Maintenance Data:
1. Submit manufacturer's care and maintenance data, including repair and cleaning instructions. Include in Project closeout documents.
 2. Provide a commercial care and maintenance kit and video. Review maintenance procedures and warranty details with Owner upon completion.

1.06 QUALITY ASSURANCE

- A. Qualifications:
1. Installers: Provide work of this Section executed by competent installers with minimum 5 years experience in the application of Products, systems and assemblies specified and with approval and training of the Product manufacturers.
- B. Mock-Ups:

1. Prior to final approval of Shop Drawings, erect 1 full size mock-up of each component at Project site demonstrating quality of materials and execution for Architect review.
2. Should mock-up not be approved, rework or remake until approval is secured. Remove rejected units from Project site.
3. Approved mock-up will be used as standard for acceptance of subsequent work.
4. Approved mock-ups may remain as part of finished work.

1.07 DELIVERY, STORAGE AND HANDLING

- A. Delivery and Acceptance Requirements: Deliver no components to Project site until areas are ready for installation.
- B. Storage and Handling Requirements:
 1. Store components indoors prior to installation.
 2. Handle materials to prevent damage to finished surfaces.

1.08 WARRANTY

- A. Manufacturer Warranty: Provide manufacturer's standard warranty for material only for period of 10 years against defects and/or deficiencies in accordance with General Conditions of the Contract. Promptly correct any defects or deficiencies which become apparent within warranty period, to satisfaction of Architect and at no expense to Owner.

PART 2 - PRODUCTS

2.01 MANUFACTURERS

- A. Manufacturer List: Products of following manufacturers are acceptable subject to conformance to requirements of Drawings, Schedules and Specifications:
 1. Corian® by DuPont; www.corian.com
- B. Substitution Limitations: This Specification is based on Corian® Products. Comparable Products from manufacturers listed herein will be accepted provided they meet requirements of this Specification.

2.02 MATERIALS

- A. Description:
- B. Performance/Design Criteria:

	Property	Requirement (min or max)	Test Procedure
1.	Solid Surface Based Products:		
a.	Tensile Strength	6000 psi min	ASTM D638
b.	Tensile Modulus	1.5 x 10 ⁶ psi min	ASTM D638
c.	Tensile Elongation	0.4% min.	ASTM D638
d.	Flexural Strength	10000 psi min	ASTM D790
e.	Flexural Modulus	1.2 x 10 ⁶ psi min	ASTM D790
f.	Hardness	>85-Rockwell "M" scale min.	ASTM D785

g.	Thermal Expansion	2.2 x 10 ⁻⁵ in./in./°F	ASTM E228
h.	Fungi and Bacteria & G22	Does not support microbial growth	ASTM G21
i.	Microbial Resistance	Highly resistant to mold growth	UL 2824
j.	Ball Impact	No fracture - 1/2 lb. Ball: 6 mm slab - 36" drop 12 mm slab - 144" drop	NEMA LD 3, Method 3.8
k.	Weatherability	ΔE*94<5 in 1,000 hrs	ASTM G155
l.	Flammability 255 723		ASTM E84, NFPA & UL

		All Colors		
		6 mm	12 mm	
m.	Flame Spread	<25	<25	
n.	Smoke Developed	<25	<25	
o.	Class	A	A	NFPA 101®, Life Safety Code

- C. Solid Surface Material: 1/2" thick
- D. Non-porous, homogeneous material maintaining the same composition throughout the part with a composition of acrylic polymer, aluminum trihydrate filler and pigment; not coated, laminated or of composite construction; meeting following criteria:
- E. Flammability: Class 1 and A when tested to UL 723.
- F. Food Equipment Material Compliance: Food Zone to NSF/ANSI 51.
 - 1. Ensure material has minimum physical and performance properties specified under "Performance/Design Criteria".
 - 2. Ensure superficial damage to a depth of 0.010" is repairable by sanding and polishing.
- G. Adhesive for Bonding to Other Products: One component silicone to ASTM C920.
- H. Sealant: A standard mildew-resistant, FDA/UL® [and NSF/ANSI 51 compliant in Food Zone area,] recognized silicone color matched sealant or clear silicone sealants.
- I. Sink/Bowl Mounting Hardware: Manufacturer's approved bowl clips, brass inserts and fasteners for attachment of undermount sinks/bowls.

2.03 COMPONENTS

- A. Counter Perimeter Frame: Ensure 1/2" [3/4"] thick, moisture resistant [cores for counter tops in wet areas having sinks or lavatories are 3/4" thick exterior grade plywood with waterproof adhesive, Fir or Poplar plywood, veneer core only.] [MDF core conforming to ANSI/NPA A208.2 balanced design, manufactured from recycled materials, meeting ANSI Standards for emissions, of minimum density of 48 lb/cu ft and surface character to match sample approved by Architect.

