PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

THESE DOCUMENTS ARE CONFIDENTIAL

PROJECT CONTACTS

ARCHITECT OF RECORD
CESO, INC.
175 MONTROSE WEST AVE., SUITE 400
AKRON, OH 44321

CONTACT:
JACQUELINE ROMAN - PROJECT MANAGER
EMAIL: jacqueline.roman@cesoinc.com
PHONE: 623.352.8442

MECHANICAL, PLUMBING, ELECTRICAL ENGINEER AND FIRE SUPPRESSION CRITERIA DESIGNER
HP ENGINEERING | IMEG
5504 W. PINNACLE POINT DR., SUITE 200
ROGERS, AR 72758

CONTACT:
BRITTNEY PEACE - PROJECT MANAGER
EMAIL: Brittney.B.Peace@imegcorp.com
PHONE: 479.337.4741

STRUCTURAL ENGINEER
WALLACE DESIGN COLLECTIVE
123 N. MARTIN LUTHER KING JR., BLVD.
TULSA, OK 74103

CONTACT:
CHRIS FILIP - PROJECT MANAGER
EMAIL: chris.filip@wallace.design
PHONE: 918.806.7434

CIVIL ENGINEER - UNDER SEPARATE COVER
KIMLEY-HORN
13455 NOEL ROAD, TWO GALLERIA OFFICE TOWER, SUITE 700
DALLAS, TX 75240

CONTACT:
MARY SALMONSEN, PE
EMAIL: mary.salmonsen@kimley-horn.com
PHONE: 214.256.4352

SHEET INDEX

NUMBER	NAME	PERMIT SET	REV #	DATE
GENERAL				
G0.01	COVER SHEET	11.21.2025	1	06.10.2026
G0.02	NOTES, ABBREVIATIONS, SYMBOLS AND RESPONSIBILITY MATRIX	11.21.2025	1	06.10.2026
G1.00	CODE ANALYSIS AND LIFE SAFETY PLAN	11.21.2025	1	06.10.2026
G1.01	OFFICE CORE LIFE SAFETY PLAN	11.21.2025	1	06.10.2026
G1.02	2010 ACCESSIBILITY STANDARDS	11.21.2025	1	06.10.2026
G1.10	BUILDING SIGNAGE AND GRAPHICS	11.21.2025	1	06.10.2026
G1.11	BUILDING SIGNAGE AND GRAPHICS	11.21.2025	1	06.10.2026
ARCHITECTURAL				
AS1.01	ARCHITECTURAL SITE PLAN	11.21.2025	1	06.10.2026
A0.01	WALL/PARTITION TYPES & DETAILS	11.21.2025	1	06.10.2026
A0.03	CEILING DETAILS	11.21.2025	1	06.10.2026
A0.04	SEISMIC DESIGN CATEGORIES D, E & F CEILING GRID DETAILS 1	11.21.2025	1	06.10.2026
A1.01	OVERALL FLOOR PLAN	11.21.2025	1	06.10.2026
A1.02	ENLARGED OFFICE AND INTERIOR SIGNAGE PLANS	11.21.2025	1	06.10.2026
A1.03	FINISH PLAN AND SCHEDULE	11.21.2025	1	06.10.2026
A1.04	OFFICE FURNITURE PLAN	11.21.2025	1	06.10.2026
A1.05	ENLARGED RESTROOM PLANS AND RESTROOM ELEVATIONS	11.21.2025	1	06.10.2026
A1.51	OVERALL REFLECTED CEILING PLAN	11.21.2025	1	06.10.2026
A1.52	OFFICE REFLECTED CEILING PLAN	11.21.2025	1	06.10.2026
A1.61	OVERALL ROOF PLAN	11.21.2025	1	06.10.2026
A2.01	EXTERIOR ELEVATIONS	11.21.2025	1	06.10.2026
A3.01	BUILDING SECTIONS	11.21.2025	1	06.10.2026
A3.21	WALL SECTIONS	11.21.2025	1	06.10.2026
A4.01	INTERIOR ELEVATIONS	11.21.2025		
A5.01	EXTERIOR DETAILS	11.21.2025	1	06.10.2026
A5.02	TRASH ENCLOSURE - CONCRETE	11.21.2025	1	06.10.2026
A5.03	EXTERIOR DETAILS	11.21.2025	1	06.10.2026
A5.51	MILLWORK DETAILS	11.21.2025		
A6.01	DOOR TYPES, SCHEDULES, AND DETAILS	11.21.2025	1	06.10.2026
A6.02	DOOR DETAILS	11.21.2025	1	06.10.2026
A8.01	LAUNCH PAD CANOPY PLANS	11.21.2025	1	06.10.2026
A8.02	LAUNCH PAD CANOPY SECTION & DETAILS	11.21.2025	1	06.10.2026
STRUCTURAL				
S0.00	STRUCTURAL GENERAL NOTES	11.21.2025		
S0.10	TYPICAL DETAILS	11.21.2025		
S0.20	TYPICAL INTERIOR LIGHT GAGE STEEL DETAILS	11.21.2025		
S0.21	TYPICAL INTERIOR LIGHT GAGE STEEL DETAILS	11.21.2025		
S1.00	FOUNDATION PLAN	11.21.2025	1	06.10.2026
S1.10	ROOF FRAMING PLAN	11.21.2025	1	06.10.2026
S2.00	CANOPY DETAILS	11.21.2025		
S3.00	GENERAL SCHEDULES AND DETAILS	11.21.2025	1	06.10.2026
S3.10	PANEL NOTES AND EMBEDS	11.21.2025		
S3.11	WALL PANEL DETAILS	11.21.2025		
S3.20	EXTERIOR WALL ELEVATIONS	11.21.2025	1	06.10.2026
S3.21	EXTERIOR WALL ELEVATIONS	11.21.2025	1	06.10.2026
S4.00	FOUNDATION DETAILS	11.21.2025		
S5.00	ROOF FRAMING DETAILS	11.21.2025		
S5.10	STEEL FRAMING DETAILS	11.21.2025		
PLUMBING				
FP0.01	FIRE PROTECTION SPECIFICATIONS	11.21.2025		
FP0.02	FIRE SPRINKLER GENERAL NOTES AND LEGEND	11.21.2025		
P0.01	PLUMBING LEGEND	11.21.2025		
P0.02	PLUMBING SCHEDULES	11.21.2025	1	06.10.2026
P1.01A	LEVEL 1 SANITARY AND VENT PLAN	11.21.2025	1	06.10.2026
P1.01B	LEVEL 1 SUPPLY PLAN	11.21.2025	1	06.10.2026
P1.02	PLUMBING ROOF PLAN	11.21.2025	1	06.10.2026
P3.01	PLUMBING ENLARGED PLANS	11.21.2025	1	06.10.2026
P3.02	PLUMBING ENLARGED PLANS	11.21.2025	1	06.10.2026
P4.01	PLUMBING DETAILS	11.21.2025		
P4.02	PLUMBING DETAILS	11.21.2025		
P5.01	PLUMBING DRAIN AND VENT RISER	11.21.2025	1	06.10.2026
MECHANICAL				
M0.01	MECHANICAL LEGEND	11.21.2025		
M0.02	MECHANICAL SCHEDULES	11.21.2025	1	06.10.2026
M1.01	LEVEL 1 HVAC PLAN	11.21.2025	1	06.10.2026
M1.02	ROOF MECHANICAL PLAN	11.21.2025		
M3.01	MECHANICAL ENLARGED PLANS	11.21.2025	1	06.10.2026
M4.01	MECHANICAL DETAILS	11.21.2025		

NUMBER	NAME	PERMIT SET	REV #	DATE
ELECTRICAL				
E0.01	ELECTRICAL LEGEND	11.21.2025		
E1.01	OVERALL POWER PLAN	11.21.2025	1	06.10.2026
E1.02	ROOF EQUIPMENT POWER PLAN	11.21.2025	1	06.10.2026
E1.03	ENLARGED OFFICE ELECTRICAL PLANS	11.21.2025	1	06.10.2026
E2.01	OVERALL LIGHTING PLAN	11.21.2025	1	06.10.2026
E2.02	INTERIOR LIGHTING PHOTOMETRICS	11.21.2025	1	06.10.2026
E3.01	ELECTRICAL RISER AND SCHEDULES	11.21.2025		
E3.02	ELECTRICAL SCHEDULES	11.21.2025		
E3.03	ELECTRICAL SCHEDULES	11.21.2025	1	06.10.2026
E3.04	ELECTRICAL SCHEDULES	11.21.2025	1	06.10.2026
E4.01	ELECTRICAL DETAILS	11.21.2025		
E4.02	ELECTRICAL DETAILS	11.21.2025		
E4.03	ELECTRICAL DETAILS	11.21.2025		
E4.04	ELECTRICAL ARC FLASH RELAY DETAIL	11.21.2025		
E4.05	FIRE ALARM DETAILS AND NOTES	11.21.2025		
E4.06	FIRE ALARM SPECIFICATIONS	11.21.2025		
E4.07	ELECTRICAL DETAILS	11.21.2025		
E5.01	ELECTRICAL SITE PLAN	11.21.2025	1	06.10.2026
E5.02	SITE PHOTOMETRICS	11.21.2025	1	06.10.2026