Ensure fire retardant Product contains fire-retardant chemicals injected with raw materials during manufacturing and achieves a maximum flame-spread rating of 25 with a maximum smoke development of 200 when tested to ASTM E84.]

B. Acceptable Product: "DuPont™ Corian® Charging Unit – Individual" by DuPont.

C. Fabrication:

1. Fabricate components in shop to greatest extent practical to sizes and shapes indicated, in accordance with approved Shop Drawings and solid polymer manufacturer requirements. Form joints between components using manufacturer's standard joint adhesive without conspicuous joints. Provide factory cutouts for plumbing fittings and bath accessories as indicated on Drawings.
2. Where indicated, thermoform corners and edges or other objects to shapes and sizes indicated on Drawings, prior to seaming and joining. Cut components larger than finished dimensions and sand edges to remove nicks and scratches. Heat entire component uniformly prior to forming.
3. Ensure no blistering, whitening and cracking of components during forming.
4. Fabricate backsplashes from solid surfacing material with optional radius cove where counter and backsplashes meet as indicated on Drawings. Backsplashes for most colors may be fabricated by traditional means discussed in K-25294 *Backsplashes*. Colors with metallic/mica particle or veined colors creating directional aesthetics (K-26833 *Directional Aesthetics*) may require the techniques in Technical Bulletin K-28235 *Thermoformed Backsplash*.
5. Fabricate joints between components using manufacturer's standard joint adhesive. Ensure joints are inconspicuous in appearance and without voids. Attach 50 mm (2") wide reinforcing strip of solid polymer material under each joint. Reinforcing strip of solid polymer material is not required when using DuPont™ Joint Adhesive 2.0.
6. Provide holes and cutouts for plumbing and bath accessories as indicated on Drawings.
7. Rout and finish component edges to a smooth, uniform finish. Rout cutouts, then sand edges smooth. Repair or reject defective or inaccurate work.
8. Finish: Ensure surfaces have uniform finish:
 - a. Matte, with a 60° gloss rating of 5 - 20.
 - b. Color: Deep Espresso
9. Fabrication Tolerances:
 - a. Variation in Component Size: +/-1/8".
 - b. Location of Openings: +/-1/8" from indicated location.

PART 3 - EXECUTION

3.01 EXAMINATION

A. Verification of Conditions:

1. Examine substrates and conditions, with fabricator present for compliance with requirements for installation tolerances and other conditions affecting performance of work. Proceed with installation only after unsatisfactory conditions have been corrected.
2. Verify actual site dimensions and location of adjacent materials prior to commencing work.

3. Examine cabinets upon which counter tops are to be installed. Verify cabinets are level to within 1/8" in 10' - 0".
4. Notify Architect in writing of any conditions which would be detrimental to installation.

B. Evaluation and Assessment: Commencement of work implies acceptance of previously completed work.

3.02 INSTALLATION

- A. Install components plumb, level, rigid, scribed to adjacent finishes in accordance with reviewed Shop Drawings and Product installation details.
- B. Fabricate field joints using manufacturer's recommended adhesive, with joints being inconspicuous in finished work. Exposed joints/seams are not permitted. Keep components and hands clean when making joints. Reinforce field joints as specified herein. Cut and finish component edges with clean, sharp returns.
- C. Route radii and contours to template. Anchor securely to base component or other supports. Align adjacent components and form seams to comply with manufacturer's written recommendations using adhesive in color to match work. Carefully dress joints smooth, remove surface scratches and clean entire surface.
- D. Install countertops with no more than 1/8" sag, bow or other variation from a straight line.
- E. Adhere undermount/submount/bevel mount sinks/bowls to countertops using manufacturer's recommended adhesive and mounting hardware.
- F. Adhere topmount sinks/bowls to countertops using manufacturer recommended adhesives and color-coordinated silicone sealant. [Secure seam mount bowls and sinks to counter tops using color matched joint adhesive.]
- G. Seal between wall and components with joint sealant as specified herein and in Section 07 92 00, as applicable.
- H. Provide backsplashes and endsplashes as indicated on Drawings. Adhere to countertops using a standard color-coordinated silicone sealant. Adhere applied sidesplashes to countertops using a standard color-matched silicone sealant. Provide coved backsplashes and sidesplashes at walls and adjacent millwork. Fabricate radius cove at intersection of counters with backsplashes to dimensions shown on reviewed Shop Drawings. Adhere to countertops using manufacturer's standard color-coordinated joint adhesive.
- I. Keep components and hands clean during installation. Remove adhesives, sealants and other stains. Ensure components are clean on date of Substantial Completion of the Work.
- J. Coordinate connections of plumbing fixtures with [Division 22] [Mechanical]. Make plumbing connections to sinks in accordance with [Division 22] [Mechanical].

3.03 REPAIR

- A. Repair minor imperfections and cracked seams and replace areas of severely damaged surfaces in accordance with manufacturer's "Technical Bulletins".

3.04 SITE QUALITY CONTROL

- A. Non-Conforming Work: Replace damaged work which cannot be satisfactorily repaired, restored or cleaned, to satisfaction of Architect at no cost to Owner.

3.05 CLEANING

- A. Remove excess adhesive and sealant from visible surfaces.
- B. Clean surfaces in accordance with manufacturer's "Care and Maintenance Instructions".

3.06 PROTECTION

- A. Provide protective coverings to prevent physical damage or staining following installation for duration of Project.
- B. Protect surfaces from damage until date of Substantial Completion of the Work.

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END OF SECTION

SECTION 07 5600
LIQUID APPLIED MEMBRANE (LAM)

PART 1 GENERAL**1.01 SECTION INCLUDES**

Furnish and install a cold-fluid applied polyurethane Liquid Applied Membrane (LAM) metal gutter membrane as shown on drawings and as directed by specifier.

1. Work includes substrate preparation not limited to but including:
 - a. Creating a compatible substrate to enhance adhesions or to create a bond breaker where substrate movement could damage the integrity of the membrane.
 - b. As shown on building plans.
2. System warranties include:
 - a. Manufacturer's performance warranty for 20 years.
 - b. Installer's workmanship & material warranty for 5 years.

1.02 RELATED WORK:

- A. Section 07 6260 – Stainless Steel Flashing and Trim.

1.03 PERFORMANCE REQUIREMENTS

- A. Cold Fluid applied polyurethane membrane waterproofing is intended to perform as a barrier against liquid water or discharge of exterior incidental moisture.
- B. Membrane system when applied in an exposed application shall accommodate movements of building materials as required with sealant materials at such locations and changes in substrate, perimeter terminations conditions and penetrations.
- C. Installed membrane system shall not permit the passage of water. Membrane shall withstand the design pressure calculated in accordance with the most current revision of ASCE 7.
- D. Manufacturer must have completed a Cradle to Grave Life Cycle Analysis (LCA) and Environmental Product Declaration (EPD) according to ISO 14025:2006 for the LAM.

1.04 ADMINISTRATIVE REQUIREMENTS

- A. Owner Specified Product Selection
 1. Contractor Furnished, Contractor Installed Products
 - a. Owner has established 'Relationships' that extend beyond requirements of this project. No substitutions, equivalent products, or mixing of manufacturer's products are allowed for Work of this Section.
 - b. Follow specified procedures to preserve relationships between Owner and specified suppliers for advantages that accrue to Owner from those relationships.
 - c. Manufacturer has in-progress and final project observation obligation agreements on Church owned or Church authorized installations.

- B. Participate in mandatory pre-installation conference.
 - 1. Installer's Foreman and those responsible for installation of membrane to be in attendance. Include Membrane Manufacturer's Representative if available.
 - 2. For new installations schedule pre-installation conference at project site after installation of substrate including pipe and flue penetrations, but before application of any penetrating repellent or non-compatible component.
 - 3. In addition to agenda items specified in Section 01 3000, review following:
 - a. Review Manufacturer's written instructions.
 - b. Review delivery, storage, and handling requirements.
 - c. Review ambient conditions requirements.
 - d. Review and accept or reject substrate finish and compatibility conditions.
 - e. Review installation requirements including flashing and penetrations.
 - f. Review drainage requirements if any.
 - g. Review cleaning and disposal requirements.
 - h. Review Warranty.
 - i. Review safety issues.
 - j. Review field inspections and non-conforming work requirements.
 - k. Review protection of membrane by other trades after installation of membrane.

1.05 SUBMITTALS

- A. Submittals: Comply with project requirements for submittals as specified in Division 01.
- B. Product Data:
 - 1. Manufacturer's literature or cut sheet for each element of system.
 - 2. Manufacturer's preparation and installation instructions and recommendations for substrates related to this project.
- C. Shop Drawings:
 - a. Prepared by Installer. Approved LAM Manufacturer's standard details or specialized details for unique applications that have been reviewed and pre-approved by manufacturer.
- D. Installer's Authorization: Installer shall provide written documentation from the manufacturer of their authorization to install the system, and eligibility to obtain the warranty specified in this section.
- E. Manufacturers' Certification: Certification documenting full time quality control of the production facilities and that each batch of material is tested to ensure conformance with the manufacturer's published physical properties.
- F. VOC Certification: Manufacturers' certification that all waterproofing system products meet current Volatile Organic Compound (VOC) regulations as established by the State in which they are being installed; and stating total VOC content, in grams per liter, for all system components (i.e primers, adhesives, coatings, etc).