SUSTAINABILITY TRACKER

APPLICABLE CODES			IMPLEMENTATION GUARD RAILS				SITE		
ID	CATEGORY	INITIATIVE	EXPANSION APPROACH	EXISTING APPROACH	SITE CHARACTERISTICS	PROCUREMENT	STATUS	REASON EXCLUDED	PHASE EXCLUDED
DHW-01	DHW	HEAT PUMP WATER HEATERS + PIPE INSULATION	SCALE		IF EXISTING DHW HEATER EOL IS IN <5Y	BTS AND TMW	INCLUDED		
DHW-03	DHW	LOW-FLOW AND LOW-FLUSH FIXTURES	BTS		IF HVAC AND REFRIGERATION SYSTEMS ARE CONNECTED TO BMS, SEPARATE METERING OF THESE SYSTEMS IS NOT NEEDED.	BTS AND TMW	INCLUDED		
ELEC-03	ELECTRICAL	ADVANCED SUBMETERING & BMS	SCALE			BTS AND TMW	INCLUDED		
ENV-03	BUILDING ENVELOPE	WHITE ROOF	BTS			BTS, TMW IN COOLING-DOMINATED, SUNNY SITES	INCLUDED		
ENV-04	BUILDING ENVELOPE	IMPROVE DOCK SEALS	PILOT			BTS AND TMW	INCLUDED		
ENV-07	BUILDING ENVELOPE	LOW-VOC INSULATION	SCALE				INCLUDED		
HVAC-01	HVAC	ELECTRIFIED HVAC (ASHP)	SCALE		IF EXISTING AHU EOL IS IN <5Y	BTS AND TMW	INCLUDED		
HVAC-03	HVAC	PERSONAL ENVIRONMENTAL CONTROLS	WAIT				INCLUDED		
HVAC-05	HVAC	PREMIUM EFFICIENCY, VARIABLE SPEED MOTORS FOR HVAC	SCALE		IF EXISTING COMPRESSOR EOL IS IN <5Y	BTS AND TMW	INCLUDED		
HVAC-06	HVAC	ADVANCED COMMISSIONING	GRADUALLY SCALE			BTS AND TMW	INCLUDED		
HVAC-07	HVAC	CONTROLS OPTIMIZATION (ECONOMIZER, TEMPERATURE SET POINTS, SCHEDULES)	SCALE			BTS AND TMW	INCLUDED		
LTG-02	LIGHTING	LED LIGHTING	SCALE			BTS AND TMW	INCLUDED		
LTG-03	LIGHTING	OCCUPANCY SENSORS	SCALE			BTS AND TMW	INCLUDED		
MAT-02	BUILDING MATERIALS	CM MANAGEMENT AND EPD REPORTING TO EC3	SCALE			BTS AND TMW	INCLUDED		
MAT-04	BUILDING MATERIALS	STARTUP BOM ALTERNATE MATERIAL SELECTION	WAIT			BTS AND TMW	INCLUDED		
MAT-06	BUILDING MATERIALS	CONSTRUCTION WASTE MANAGEMENT					INCLUDED		
MAT-07	BUILDING MATERIALS	ILFI ZERO CARBON CERTIFICATION					INCLUDED		
MAT-08	BUILDING MATERIALS	LOW-CARBON CONCRETE	GRADUALLY SCALE			BTS AND TMW	INCLUDED		
MAT-09	BUILDING MATERIALS	TIMBER ROOF DECK					INCLUDED		
MAT-10	BUILDING MATERIALS	LOW-CARBON ASPHALT					INCLUDED		
SIT-01	SITE	NATIVE, DROUGHT-TOLERANT LANDSCAPING					INCLUDED		
SIT-02	SITE	STORMWATER MANAGEMENT					INCLUDED		

DESIGN STANDARDS

PROJECT DESCRIPTION

NEW CONCRETE WALL PANEL SINGLE STORY FULLY SPRINKLERED BUILDING (S-1 OCC.), DRIVE THROUGH VAN LOADING CANOPY (S-2 OCC.) WITH SUPPORT OFFICE AREA (B OCC.), BREAK ROOM (A-2 OCC.)

THE FACILITY IS DESIGNED TO PROVIDE LAST MILE DELIVERY OF BOTH PARCEL VOLUME AND HEAVY/BULKY PACKAGES DIRECTLY TO THE TENANTS CUSTOMERS.

1. PACKAGES ARE RECEIVED AT THE INBOUND DOCKS VIA 53' TRAILERS FOR LIVE UNLOADING. PACKAGES ARRIVING AT THIS FACILITY ARE PREPACKAGED IN CARDBOARD BOXES AND LABELED FOR SHIPPING WITHIN LOCAL NEIGHBORHOODS AND AREA SURROUNDING THE FACILITY.
2. INBOUND TRAILERS ARE UNLOADED IN AN AREA ADJACENT TO THE DOCK DOORS. PARCEL SIZED PACKAGES WILL BE SORTED VIA FIXED, SINGLE LEVEL CONVEYANCE, WHILE HEAVY/BULKY ITEMS WILL BE SORTED TO DELIVERY ROUTES IN THE OUTBOUND AREA ADJACENT TO THE INBOUND DOORS. ITEMS ARE PUT INTO BINS AND ROLLED ONTO SMALLER MOBILE CARTS. THESE CARTS ARE ROLLED INTO THE LOADING AREA, FROM WHICH THE PACKAGES ARE LOADED INTO VANS OR CONTRACT DRIVERS PERSONAL VEHICLES FOR FINAL DELIVERY. THE CARTS ARE APPROXIMATELY 42" LONG, 36" WIDE AND 79" TALL. THE LOCATION OF THE CARTS CAN BE SEEN ON THE PLAN. SHELVING SHOWN PROVIDES STORAGE UP TO 7'-0" NOMINAL HEIGHT ON SOLID SHELF. STORAGE SHELF MAX 5'-0" (PRODUCT SITS ON 5'-0" HIGH SHELF). SHELVING SHOWN FOR EGRESS PURPOSES, SUBMITTAL BY THIRD PARTY. THERE IS NO HIGH BAY RACKING/HIGH PILED STORAGE AT THIS FACILITY.
3. PARCEL VOLUME DELIVERY WILL BE GROUND LOADED INTO VANS AND/OR CONTRACT DRIVER'S PERSONAL VEHICLES IN CYCLES, IN OUTDOOR, COVERED LOADING AREAS. HEAVY/BULKY ITEMS WILL BE LOADED INTO BOX TRUCKS VIA DOCK DOORS.

THIS FACILITY IS STAFFED WITH FULL-TIME SITE LEADERSHIP PERSONNEL AND PART-TIME EMPLOYEES WHO WORK UP TO 30HRS WEEKLY. EMPLOYEES ARE ON SITE FOR INDUCT, SORT AND STAGING ACTIVITIES IN ONE TO FIVE-HOUR SHIFTS, THE MAJORITY OF WHICH OCCUR BETWEEN 9:30AM AND 2:00PM. FOR FULLY OPERATIONAL SITES, THERE ARE MORE THAN TEN UNIQUE SHIFT OPTIONS CORRESPONDING TO THE NUMBER OF OPERATIONAL CYCLES. OF THE TOTAL HEADCOUNT AT THIS LOCATION, APPROXIMATELY 5% ARE FULL-TIME MANAGERS AND THE REMAINING 95% ARE PART-TIME EMPLOYEES.