1.06 QUALITY ASSURANCE

- A. Manufacturers' Qualifications: Manufacturer shall demonstrate qualifications to supply materials of this section by certifying the following:
1. Liquid Applied Membrane (LAM) Manufacturer shall have been producing fluid applied membranes for over 30 years.
 2. Liquid Applied Membrane (LAM) Manufacturer shall have available an in-house technical staff to assist installer, when necessary, in the application of the products and site review of the membrane system.
- B. Installers' Qualifications: The Contractor shall demonstrate qualifications to perform the Work of this Section by submitting certification or license by the membrane manufacturer as a trained and authorized applicator of the products and site review of the assembly.
- C. Source Limitations: All components listed in this section shall be provided by a single manufacturer or approved for use by the primary LAM manufacturer.
- D. Materials Compatibility: All materials included in the Liquid Applied Membrane (LAM) assembly, as well as associated materials adhered to/applied beneath the LAM shall have been tested and verified to be compatible. Including written testing documentation and test reports if requested by Owner or Specifier.
- E. Final Inspection: Manufacturers' representative shall provide to the Owner or Specifier a comprehensive site visit report after the completion of the LAM system.
- F. Applicable Regulations: Comply with local code and requirements of authorities having jurisdiction. Do not exceed VOC regulations as established by the State in which they are being installed.; including total VOC content, in grams per liter, for all system components (i.e. primers, adhesives, coatings and similar items)
- G. Roofing/Waterproofing Terminology: Refer to ASTM D1079 and the glossary of the National Roofing Contractors Association (NRCA) Roofing and Waterproofing Manual for definitions of roofing and waterproofing terms related to this section.

1.07 DELIVERY, STORAGE, AND HANDLING

- A. Delivery and Acceptance Requirements:
1. Make no deliveries to Project until installation is about to commence, or until approved storage area is provided.
 2. Deliver products job site in original unopened containers or wrappings bearing all seals and approvals.
 3. Deliver materials in sufficient quantities to allow continuity of work.
 4. Remove any material not approved from job site.
- B. Storage and Handling Requirements:
1. Storage Requirements:
 - a. General:
 - 1) Follow Manufacturer's instructions and precautions for storage of materials.
 - 2) Handle and store LAM materials in dry location within their required temperature range.

- 3) Materials shall be stored above 55 degrees F (12.6 degrees C) a minimum of 24 hours prior to application.

1.08 PROJECT CONDITIONS

- A. Weather: Proceed with LAM only when existing and forecasted weather conditions permit. Note: LAM can proceed when precipitation is imminent. LAM is capable of curing in immersion condition immediately after application however visual pock marks may occur if uncured membrane is exposed to heavy rainfall but is not considered a limiting factor in the performance of the membrane.
 1. Temperature ranges shall be within tolerances allowed for material being used. LAM temperatures shall be above 36° F (2° C) when applying membrane.
 2. All surfaces to receive LAM shall be free from visible water, dew, frost, snow and ice.
 3. LAM application shall be conducted in well-ventilated areas.
- B. LAM is not intended to be exposed or in contact with a constant temperature below -22° F (-30° C) or in temperatures in excess of 176° F (80° C). See technical data sheets for limitations, i.e., hot pipes or direct steam venting.
- C. LAM is non-flammable and VOC compliant. Consult container, packing labels and Material Safety Data Sheets (MSDS) for specific safety information.
- D. LAM shall be installed in gutter prior to tile installation.

1.09 WARRANTY

- A. Manufacturer Warranty:
 1. Sikalastic Liquid Applied Membrane System Warranty for Twenty (20) years. System warranty shall be in accordance with the selected system.
- B. Applicator's Guarantee:
 1. Roof Installer Workmanship Warranty:
 - a. Written five (5) year guarantee covering workmanship and repairs or replacement of work without cost to Owner, counter-signed by Installer and General Contractor from date of installation.

PART 2 PRODUCTS

2.01 SYSTEM

- A. Manufacturer:
 1. Basis of Design
 - a. Sikalastic RoofPRO System as manufactured by Sika Corporation, 201 Polito Avenue, Lynhurst, NJ 07071. www.sikausa.com.
 - 1) Contact Information (USA):

- (a) Primary Contact: Steve Moosman (Sika Church of Jesus Christ Strategic Accounts Representative) 801.201.6269, moosman.steve@us.sika.com.
- (b) Secondary Contact: David Axt (LAM Technical Manager) 863.670.6841, axt.david@us.sika.com
- (c) Local Contact: Jason Maxwell (Sika Church of Jesus Christ Strategic Accounts Representative) 801.910.9905 maxwell.jason@us.sika.com

- 2. No substitutions or equivalent manufacturers allowed.

2.02 LIQUID APPLIED MEMBRANE

- 1. 20-year warranty:
 - a. Sikalastic Roof-Pro 20 – Sika Reemat Premium:
 - 1) Base Layer: Sikalastic 641 Lo-VOC, 50 mils wet film thickness, 32 sf/gal approximate coverage rate.
 - 2) Top Layer: Sikalastic 641 Lo-VOC, 30 mils wet film thickness, 53 sf/gal approximate coverage rate

2.03 MEMBRANES AND COATINGS

- 1. Base embedment coat with Reemat reinforcement shall be Sikalastic 641 Lo-VOC by Sika Corp, a single component, cold fluid applied, moisture triggered, aliphatic, polyurethane base coat membrane.
- 2. Topcoat shall be Sikalastic 641 Lo-VOC by Sika Corp, a single component, cold fluid applied, moisture triggered, aliphatic, polyurethane top-coat membrane.
- 3. Base and Topcoat membrane shall be low VOC's and one component liquid applied membrane that can be either brush or roller applied. The Liquid Applied Membrane shall have the following physical properties:
 - a. VOC Content: ASTM D-2369-81: <50 g/l
 - b. Volume Solids: ASTM D2697: 89% minimum
 - c. Weight Solids: ASTM D1644: 92% minimum
 - d. Sag Resistance: ASTM D4400: No sag at 700 micrometers (0.028 in. / 28 mils)

Film Physical Property Requirements:

 - e. Tensile Strength (Tension): ASTM D412: Minimum 1.86 MPa (270 lbs/in²)
 - f. Elongation: ASTM D412: Minimum 200%
 - g. Accelerated Weathering FL/UV – 5000 Hours, ASTM G 154, No cracking or checking
 - h. Water Vapor Transmission, Permeability/Permeance: ASTM E96: Maximum 8.5 grms/m²/day (0.33 perm inches)
 - i. Flexibility – Mandrel Bend: ASTM D522: Pass, no cracking or flaking.
 - j. Tear Resistance: ASTM D625: Minimum 5.8 kN/m (33 lbf/in)
 - k. Indentation Hardness: ASTM D2240: 83 Durometer Units (+/- 5 units)
 - l. Dynamic Puncture Resistance: ASTM D5635: Minimum 15 joules (357 ft. poundsals)
 - m. Static Pressure Resistance: ASTM D5602: Minimum 20.7 kg. (45.5 lbs)
- 4. Topcoat colors shall be as selected by Architect from Sika's Standard Colors which include:

- a. Steel Gray (RAL 7015)
- b. Standard Gray (-RAL 7040)
- c. Pearl Gray (-RAL 7047)
- d. White (RAL 9016)
- e. Mushroom (-RAL 1015)
- f. Copper Green (-RAL 6019)

2.04 MEMBRANE REINFORCEMENT

1. Sika Reemat, a conformable, random strand fiberglass mat specifically designed to provide greater impact resistance to excessive thermal movement and structural movement while maintaining elasticity and membrane integrity.
2. Consult Sikalastic Technical to ensure proper reinforcement selection for this application.
3. Supplemental Reinforcements: specifically designed for local reinforcement of the liquid applied membrane at structural cracks, expansion joints and transitions between dissimilar materials.
 - a) Sika Flexitape Heavy. A nylon mesh tape.
 - b) Sika Joint Tape SA. A self-adhering polymeric rubberized tape with a woven polyester facer.

2.05 FILLET BEAD AND PENETRATION SEALANT

1. Sealant for fillet bead applications and membrane penetrations shall be a one-part polyurethane sealant suitable for fillet bead transition compound to be applied prior to the installation of the liquid applied membrane at changes in substrate direction, cove beads, cracks in the substrate and penetrations, etc. Sikaflex 11 FC.
2. Exposed sealant for finishing terminations at saw cuts, reglets and all UV exposed sealant terminations.
 - a) Sikaflex Hyflex 150 LM: One-part low modulus hybrid sealant

2.06 PRIMERS

1. Metal Substrate Primer: A primer with a high level of corrosion resistance for metal, bleed blocking on stable asphaltic surfaces and chemically treated wood.
 - a) Sikalastic EP Primer/Sealer
 - b) Sikalastic EP Primer Rapid (a faster curing version of EP Primer)
2. Aged Sikalastic-600 Series Membrane: Sikalastic membranes older than 7 days old shall be primed to enhance adhesion.
 - a) Sika Reactivation Primer
 - b) Sika Concrete Primer Lo-VOC

PART 3 EXECUTION

3.01 INSTALLERS

- A. Installer shall be trained, and application inspected by Liquid Applied Manufacturer to satisfy 20-year warranty requirements.
- B. Contact Manufacturer's representative noted in Section 2.01 for listing of previously approved installers for this project.