BASIS OF DESIGN

1 **CURRENT ICD DOCUMENT RECEIVED: 10/02/2025**
CURRENT SPECIFICATIONS: V2.1 SPECIFICATIONS RELEASED 12/12/2025
CURRENT DESIGN GUIDELINE: V3.1 RELEASED 02/14/2024
CURRENT ROOM DATA SHEETS: V2.2 RELEASED 09/08/2025
CURRENT BTS DRAWINGS: GEN 1.0 V2 RELEASED 12/12/2025
CURRENT SIGNAGE GUIDELINE: V4.2 RELEASED 01/27/2026
CURRENT DESIGN CRITERIA: V2.1 RELEASED 12/12/2025
ALL DESIGN BULLETINS UP TO AND INCLUDING G-0102

SHOP DRAWINGS

REFER TO SPECIFICATIONS FOR ALL REQUIRED SHOP DRAWINGS

DEFERRED SUBMITTALS

THE FOLLOWING ITEMS ARE CONSIDERED TO BE DEFERRED SUBMITTALS PER SECTION 107.3.4.1 OF THE BUILDING CODE. THE DEFERRED SUBMITTAL ITEMS SHALL NOT BE INSTALLED UNTIL THE DEFERRED SUBMITTAL DOCUMENTS HAVE BEEN APPROVED BY THE BUILDING OFFICIAL.

1. AUTOMATIC FIRE SPRINKLER SYSTEM (DESIGN BUILD)
2. FIRE ALARM SYSTEM (DESIGN BUILD)
3. SIGNAGE PERMIT (DESIGN BUILD)
4. TENANT MATERIAL HANDLING EQUIPMENT (DESIGN BUILD)

BID ALTERNATES

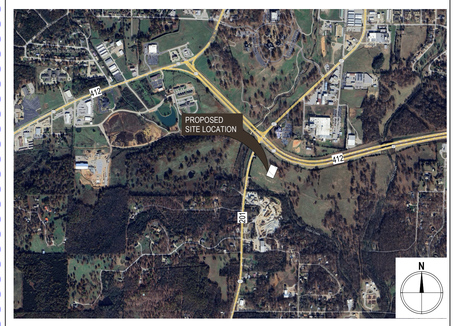
ALTERNATE 1: LOW-CARBON CONCRETE & ASPHALT:
--ALTERNATE 1A: REVISED ASPHALT SPECIFICATION FOR LOW-CARBON ASPHALT. REFER TO CIVIL DRAWINGS FOR ADDITIONAL INFORMATION.

--ALTERNATE 1B: REVISED SITE CONCRETE SPECIFICATION FOR LOW-CARBON CONCRETE. REFER TO CIVIL DRAWINGS FOR ADDITIONAL INFORMATION.

--ALTERNATE 1C: REVISED CONCRETE WALL TO BE LOW-CARBON CONCRETE. REFER TO STRUCTURAL DRAWINGS FOR ADDITIONAL INFORMATION.

--ALTERNATE 1D: REVISED BUILDING SITE-CAST CONCRETE TO BE LOW-CARBON CONCRETE. REFER TO STRUCTURAL DRAWINGS FOR ADDITIONAL INFORMATION.

PROJECT VICINITY MAP



CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
NO. 912322
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/JR/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
COVER SHEET

G0.01

ABBREVIATIONS

ABBREVIATION	DESCRIPTION	ABBREVIATION	DESCRIPTION
A		M	
A/E	ARCHITECT/ENGINEER	MAS	MASONRY
ACOUS	ACOUSTICAL	MATL	MATERIAL
ACP	ACOUSTICAL CEILING PANEL	MAX	MAXIMUM
ACT	ACOUSTICAL CEILING TILE	MBRN	MEMBRANE
ADA	AMERICANS WITH DISABILITIES ACT	MECH	MECHANICAL
ADD	ADDENDUM	MED	MEDICINE (MEDICAL)
ADJ	ADJACENT	MET	METAL
AFF	ABOVE FINISH FLOOR	MIN	MINIMUM
ALT	ALTERNATE	MIR	MIRROR
ARCH	ARCHITECT (URAL)	MISC	MISCELLANEOUS
		MLDG	MOLDING
B		MLWK	MILLWORK
BET	BETWEEN	MO	MASONRY OPENING
BH	BULKHEAD	MTD	MOUNTED
BLDG	BUILDING	MTG	MOUNTING
BLK	BLOCK	MULL	MULLION
BLKG	BLOCKING	MULT	MULTIPLE
BM	BEAM		
BOT	BOTTOM	N	
BRCG	BRACING	N/A	NOT APPLICABLE
BRG	BEARING	ND	NAPKIN DISPENSER
BRK	BRICK	NIC	NOT IN CONTRACT
		NOM	NOMINAL
C		NR	NAPKIN RECEPTACLE
C/C	CENTER TO CENTER	NTS	NOT TO SCALE
CAB	CABINET		
CB	CORNER BEAD	O	
CER	CERAMIC	O/O	OUT TO OUT
CF	CUBIC FOOT	OA	OVERALL
CFCI	CONTRACTOR FURNISHED / CONTRACTOR INSTALLED	OC	ON CENTER
		OD	OUTSIDE DIAMETER
CGD	CORNER GUARD	OF	OVERFLOW
CHAN	CHANNEL	OFCI	OWNER FURNISHED - CONTRACTOR INSTALLED
CJ	CONTROL JOINT		
CL	CENTER LINE	OH	OVERHEAD
CLG	CEILING	OPNG	OPENING
CMU	CONCRETE MASONRY UNIT	OPP	OPPOSITE
CNTR	COUNTER	OPP HAND	OPPOSITE HAND
COLM	COLUMN	OPT	OPTIONAL
CONC	CONCRETE	ORD	OVERFLOW ROOF DRAIN
CONSTR	CONSTRUCTION	ORIG	ORIGINAL
CONT	CONTINUOUS		
CP/CPT	CARPET	P	
CRS	COLD ROLLED STEEL	PERIM	PERIMETER
CRS	COURSE	PERM	PERMANENT
CRTN	CURTAIN	PH	PHASE
CSMT	CASEMENT	PJ	PANEL JOINT
CSWK	CASEWORK	PL	PLATE
CUB	CUBICLE	PLAM	PLASTIC LAMINATE
		PLAS	PLASTIC
D		PLBG	PLUMBING
DEMO	DEMOLITION	PLYWD	PLYWOOD
DF	DRINKING FOUNTAIN	PNL	PANEL
DFR	DOOR FRAME	PRCST	PRECAST
DIFF	DIFFUSER	PREFAB	PREFABRICATED
DIM	DIMENSION	PREFIN	PREFINISHED
DISP	DISPENSER	PRELIM	PRELIMINARY
DLV	DOOR LOUVER	PREP	PREPARATION
DO	DOOR OPENING	PRKG	PARKING
DS	DOWNSPOUT	PROJ	PROJECT
DSP	DELIVERY SERVICE PROVIDER	PT	PRETREATED
DT	DRAIN TILE	PTD	PAINTED
DW	DISHWASHER	PTN	PARTITION
DWG	DRAWING		
		Q	
E		QT	QUARRY TILE
EHD	ELECTRIC HAND DRYER		
EJ	EXPANSION JOINT	R	RADIUS
EL	ELEVATION	RB	RESILIENT BASE
ELEC	ELECTRICAL	RD	ROOF DRAIN
ELEV	ELEVATOR	REC	RECESSED
ENCL	ENCLOSURE	RECPT	RECEPTACLE
ENGR	ENGINEER	REF	REFER(ENCE) OR REFRIGERATOR
EQUIP	EQUIPMENT	REINF	REINFORCED(ING)/MENT)
ESMT	EASEMENT	REQD	REQUIRED
EWC	ELECTRIC WATER COOLER	RESIL	RESILIENT
EXST	EXISTING	RFG	ROOFING
EXT	EXTENDER	RLG	RAILING
		RM	ROOM
F		RND	ROUND
F/F	FACE TO FACE	RO	ROUGH OPENING
FBD	FIBERBOARD	RTU	ROOF TOP UNIT
FDN	FOUNDATION		
FE	FIRE EXTINGUISHER	S	
FGL	FIBERGLASS	S/R	SHELF AND ROD
FHC	FIRE HOSE CABINET	SAN	SANITARY
FHP	FULL HEIGHT PARTITION	SF	SQUARE FOOT
FIN	FINISH	SP	STAND PIPE
FIN FL	FINISHED FLOOR	SPNKLR	SPRINKLER
FLR (FLRG)	FLOOR(ING)	SS	STAINLESS STEEL
FLUOR	FLUORESCENT	STD	STANDARD
FO	FINISHED OPENING	STL	STEEL
FOC	FACE OF CONCRETE	STOR OR ST	STORAGE
FOF	FACE OF FINISH	STRUCT	STRUCTURAL
FOM	FACE OF MASONRY	SUSP	SUSPENDED
FOS	FACE OF STUD	SYM	SYMBOL
FR	FIRE RATING	SYS	SYSTEM
FRP	FIBERGLASS REINFORCED PLASTIC		
1 FRT	FIRE RETARDANT TREATED	T	
FTG	FOOTING	T&G	TONGUE AND GROOVE
FURN	FURNITURE	TAFS	TEXTURE APPLIED FINISH SYSTEM
FURR	FURRING	TB	TOWEL BAR
		TD	TOWEL DISPENSER
G		TDR	TRUCK DRIVER
GALV	GALVANIZED	TEL	TELEPHONE
GDR	GUARDRAIL	TEMP	TEMPORARY
GLZ	GLAZING	TF	TOP OF FOOTING
GUT	GUTTER	TFF	TOP OF FINISH FLOOR
GYP BD/GWB	GYPSUM BOARD	THRES	THRESHOLD
		TJ	TOP OF JOIST
H		TOT	TOTAL
HC	HANDICAP(PED)	TPH	TOILET PAPER HOLDER
HOMJ	HOLLOW CONCRETE MASONRY UNIT	TSL	TOP OF SLAB
HDWE/HDW	HARDWARE	TST	TOP OF STEEL
HM	HOLLOW METAL	TYP	TYPICAL
HMD	HOLLOW METAL DOOR		
HNDRL	HANDRAIL	U	
HORIZ	HORIZONTAL	UNIF	UNIFORM
HT	HEIGHT	UNO	UNLESS NOTED OTHERWISE
HVAC	HEATING, VENTILATION, AIR CONDITIONING	UR	URINAL
		V	
ICF	INSULATED CONCRETE FORM	VB	VINYL BASE
ID	INSIDE DIAMETER	VCT	VINYL COMPOSITION TILE
IF	INSIDE FACE	VERT	VERTICAL
INCAND	INCANDESCENT	VIN	VINYL
INDIC	INDICATE	VT	VINYL TILE
INSTL	INSTALL(ATION)	VWC	VINYL WALL COVERING
INSUL	INSULATION		
INT	INTERIOR	W	
		W/D	WASHER AND DRYER
J		WW	WALL TO WALL
JST	JOIST	WC	WATER CLOSET
JT	JOINT	WD	WOOD
		WDW	WINDOW
K		WH	WALL HUNG
KO	KNOCK OUT	WT	WEIGHT
KPL	KICKPLATE		
L			
LAM	LAMINATE		
LAV	LAVATORY		
LD BRG	LOAD BEARING		
LDG	LANDING		
LF	LINEAR FOOT		
LRV	LOUVERED ROOF VENT		
LTG	LIGHTING		
LTWT	LIGHTWEIGHT		
LVR	LOUVER		