3.02 EXAMINATION

- A. General
 - 1. Report substrate or any building or roof conditions that could prevent a quality installation in writing to Specifier and General Contractor. Do not start work until condition is corrected to the satisfaction of the liquid applied membrane manufacturer and applicator and as approved by the Specifier and Owner.
 - 2. Surfaces shall be sound, dry, clean and free of oil, grease, dirt excess mortar or other contaminants. Fill voids, gaps and spalled areas to provide an even plane. Strike masonry joints full flush.

3.03 PREPARATION

- A. Surface Preparation:
 - 1. General:
 - a. Substrate shall be clean, smooth, dry, free of flaws, sharp edges, loose and non-compatible foreign material, oil and grease, etc. Application shall not start until defects have been corrected.
 - b. Verify that all openings or penetrations are secured and solid. Ensure all preparatory work is complete prior to applying liquid applied membrane.
 - c. All surfaces shall be blown clean using best methods to remove any loose debris.
 - d. All cracks and voids greater than 1/16th inch shall be routed and caulked with specified sealant. Allow sealant to cure per manufacturers technical data sheets prior to over coating liquid applied membrane.
 - e. At all inside corners, gaps or voids at the juncture, and penetrations apply and tool a minimum of 3/4 - inch fillet bead of polyurethane sealant and allow to cure per membrane manufactures technical data sheet prior to over coating liquid applied membrane.
 - f. At all moving cracks, moving joints and between dissimilar materials, and similar conditions, create a minimum 1-inch-wide bond breaker utilizing bond breaker tape, centered over the crack or joint.
 - g. Membrane terminations shall be established prior to project start up and documented in shop drawings. Terminations shall occur outside of metal gutter, on the flashing flange, under the Tile shingles.

3.04 SUBSTRATE PREPARATION

- A. Acceptable substrates including concrete, concrete block, masonry, metal, and selected roof membranes.

1. Metal Surfaces
 - a) Metal surfaces shall be sound and secure.
 - b) Stainless steel surfaces require a mechanically abraded finish. You should be able to feel the surface scratches from abrading when you scratch your fingernail over the prepared surface. Metal surface by mechanical abrasion shall be followed by a solvent wipe prior to application of specified primer.

3.05 PRIMING

- A. Metal
 1. Clean and prepare metal surfaces as required.
 2. Apply Sika EP primer to clean and prepare metal surface by brush or roller at the application rate shown on the technical data sheet.
 3. Allow primer to cure and dry in accordance with manufacturers' technical data sheets.

3.06 COLD FLUID APPLIED MEMBRANE APPLICATION

1. Application of LAM assembly
2. Apply Sika 11FC sealant in gutter transitions.
3. Apply Sika joint tape SA 6" at solder seams and 90-degree transitions (over sealant application).
4. Apply Sika 621 TC Base coat at 45 mils per sf. Base coat should be approximately 2/3 of the total resin application as the base embedment coating. Embed Sika Reemat (fiberglass) into the wet base coat. Fully saturate reinforcement. Note: Reinforcement is typically pre-cut prior to application of base coat.
5. Apply slight pressure to the reinforcement with roller or brush to ensure full embedment and saturate the reinforcement into the liquid coating. Remove air pockets from under the reinforcement by rolling or brushing them out.
6. The reinforcement shall be free of air pockets, fish mouths or wrinkles. Allow base coat to fully cure before applying liquid applied top-coat.
7. Reemat reinforcement requires a minimum of two (2) inch overlaps in all directions.
8. Allow the embedment coat to fully dry (cure) prior to the application of the top-coat or other additional applications for a wet-on-dry application.
9. Apply Sika 621 TC Topcoat at 30 mils per sf and allow to cure.
 - a) Apply topcoat(s) by nap roller or brush to achieve a continuous and uniform minimum wet film thickness as required by selected system and warranty.

3.07 GUTTER DOWNSPOUTS

1. New and existing gutter downspouts.
 - a) Remove strainer from the gutter drain assembly during LAM application.
 - b) Mechanically clean, prepare and prime drain surfaces to receive LAM.
 - c) Apply EP primer three (3) to four (4) inches into the down spout from the bottom of the gutter. Allow primer to cure.
 - d) Extend the LAM (including reinforcement) down into the down spout thoroughly coating and saturating the reinforcement.
 - e) Allow downspout LAM to fully cure prior to installing the clamping ring and strainer basket.

3.08 LIQUID APPLIED MEMBRANE PROTECTION

1. LAM Protection
 - a) Protect LAM installation from other trades until completion and cure.
 - b) Do not use the gutter as a material or tool storage (catch-all) area while liquid applied membrane is curing.

3.09 CLEAN – UP

1. Site clean up
 - a) Work areas are to be kept clean and clear of debris at all times.
 - b) Do not allow trash, waste or debris to collect around the LAM installation. Trash, waste and debris shall be removed and disposed of on a daily basis. Dispose or recycle excess materials in a manner complying with EPA regulations and current health and safety requirements.
 - c) Tools and unused materials shall be collected at the end of each work period and stored properly protected from the elements.
 - d) Properly clean the finished area surrounding LAM installation.
 - e) Clean and restore all damaged surfaces to their original condition.

END OF SECTION

SECTION 10 8200**LOUVERED ROOFTOP EQUIPMENT SCREENS****PART 1 - GENERAL****1.1 SUMMARY**

- A. Section Includes:
 - 1. Fixed, extruded-aluminum louvered roof top equipment screens
- B. See Division 5 Section "Structural Metal Framing" for structural framing supporting louver sections.

1.2 PERFORMANCE REQUIREMENTS

- A. Design: Design louvers, including comprehensive engineering analysis by a qualified engineer, using structural performance requirements and design criteria indicated.
- B. Structural Performance: Louvers shall withstand the effects of gravity loads and the following loads and stresses within limits and under conditions indicated without permanent deformation of louver components, noise or metal fatigue caused by louver blade rattle or flutter, or permanent damage to fasteners and anchors.
 - 1. Wind Loads: Determine loads based on a uniform pressure of 30 lb./sq. ft. (1435 Pa), acting inward or outward.

1.3 SUBMITTALS

- A. Product Data: For each type of product indicated.
- B. Shop Drawings: For equipment screens and accessories. Include plans, elevations, sections, details, and attachments to other work. Show frame profiles and blade profiles, angles, and spacing.
- C. Samples: For each type of metal finish required.
- D. Submittal: For louvers indicated to comply with structural performance requirements and design criteria indicated.

PART 2 - PRODUCTS**2.1 MATERIALS**

- A. Aluminum Extrusions: ASTM B 221M, Alloy 6063-T5.
- B. Aluminum Sheet: ASTM B 209M, Alloy 3003 with temper as required for forming.
- C. Fasteners: Use types and sizes to suit unit installation conditions.
 - 1. For fastening aluminum, use aluminum or 300 series stainless-steel fasteners.

2.2 FABRICATION, GENERAL

- A. Join concealed frame members to each other and to fixed louver blades with fillet welds concealed from view welds, threaded fasteners, or both, as standard with louver manufacturer unless otherwise indicated or size of louver assembly makes bolted connections between frame members necessary.

2.3 EXTRUDED-ALUMINUM ROOF TOP EQUIPMENT SCREEN

- D. Horizontal Blade Louvered Roof Top Equipment Screen
 - 1. Manufacturer: Architectural Louvers Co. (Harray, LLC); Model V4JS. Subject to compliance with requirements, provide the specified product or comparable product by one of the following:
 - a. Manufacturers of equivalent products.
 - 2. Model: V4JS
 - 3. Louver Blade Depth: 4 inches (100 mm)
 - 4. Blade Profile: Plain blade without center baffle.
 - 5. Blade Nominal Thickness: Not less than 0.080 inch (2.03 mm).
 - 6. Framing Support Nominal Thickness: Not less than 0.125 inch (3.2 mm)
 - 7. Louver Performance Requirements:
 - a. Free Area: Not less than 8.0 sq. ft. (0.74 sq. m) for 48-inch- (1220-mm-) wide by 48-inch- (1220-mm-) high louver assembly.
 - b. Horizontal Drag Coefficient: Not greater than 0.63 on a cross sectional profile, allowing for a 37% reduction in wind load imposed horizontally upon supporting structural framing.

2.4 ALUMINUM FINISHES

- E. High-Performance Organic Finish: 3-coat fluoropolymer finish complying with AAMA 2605 and containing not less than 70 percent PVDF resin by weight in color coat. Prepare, pre-treat, and apply coating to exposed metal surfaces to comply with coating and resin manufacturers' written instructions.
 - 1. Color: As selected by Architect from manufacturer's full range. Color to match metal roof panels.

PART 3 - EXECUTION

3.1 INSTALLATION

- F. Locate and place equipment screens level, plumb, and at indicated alignment with adjacent work.
- G. Use concealed anchorages where possible. Provide brass or lead washers fitted to screws where required to protect metal surfaces and to make a weather-tight connection.
- H. Provide perimeter reveals and openings of uniform width to allow for thermal expansion, as indicated.
- I. Repair damaged finishes so no evidence remains of corrective work. Return items that cannot be refinished in the field to the factory and refinish entire unit or provide new units.