GENERAL CODE NOTES

1. BUILDING SHALL BE PROVIDED WITH APPROVED ADDRESS IDENTIFICATION. THE ADDRESS IDENTIFICATION SHALL BE LEGIBLE AND PLACED IN A POSITION THAT IS VISIBLE FROM THE STREET OR ROAD FRONTING THE PROPERTY. ADDRESS IDENTIFICATION CHARACTERS SHALL CONTRAST WITH THEIR BACKGROUND. ADDRESS NUMBERS SHALL BE ARABIC NUMBERS OR ALPHABETICAL LETTERS. NUMBERS SHALL NOT BE SPELLED OUT. EACH CHARACTER SHALL BE SIZED ACCORDING TO LOCAL JURISDICTIONAL REQUIREMENTS, AND SHALL BE A MINIMUM OF 4 INCHES (102 MM) HIGH WITH A MINIMUM STROKE WIDTH OF 1/2 INCH (12.7 MM).

2. INSULATION AND ALL INTERIOR WALL AND CEILING FINISH MATERIALS SHALL COMPLY WITH THE REQUIREMENTS OF THE CODE. WHERE A FLAME SPREAD INDEX OR A SMOKE-DEVELOPED INDEX IS SPECIFIED, SUCH INDEX SHALL BE DETERMINED IN ACCORDANCE WITH ASTM E84 OR UL 723. INSULATING MATERIALS, WHEN TESTED IN ACCORDANCE WITH THE REQUIREMENTS OF THE CODE, SHALL INCLUDE FACINGS, WHEN USED, SUCH AS VAPOR RETARDERS, VAPOR PERMEABLE MEMBRANES AND SIMILAR COVERINGS, AND ALL LAYERS OF SINGLE AND MULTILAYER REFLECTIVE FOIL INSULATION AND SIMILAR MATERIALS.

3. FIRE BLOCKING IN CONCEALED WALL SPACES. IN COMBUSTIBLE CONSTRUCTION, FIREBLOCKING SHALL BE PROVIDED IN CONCEALED SPACES OF STUD WALLS AND PARTITIONS, INCLUDING FURRED SPACES, AND PARALLEL ROWS OF STUDS OR STAGGERED STUDS, AS FOLLOWS: (1) VERTICALLY AT THE CEILING AND FLOOR LEVELS. (2) HORIZONTALLY AT INTERVALS NOT EXCEEDING 10 FEET. WHERE THE CONSTRUCTION IS NONCOMBUSTIBLE, FIRE BLOCKING IS NOT REQUIRED.

4. FIRE BLOCKING CONNECTIONS BETWEEN HORIZONTAL AND VERTICAL SPACES. IN COMBUSTIBLE CONSTRUCTION, FIREBLOCKING SHALL BE PROVIDED AT INTERCONNECTIONS BETWEEN CONCEALED VERTICAL STUD WALL OR PARTITION SPACES AND CONCEALED HORIZONTAL SPACES CREATED BY AN ASSEMBLY OF FLOOR JOISTS OR TRUSSES, AND BETWEEN CONCEALED VERTICAL AND HORIZONTAL SPACES SUCH AS OCCUR AT SOFFITS, DROP CEILINGS, COVE CEILINGS AND SIMILAR LOCATIONS. WHERE THE CONSTRUCTION IS NONCOMBUSTIBLE, FIRE BLOCKING IS NOT REQUIRED.

5. TEXTILE WALL AND CEILING COVERINGS AND EXPANDED VINYL WALL AND CEILING COVERINGS SHALL HAVE A CLASS A FLAME SPREAD INDEX IN ACCORDANCE WITH ASTM E84 OR UL 723 AND BE PROTECTED BY AN AUTOMATIC SPRINKLER SYSTEM INSTALLED IN ACCORDANCE WITH THE CODE. TEST SPECIMEN PREPARATION AND MOUNTING SHALL BE IN ACCORDANCE WITH ASTM E2404.

6. THE MEANS OF EGRESS SERVING A ROOM OR SPACE SHALL BE ILLUMINATED AT ALL TIMES THAT THE ROOM OR SPACE IS OCCUPIED.

7. EGRESS ILLUMINATION EMERGENCY POWER. THE POWER SUPPLY FOR MEANS OF EGRESS ILLUMINATION SHALL NORMALLY BE PROVIDED BY THE PREMISES' ELECTRICAL SUPPLY. EMERGENCY LIGHTING FACILITIES SHALL BE ARRANGED TO PROVIDE INITIAL ILLUMINATION THAT IS NOT LESS THAN AN AVERAGE OF 1 FOOTCANDLE (11 LUX) AND A MINIMUM AT ANY POINT OF 0.1 FOOTCANDLE (1 LUX) MEASURED ALONG THE PATH OF EGRESS AT FLOOR LEVEL. ILLUMINATION LEVELS SHALL BE PERMITTED TO DECLINE TO 0.6 FOOTCANDLE (6 LUX) AVERAGE AND A MINIMUM AT ANY POINT OF 0.06 FOOTCANDLE (0.6 LUX) AT THE END OF THE EMERGENCY LIGHTING TIME DURATION. A MAXIMUM-TO-MINIMUM ILLUMINATION UNIFORMITY RATIO OF 40 TO 1 SHALL NOT BE EXCEEDED. IN GROUP I-2 OCCUPANCIES, FAILURE OF A SINGLE LAMP IN A LUMINAIRE SHALL NOT REDUCE THE ILLUMINATION LEVEL TO LESS THAN 0.2 FOOTCANDLE (2.2 LUX). THIS LIGHTING IS NOT ALLOWED TO BE CONTROLLED BY AN AUTOMATIC LIGHTING SHUTOFF DEVICE.

8. DOOR OPENING FORCE. THE FORCE FOR PUSHING OR PULLING OPEN INTERIOR SWINGING EGRESS DOORS, OTHER THAN FIRE DOORS, SHALL NOT EXCEED 5 POUNDS (22 N). THESE FORCES DO NOT APPLY TO THE FORCE REQUIRED TO RETRACT LATCH BOLTS OR DISENGAGE OTHER DEVICES THAT HOLD THE DOOR IN A CLOSED POSITION. FOR OTHER SWINGING DOORS, AS WELL AS SLIDING AND FOLDING DOORS, THE DOOR LATCH SHALL RELEASE WHEN SUBJECTED TO A 15-POUND (67 N) FORCE. THE DOOR SHALL BE SET IN MOTION WHEN SUBJECTED TO A 30-POUND (133 N) FORCE. THE DOOR SHALL SWING TO A FULL-OPEN POSITION WHEN SUBJECTED TO A 15-POUND (67 N) FORCE.

9. UNLATCHING OF DOORS. THE UNLATCHING OF ANY DOOR OR LEAF SHALL NOT REQUIRE MORE THAN ONE OPERATION.

10. MEANS OF EGRESS DOORS SHALL BE READILY DISTINGUISHABLE FROM THE ADJACENT CONSTRUCTION AND FINISHES SUCH THAT THE DOORS ARE EASILY RECOGNIZABLE AS DOORS.

11. THERE SHALL BE A FLOOR OR LANDING ON EACH SIDE OF A DOOR. SUCH FLOOR OR LANDING SHALL BE AT THE SAME ELEVATION ON EACH SIDE OF THE DOOR. LANDINGS SHALL BE LEVEL EXCEPT FOR EXTERIOR LANDINGS, WHICH ARE PERMITTED TO HAVE A SLOPE NOT TO EXCEED 0.25 UNIT VERTICAL IN 12 UNITS HORIZONTAL (2-PERCENT SLOPE). EXCEPTION 4: VARIATIONS IN ELEVATION DUE TO DIFFERENCES IN FINISH MATERIALS, BUT NOT MORE THAN 1/2" VERTICAL.

12. THRESHOLDS AT DOORWAYS SHALL NOT EXCEED 1/2" IN HEIGHT ABOVE THE FINISHED FLOOR. RAISED THRESHOLDS AND FLOOR LEVEL CHANGES GREATER THAN 1/4" SHALL BE BEVELED WITH A SLOPE NOT GREATER THAN ONE UNIT VERTICAL IN TWO UNITS HORIZONTAL.

13. EGRESS DOORS SHALL BE READILY OPERABLE FROM THE EGRESS SIDE WITHOUT THE USE OF A KEY OR SPECIAL KNOWLEDGE OR EFFORT.

14. EXITS AND EXIT ACCESS DOORS SHALL BE MARKED BY AN INTERNALLY ILLUMINATED EXIT SIGN READILY VISIBLE FROM ANY DIRECTION OF EGRESS TRAVEL. EXIT SIGN PLACEMENT SHALL BE SUCH THAT NO POINT IN AN EXIT ACCESS IS MORE THAN 100' OR THE LISTED VIEWING DISTANCE FOR THE SIGN, WHICHEVER IS LESS, FROM THE NEAREST VISIBLE EXIT SIGN.

15. FLOORS AND WALL BASE FINISH MATERIALS IN TOILET ROOMS. TOILET, BATHING AND SHOWER ROOM FLOOR FINISH MATERIALS SHALL HAVE A SMOOTH, HARD, NONABSORBENT SURFACE. THE INTERSECTIONS OF SUCH FLOORS WITH WALLS SHALL HAVE A SMOOTH, HARD, NONABSORBENT VERTICAL BASE THAT EXTENDS UPWARD ONTO THE WALLS NOT LESS THAN 4 INCHES.

16. WALLS AND PARTITIONS WITHIN 2' OF SERVICE SINKS, URINALS AND WATER CLOSETS SHALL HAVE A SMOOTH, HARD NON ABSORBENT SURFACE TO A HEIGHT OF NOT LESS THAN 4' ABOVE THE FLOOR, AND EXCEPT FOR STRUCTURAL ELEMENTS, THE MATERIALS USED IN SUCH WALLS SHALL BE OF A TYPE THAT IS NOT ADVERSELY AFFECTED BY MOISTURE.

17. GLAZING IN ALL FIXED AND OPERABLE PANELS OF SWINGING, SLIDING, AND BIFOLD DOORS SHALL BE CONSIDERED TO BE A HAZARDOUS LOCATION.

18. GYPSUM BOARD: GYPSUM BOARD AND GYPSUM PLASTER CONSTRUCTION SHALL BE ASSEMBLED AND INSTALLED IN COMPLIANCE WITH THE APPROPRIATE STANDARDS. PROVIDE WATER RESISTANT GYPSUM BOARD ON INSIDE FACE OF NEW RESTROOM WALLS AT PLUMBING FIXTURE LOCATIONS.

19. INTERNAL WALL AND CEILING FINISH OF ROOM SHALL HAVE A CLASS C CLASSIFICATION (FLAME SPREAD INDEX NOT GREATER THAN 200 AND A SMOKE-DEVELOPED INDEX NOT GREATER THAN 450) WHEN TESTED IN ACCORDANCE WITH ASTEM E 84 OR UL 723.

20. INTERNALLY ILLUMINATED EXIT SIGNS. EXIT SIGNS SHALL BE LISTED AND LABELED IN ACCORDANCE WITH UL 924 AND SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS. EXIT SIGNS SHALL BE ILLUMINATED AT ALL TIMES.

21. MANUALLY OPERATED FLUSH BOLTS OR SURFACE BOLTS ARE NOT PERMITTED. WHERE A PAIR OF DOORS SERVES A STORAGE OR EQUIPMENT ROOM, MANUALLY OPERATED EDGE OR SURFACE MOUNTED BOLTS ARE PERMITTED ON THE INACTIVE LEAF.

GENERAL MOLD & MILDEW NOTES

1. THE FOLLOWING REQUIREMENTS SHALL APPLY TO ALL NEW AND REMODEL CONSTRUCTION PROJECTS.

2. IN THE EVENT THE CONTRACTOR DISCOVERS, AT ANY TIME DURING CONSTRUCTION, ANY CONDITIONS THAT COULD INCLUDE THE PRESENCE OF MOLD AND/OR MILDEW, THE CONTRACTOR SHALL IMMEDIATELY NOTIFY THE OWNER, TENANT'S REPRESENTATIVE AND THE PROFESSIONAL OF RECORD, IN WRITING, OF THE CONCERNS AND/OR SUSPICIONS.

3. CONCURRENTLY, THE CONTRACTOR SHALL BE RESPONSIBLE TO RETAIN A MOLD AND MILDEW CERTIFIED TESTING AGENCY TO PERFORM AN INVESTIGATION AND TESTING AS REQUIRED TO EVALUATE THE NATURE AND EXTENT OF THE PROBLEM. IF THE TESTING AGENCY CONFIRMS HAZARDS, THE CONTRACTOR SHALL BE RESPONSIBLE TO OBTAIN A MINIMUM OF TWO (2) BIDS FROM COMPANIES QUALIFIED AND LICENSED TO PERFORM ALL NECESSARY REMEDIATION WORK, COMPLYING WITH ALL LOCAL, STATE AND FEDERAL ENVIRONMENTAL REGULATIONS, CODES, AND STATUTES.

4. ONCE DISCOVERY OR SUSPICION OF MOLD AND/OR MILDEW IS MADE, THE CONTRACTOR SHALL TAKE ALL RESPONSIBLE MEASURES AND PRACTICE PRECAUTIONS TO PROTECT ALL CONSTRUCTION PERSONNEL AND THE PUBLIC FROM EXPOSURE TO MOLD AND/OR MILDEW, AND SUCH PRECAUTIONS SHALL REMAIN IN PLACE UNTIL SUCH A TIME AS THE OWNER OR HEALTH AUTHORITY DIRECTS OTHERWISE. CONSTRUCTION OPERATIONS SHALL NOT BE STOPPED OR CURTAILED, EXCEPT IN THE AREA OF MOLD/MILDEW CONCERN, DUE TO THESE REQUIRED PRECAUTIONS.