END OF SECTION

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SECTION 06 6001**MISCELLANEOUS PLASTIC FABRICATIONS****PART 1 - GENERAL****1.1 SUMMARY**

- A. Products Furnished But not Installed Under This Section:
 - 1. Furnish window stools as described in Contract Documents.
- B. Related Requirements:
 - 1. Section 06 2001: 'Common Finish Carpentry Requirements' for:
 - a. Installation of Window Stools.
 - 2. Section 06 4001: 'Common Architectural Woodwork Requirements' for Approved Fabricators.

1.2 REFERENCES

- A. Definitions:
 - 1. Solid Surface: Solid surface materials are manufactured from polymeric materials. Granules may also be added to enhance the color effects. Solid surface materials are non-porous and homogeneous, with the same composition throughout the thickness of the solid surface material. They are capable of being repaired, renewed to the original finish and fabricated into continuous surfaces with inconspicuous seams.
- B. Reference Standards:
 - 1. American National Standards Institute/International Cast Polymer Alliance:
 - a. ANSI/ICPA SS-1-2001, 'Performance Standard for Solid Surface Materials'.

1.3 SUBMITTALS

- A. Action Submittals:
 - 1. Product Data:
 - a. Manufacturer's literature.
 - b. Color selections.

PART 2 - PRODUCTS**2.1 ASSEMBLIES**

- A. Manufacturers:
 - 1. Acrylic Solid Surface:
 - a. Category Four Approved Manufacturers. See Section 01 6200 for definitions of Categories.
 - 1) Corian by DuPont Co, Wilmington, DE. Contact Steve Finch at (314) 941-5179 or email stephen.m.finch@dupont.com.
 - 2) Staron Solid Surfacing by Cheil Industries / Samsung Chemical USA, La Mirada, CA www.staron.com.
 - 3) Hanex Solid Surfaces by Hanwha L&C Surfaces US HQ, Atlanta, GA www.hanwhasurfaces.com.
 - 4) LG Hi-Macs Solid Surfacing by LG Solid Source LLC, Peoria, AZ www.lgcreate.com.
 - 5) 'Gibraltar Solid Surface' by Wilsonart International Inc, Temple, TX www.wilsonart.com.

B. Materials:

1. Acrylic Solid Surface Window Stools:
 - a. Design Criteria:
 - 1) Meet requirements of ANSI/ICPS SS-1.
 - b. General:
 - 1) **1/2 inch (12.7 mm)** thick 100 percent acrylic polymer.
 - c. Approved Colors: As selected by Architect from Manufacturer's standard solid (white or off-white only) colors.
 - 1) Glacier White by Corian.
 - 2) Cameo White by Corian.
 - 3) Vanilla by Corian.

PART 3 - EXECUTION: Not Used**END OF SECTION**

SECTION 10 1495**MISCELLANEOUS INTERIOR SIGNAGE****PART 1 - GENERAL****1.1 SUMMARY**

- A. Includes but not limited to:
 - 1. Furnish and install interior signs as described in contract documents.

PART 2 - PRODUCTS**2.1 MATERIALS**

- A. Room Identification Signage:
 - 1. Back Layer Material:
 - a. Cast Acrylic, 3mm thickness
 - b. Color/ Finish: Black Gloss
 - 2. Front Layer Material:
 - a. Cast Acrylic, 3mm thickness
 - b. Color/ Finish: Black Matte
 - 3. Size: See Drawings.
 - 4. Text:
 - a. Font: Gravatica Regular or similar, Color: White
 - b. Provide tactile / braille features in signage.
 - 5. Surface mount with adhesive
- B. Corner Directional Sign
 - 1. Material:
 - a. Aluminum sheet 0.65mm thickness
 - b. Color: Black Gloss
 - 2. Size: See Drawings
 - 3. Text:
 - a. Engraved White
 - b. Font: Gravatica Regular or similar, Color: White
 - 4. Surface mount with adhesive
- C. Cabinet Door Signs: Flat acrylic sub-surface graphics sign with mounting adhesive in position.
 - 1. Color:
 - a. Background: Black .
 - b. Lettering: White, Font: Gravatica Regular or similar

PART 3 - EXECUTION**3.1 INSTALLATION**

- A. Install interior signs square and plumb:
 - 1. Mounting Adhesive:
 - a. Remove adhesive protective layer.
 - b. Position sign correctly and apply to door.

- c. Roll sign to secure to surface, taking care not to damage sign.
- d. Mount signs as described in Contract Drawings.

END OF SECTION