5. THE CONTRACTOR SHALL MAKE ALL REASONABLE EFFORTS TO AVOID CONDITIONS FAVORABLE TO THE DEVELOPMENT OF MOLD AND MILDEW, ESPECIALLY IN VOIDS WHICH WILL BE CONCEALED AND NOT VENTILATED. IN ALL CASES, INTERIOR SPACES AND INTERIOR FINISHED CONSTRUCTION SHALL BE MAINTAINED IN DRY AND WELL VENTILATED CONDITIONS.

6. THE CONTRACTOR SHALL COMPLY WITH FEDERAL ENVIRONMENTAL AND OSHA REGULATIONS AND ALL LOCAL AND STATE HEALTH DEPARTMENT REQUIREMENTS AND RECOMMENDATIONS REGARDING MOLD AND MILDEW.

7. ALL PENETRATIONS SHALL BE SEALED WATER-TIGHT TO PREVENT MOISTURE MIGRATION FROM ENTERING THE BUILDING OR WALL CAVITIES.

8. ENSURE THAT THERE ARE NO WATER LEAKS IN CONCEALED PLUMBING CHASES. ALL SUPPLY AIR PATHS AND ALL RETURN AIR PATHS AND PLENUMS SHALL BE KEPT DRY.

RESPONSIBILITY MATRIX KEY

CODE	DESCRIPTION
GC	LANDLORD'S GENERAL CONTRACTOR
LL	LANDLORD
N/A	NOT APPLICABLE
TEN	TENANT

PROJECT SYMBOLS

XX — COLUMN GRID ID

XX — CANOPY COLUMN GRID ID

1 — REVISION ID TAG

101 — DOOR MARK TAG (ASTERISK INDICATES RATED DOOR)

FIN | 10' - 0" — CEILING TAG

WALL TYPE ID
CORE THICKNESS (INCHES*)
FIRE RATING (HOURS)
A2.1 — WALL TYPE TAG, CODED
4'-0" — HEIGHT (WHERE HEIGHT IS NOT SPECIFICALLY CALLED OUT ON PLANS, PARTITIONS SHALL BE 8" HIGHER THAN THE CEILING HEIGHT OF THE ROOMS THE PARTITIONS ABUT) (LOW WALLS, EXPOSED/CAPPED TOP).

* NOMINAL WIDTH FOR WOOD STUDS & MASONRY, NON FRACTIONAL INCHES FOR METAL STUDS.

X — WINDOW/STOREFRONT TYPE TAG

XX — FURNITURE, FIXTURE, EQUIPMENT TAG

BS-1 — SIGNAGE TAG

TS-1 — FLOOR FINISH TRANSITION STRIP TAG

CO — CLEAN OUT

DS — DOWNSPOUT LOCATION

FD — FLOOR DRAIN

FIRE EXTINGUISHER

DOCK HIGH OVERHEAD DOOR

LOAD-OUT OVERHEAD DOOR

FUTURE OPENING/ KNOCKOUT PANEL

CJ — CONTROL JOINT

INTERIOR PARTITION, REFER TO SHEET A0.01

1-HR RATED PARTITION

CONCRETE WALL PANEL

? TYP — KEYNOTE TAG

MASTER KEYNOTE LEGEND:
0000 SERIES - CANOPY/SITE RELATED ITEMS
0500 SERIES - SHELL RELATED ITEMS
1000 SERIES - INTERIOR RELATED ITEMS
1500 SERIES - CLIENT COMPOSITE RELATED ITEMS
2000 SERIES - REFLECTED CEILING PLAN RELATED ITEMS
2500 SERIES - ROOF RELATED ITEMS
3000 SERIES - MISC ITEMS

Room name
101 — TYPICAL ROOM TAG

WALL FINISH / FLOOR FINISH / BASE FINISH / WALL FINISH — ROOM FINISH TAG

Name
Elevation — LEVEL ID

1 / XXXX / SHEET NO. / REFERENCE NUMBER — INTERIOR ELEVATION TAG

1 / XXXX / SHEET NO. / REFERENCE NUMBER — EXTERIOR BUILDING ELEVATION TAG

N — TRUE NORTH — NORTH ARROW

XX / XXXX — SIM — BUILDING SECTION

WALL SECTION

DETAIL SECTION

CALL OUT

XX / XXXX — View Sub-Title: View Name, Scale: 1/8" = 1'-0" — VIEW TITLE

1

PROJECT GENERAL NOTES

1. ALL WORK SHALL BE DONE IN A SAFE AND WORKMANLIKE MANNER AND IN STRICT ACCORDANCE WITH THE LOCAL AND/OR STATE (IF APPLICABLE) BUILDING CODES, NATIONAL ELECTRIC CODE, ADOPTED ACCESSIBILITY STANDARDS, OSHA, AND ALL APPLICABLE CODES, REGULATIONS, ORDINANCES AND AUTHORITIES HAVING JURISDICTION.

2. THE PROJECT SPECIFICATIONS ARE A PART OF THESE CONSTRUCTION DOCUMENTS AND MUST BE REFERRED TO FOR COMPLETE DOCUMENTATION.

3. CONSTRUCT FROM JURISDICTIONAL APPROVED AND STAMPED CONSTRUCTION DRAWINGS. THE CONTRACTOR AND SUBCONTRACTOR SHALL OBTAIN AND PAY FOR ALL PERMITS, INSPECTION FEES, AND DEPOSITS REQUIRED FOR THE INSTALLATION OF ALL WORK. THE CONTRACTOR IS RESPONSIBLE TO OBTAIN INSPECTIONS AND APPROVAL FROM CITY INSPECTORS.

4. EACH SUBCONTRACTOR IS RESPONSIBLE FOR HAVING A THOROUGH KNOWLEDGE OF ALL DRAWINGS AND SPECIFICATIONS IN THEIR RELATED FIELD. THE FAILURE TO ACQUAINT THEMSELVES WITH THIS KNOWLEDGE DOES NOT RELIEVE THEM OF ANY RESPONSIBILITY FOR PERFORMING HIS WORK PROPERLY. NO ADDITIONAL COMPENSATION SHALL BE ALLOWED BECAUSE OF CONDITIONS THAT OCCUR DUE TO FAILURE TO FAMILIARIZE WORKERS WITH THIS KNOWLEDGE.

5. ANY DAMAGE TO PROPERTY WHICH OCCURS DURING THE PROCESS OF CONSTRUCTION SHALL BE REPAIRED/REPLACED TO MATCH EXISTING AT NO ADDITIONAL COST TO OWNER.

6. THE CONTRACTOR SHALL KEEP THE WORK AREA CLEAN AND FREE OF DEBRIS AND REMOVE ALL TRASH AND DEBRIS FROM THE CONSTRUCTION AREA DAILY. NO FLAMMABLE MATERIALS OR LIQUIDS MAY BE STORED IN THE BUILDING. MUD AND DEBRIS TRACKED ONTO OWNER PAVING OR CITY STREETS SHALL BE CLEANED IMMEDIATELY.

7. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE TIMELY ORDERING OF MATERIALS TO PROHIBIT DELAYS OF THE CONSTRUCTION SCHEDULE OF THIS PROJECT. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO COORDINATE DELIVERY OF MATERIALS IN A TIMELY MANNER.

8. ALL MATERIALS STORED ON THE SITE, EXISTING CONSTRUCTION AND FINISHED CONSTRUCTION SHALL BE PROTECTED FROM WEATHER, VANDALISM AND OTHER CONSTRUCTION ACTIVITIES TO PREVENT DAMAGE AND DETERIORATION UNTIL SUBSTANTIAL COMPLETION. FAILURE TO PROTECT MAY BE CAUSE FOR REJECTION OF WORK.

9. CONTRACTOR SHALL INCLUDE ALL NECESSARY TEMPORARY CONSTRUCTION REQUIRED TO COMPLETE THE PROJECT IN THE BIDDING PRICE.

10. ALL WORK REQUIRED SHALL BE FURNISHED, INSTALLED COMPLETE AND IN OPERATION. THE CONTRACTOR IS RESPONSIBLE FOR ALL INSTALLATION AND/ OR CONNECTION OF EQUIPMENT FOR A COMPLETE AND OPERATIONAL FACILITY UNLESS NOTED OTHERWISE.

11. THE GENERAL CONTRACTOR SHALL RESPOND TO ALL REQUIREMENTS OF THE ARCHITECT AND CONSULTANTS FOR VERIFICATIONS, RESPONSES, AND SUBMISSIONS.

12. SHOP DRAWINGS ARE TO COMPLEMENT AND SUPPLEMENT CONSTRUCTION DOCUMENTS. REVIEW OF SHOP DRAWINGS DOES NOT RELIEVE CONTRACTOR OR SUBCONTRACTOR OF RESPONSIBILITY FOR CONFORMANCE WITH CONSTRUCTION DOCUMENTS.

13. CONTRACTOR MUST HAVE THE LOCATIONS OF ALL UNDERGROUND UTILITIES IDENTIFIED AND MARKED PRIOR TO COMMENCING ANY EXCAVATION.

14. REPAIR, RE-ROUTE, AND EXTEND ALL SERVICES/UTILITIES, PIPING, AND CONDUIT AS REQUIRED DURING THE CONSTRUCTION PROCESS FOR THE COMPLETE INSTALLATION AND OPERATIONS OF NEW EQUIPMENT. THIS INCLUDES ALL ITEMS SHOWN OR NOT SHOWN ON THE DRAWINGS. RESET EXISTING ITEMS AS REQUIRED FOR PROPER OPERATION.

15. ANY DISCREPANCIES BETWEEN DRAWINGS, SPECIFICATIONS, AND/OR BUILDING CONDITIONS SHALL BE BROUGHT TO THE ATTENTION OF THE ARCHITECT FOR RESOLUTION PRIOR TO PROCEEDING WITH THE WORK, ORDERING MATERIALS, OR FABRICATION.

16. WHEN CONCEALED OR UNKNOWN CONDITIONS ARE DISCOVERED THAT WILL AFFECT THE FINAL DESIGN OR CHANGE THE SCOPE OF WORK. CONTACT THE ARCHITECT AND TENANT FOR RESOLUTION PRIOR TO STARTING WORK.

17. THE CONTRACTOR IS RESPONSIBLE FOR MEANS, METHODS, TECHNIQUES, SEQUENCING, PROCEDURES, SHORING, BRACING SAFETY AND INSURANCE IN CONNECTION WITH THE WORK. INCLUDING THE WORK OF ALL TRADES AND COORDINATION BETWEEN TRADES.

18. CONTRACTOR SHALL FIELD VERIFY EXISTING CONDITIONS AND COORDINATE ALL DRAWINGS AND DIMENSIONS. DATUMS, LEVEL, SIZE AND LOCATION OF ALL OPENINGS AND ROUGH OUTS FOR DUCTS, PIPES, CONDUITS, CABINETS AND EQUIPMENT; AND COORDINATE SAME WITH ALL TRADES PRIOR TO PROCEEDING WITH ANY WORK OR FABRICATION.

19. THE DRAWINGS INDICATE LOCATIONS, DIMENSIONS AND TYPICAL DETAILS OF CONSTRUCTION. WHEN CONSTRUCTION DETAILS ARE NOT SHOWN FOR PORTIONS OF THE WORK, DETAILS SHALL BE THE SAME AS FOR SIMILAR WORK. IF QUESTIONS CANNOT BE RESOLVED IN THIS MANNER, CONTACT THE ARCHITECT PRIOR TO PROCEEDING.

20. THE CONTRACTOR AND EACH SUBCONTRACTOR SHALL DO ALL THE NECESSARY CUTTING, PATCHING AND FITTING AS REQUIRED TO PERFORM THE WORK AND SHALL BE DONE WITH APPROPRIATE MATERIALS AND TOOLS TO INSURE THE HIGHEST QUALITY OF WORK.

21. DIMENSIONS ARE TO STRUCTURAL GRID, CENTERLINE OF COLUMNS, AND FACE OF STUDS/CONCRETE WALL, UNLESS NOTED OTHERWISE.

22. IF DIMENSIONS ARE IN QUESTION, THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING CLARIFICATION FROM THE ARCHITECT BEFORE CONTINUING CONSTRUCTION. ALL MEASUREMENTS ARE SUBJECT TO VERIFICATION IN THE FIELD BY THE CONTRACTOR, AND THEY SHALL NOTIFY THE ARCHITECT OF ANY DISCREPANCIES PRIOR TO FABRICATION OR CONSTRUCTION. DO NOT SCALE THESE DRAWINGS, SHOULD ANY DIMENSIONAL DISCREPANCIES BE ENCOUNTERED, CLARIFICATIONS SHALL BE OBTAINED FROM THE ARCHITECT. CONTRACTOR SHALL FOLLOW CONSTRUCTION DOCUMENTS AS DETAILED AND DIMENSIONED.

23. DIMENSIONS MARKED "CLR" ARE FROM FINISH SURFACE TO FINISH SURFACE. DIMENSIONS WITH THIS MARK TAKE PRIORITY OVER ADJACENT DIMENSIONS. DIMENSIONS ADJACENT TO LATCH SIDE OF DOORS INDICATE REQUIRED CLEARANCES BETWEEN CLEAR DOOR OPENING AND ADJACENT FINISHES.

24. THE TERMS "ABOVE FINISH FLOOR" (AFF) AND "FINISH FLOOR ELEVATION" REFER TO FINAL FINISHED FLOOR, WHETHER BUILT-UP SLAB, COMPOSITE DECK, OR RAISED ACCESS FLOOR.

25. DURING ENTIRE CONSTRUCTION PERIOD, PROVIDE ONE U.L. LISTED 2A:20BC DRY CHEMICAL FIRE EXTINGUISHER, OR ONE STANDARD U.L. LISTED 2-1/2 GALLON WATER (E-10) AND ONE U.L. LISTED 10BC CARBON DIOXIDE FIRE EXTINGUISHER MOUNTED TOGETHER IN EACH 3000 SQ. FT. OF WORK AREA OR FRACTION THEREOF (MINIMUM OF TWO AVAILABLE IN ALL CONSTRUCTION AREAS AT ALL TIMES).

26. REFER TO MEP SHEETS FOR SPRINKLER SYSTEM. THE GENERAL CONTRACTOR SHALL HIRE A LICENSED SPRINKLER CONTRACTOR. CONTRACTOR TO SUBMIT SIGNED AND SEALED SPRINKLER DRAWINGS FOR APPROVAL PRIOR TO ANY WORK ASSOCIATED WITH THE AUTOMATIC SPRINKLER SYSTEM. WORK SHALL BE DONE UNDER SEPARATE PERMIT. SPRINKLER CONTRACTOR SHALL BE RESPONSIBLE FOR ALL PERMITS, PLAN SUBMITTALS, AND FEES ASSOCIATED WITH THIS PROJECT AS REQUIRED BY LOCAL FIRE CODES. NEW BUILDING SHALL BE INSTALLED THROUGHOUT WITH AN IBC APPROVED AUTOMATIC FIRE SPRINKLER SYSTEM. FURNISHED & INSTALLED BY A LICENSED SPRINKLER CONTRACTOR.

27. GENERAL CONTRACTOR SHALL PROVIDE AND INSTALL KNOX BOX. GENERAL CONTRACTOR TO COORDINATE TYPE OF BOX AND LOCATION WITH FIRE DEPARTMENT OFFICIAL.

28. IT IS IMPERATIVE THAT THE ROOF FRAMING AND ROOFING SYSTEM BE KEPT INTACT TO ELIMINATE POTENTIAL WATER DAMAGE OR MOISTURE INFILTRATION. THE CONTRACTOR SHALL KEEP THE BUILDING WATERTIGHT AT ALL TIMES AND MAKE REPAIRS IMMEDIATELY SHOULD ANY DAMAGE OCCUR TO THE ROOFING SYSTEM.

29. CUTTING AND DRILLING OF STRUCTURAL MEMBERS NOT DETAILED REQUIRES THE W

CODE BASIS OF DESIGN

2021 ARKANSAS FIRE PREVENTION CODE VOL. I., II. AND III. WITH ARKANSAS AMENDMENTS
WITH 2021 INTERNATIONAL BUILDING CODE
2021 ARKANSAS MECHANICAL CODE WITH ARKANSAS AMENDMENTS
2018 ARKANSAS PLUMBING CODE WITH ARKANSAS AMENDMENTS
2021 ARKANSAS ELECTRICAL CODE
2009 ARKANSAS ENERGY CODE (2009 AREC)
2018 NFPA 101 LIFE SAFETY CODE (LSC)
2010 ADA ACCESSIBILITY CODE

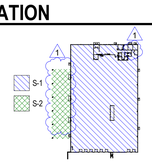
SPECIAL INSPECTIONS AND TESTS

1. SPECIAL INSPECTIONS ARE REQUIRED ON NEW CONSTRUCTION AS REQUIRED BY CHAPTER 17 OF THE 2021 ARKANSAS BUILDING CODE.
2. REQUIRED SPECIAL INSPECTIONS SHALL BE PERFORMED BY A TESTING AGENCY APPROVED BY AHJ.

CODE - BUILDING INFORMATION

CONSTRUCTION TYPE:
IIB, FULLY SPRINKLERED (SECTION 602.2)

BUILDING HEIGHT:
ALLOWED: 75'-0" (TABLE 504.4)
PROVIDED: 32'-6" (1 STORY)
24'-0" MIN DECK HEIGHT



BUILDING AREA: (SECTION 506.2)
ALLOWED: UNLIMITED - NO MORE THAN ONE STORY
ABOVE GRADE PLANE, YARD WIDTH GREATER THAN 60 FT
ON ALL SIDES AND COMPLIANT USES. (SECTION 507.4)

AREA SCHEDULE (ALLOWABLE BUILDING) (GROSS AREA MEASURED AT EXT. FACE OF WALLS)

SPACE	AREA	USE GROUP	USE GROUP NAME	OCCUPANCY SEPARATION TYPE	SPRINKLER SYSTEM
BUILDING	49,574.76 SF	S-1	MODERATE-HAZARD STORAGE	NON-SEPARATED MIXED USE	ESFR SPRINKLER SYSTEM
CANOPY	8,863.25 SF	S-2	LOW-HAZARD STORAGE	NON-SEPARATED MIXED USE	NOTE 1

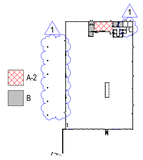
NOTE 1: FIRE SUPPRESSION IS A DEFERRED DESIGN. REFER TO FP1.01 FOR ADDITIONAL INFORMATION & FOR INSTANCES WHEN AN AHJ MIGHT REQUIRE SUPPRESSION AT THE CANOPY

BUILDING AREA SUMMARY:
TOTAL BUILDING GROSS SQUARE FOOTAGE: 49,575 SF
TOTAL BUILDING NET SQUARE FOOTAGE: 48,720 SF

ACCESSORY AREA USE:
MAXIMUM ALLOWABLE ACCESSORY USE: 10% (PER SECTION 508.2.3)

AREA SCHEDULE (ACCESSORY USE)

USE GROUP	ALLOWABLE AREA	ACTUAL AREA	PERC OF USE%
PRIMARY			
S-1		47,390 SF	95.59%
		47,390 SF	95.59%
ACCESSORY			
A-2	<9,500 SF	1,261 SF	2.54%
B	<23,000 SF	923 SF	1.86%
		2,184 SF	4.41%
TOTAL AREA		49,575 SF	100.00%



OCCUPANT LOAD

(CHAPTER 7 [LSC] MEANS OF EGRESS, SECTION 7.3.1.2 OCCUPANT LOAD, TABLE 7.3.1.2)

DESIGN OCCUPANT LOAD SCHEDULE

SPACE NAME	AREA	BUILDING USE GROUP	FACTOR	METHOD	OCCUPANT LOAD TOTAL
ASSEMBLY, UNCONCENTRATED (TABLES & CHAIRS) A-2					
BREAK AREA	1,261 SF	A-2	15	NSF	85
A-2					85
BUSINESS AREAS B					
ENTRY	133 SF	B	150	GSF	1
MULTI- FAITH SUITE	371 SF	B	150	GSF	3
OFFICE	166 SF	B	150	GSF	2
					6
BUSINESS AREAS, CONCENTRATED B					
LOCKERS	253 SF	B	50	GSF	6
B					12
ACCESSORY STORAGE AREAS, MECHANICAL EQUIPMENT ROOM S-1					
FIRE ELEC	382 SF	S-1	300	GSF	2
					2
WAREHOUSES S-1					
RR CORE	861 SF	S-1	500	GSF	2
WAREHOUSE AREA	46,148 SF	S-1	500	GSF	93
					95
S-1					97
TOTAL BUILDING OCCUPANT LOAD					194

EGRESS COMPONENTS: REQUIRED: (SECTION 7.3 [LSC])

EXITS & EGRESS WIDTHS - REQUIRED

NUMBER OF EXITS	WIDTH FACTOR (INCHES)	CLEAR WIDTH (INCHES)	OCCUPANT LOAD	
2	0.2	38.80 in	194	

(TABLE 7.3.3.1 & SECTION 7.4 [LSC])

EXITS & EGRESS WIDTHS - PROVIDED

NUMBER OF EXITS PROVIDED	NOM WIDTH	CLEAR WIDTH (INCHES) PROVIDED	TOTAL WIDTHS PROVIDED	OCCUPANT LOAD PROVIDED
7	36 in	32 in	224 in	1,120
1	48 in	44 in	44 in	220
8			268 in	1,340

EXIT FROM BREAKROOM AND TRAINING ROOM:
EGRESS THROUGH ADJOINING SPACES: (PER 7.5.1.5 [LSC])
EGRESS THROUGH INTERVENING ROOM OR SPACE IS ALLOWED WHEN SPACES ARE ACCESSORY TO ONE ANOTHER.

1017.2.2 GROUPS F-1 AND S-1 INCREASE:
THE MAXIMUM EXIT ACCESS TRAVEL DISTANCE SHALL BE 400 FT (122 M) IN GROUP F-1 OR S-1 OCCUPANCIES WHERE ALL OF THE FOLLOWING CONDITIONS ARE MET:
1. THE PORTION OF THE BUILDING CLASSIFIED AS GROUP F-1 OR S-1 IS LIMITED TO ONE STORY IN HEIGHT.
2. THE MINIMUM HEIGHT FROM THE FINISHED FLOOR TO THE BOTTOM OF THE CEILING OR ROOF SLAB OR DECK IS 24 FT (7315 MM).
3. THE BUILDING IS EQUIPPED THROUGHOUT WITH AN AUTOMATIC SPRINKLER SYSTEM IN ACCORDANCE WITH SECTION 903.3.1.1.

PATH OF TRAVEL DISTANCES

EXIT LENGTH OF TRAVEL: (TABLE 42.2.6 [LSC])
S-1 250' (400' MAX. WITH INCREASE)
S-2 300' MAX.
B 300' MAX.
A-2 250' MAX.

COMMON PATH OF TRAVEL: (TABLE 42.2.5 [LSC])
S-1 100' MAX.
S-2 100' MAX.
B 100' MAX.
A-2 75' MAX.

BUILDING USE GROUP PATH OF TRAVEL DISTANCES (FIRST FLOOR)

PATH ID	EGRESS TRAVEL DISTANCE ACTUAL	EGRESS TRAVEL DISTANCE ALLOWABLE	COMMON PATH OF TRAVEL DISTANCE ACTUAL	COMMON PATH OF TRAVEL DISTANCE ALLOWABLE	USE GROUP
1A	181' - 7"	400' - 0"	0"	100' - 0"	S-1
1B	195' - 11"	250' - 0"	0"	100' - 0"	S-1, S-2
2A	153' - 8"	400' - 0"	63' - 6"	100' - 0"	S-1
2B	160' - 7"	400' - 0"	78' - 6"	100' - 0"	S-1

ENERGY CODE BASIS OF DESIGN

CLIMATE ZONE: 4A (2009 AR STATE ENERGY CODE)

CODE SUMMARY - FOR REFERENCE ONLY (2009 AREC TABLE 502.1.2 (FOR COMMERCIAL)):

ROOF:	R-20 ci (INSULATION ENTIRELY ABOVE DECK)
OPAQUE WALL (CONDITIONED):	R-9.5 ci
PERIMETER SLAB EDGE INSULATION:	N/R
SOLID DOOR (SWINGING):	U=0.70
OVERHEAD DOOR:	U=0.50
GLAZING:	SHGC=.40, U-VALUE=.50
GLAZED DOOR:	U=0.85

PROJECT SPECIFIC REQUIREMENTS

ROOF:	R-40ci (INSULATION ENTIRELY ABOVE DECK)
OPAQUE WALL (CONDITIONED):	R-9.5 INSULATION FROM 8'-0" AFF TO DECK AT EXTERIOR CONCRETE WALLS R-13 INSULATION AT PERIMETER OFFICE WALLS
PERIMETER SLAB EDGE INSULATION:	N/R
SOLID DOOR (SWINGING):	U=0.7 (MIN)
OVERHEAD DOOR:	U=0.4 (MIN)
GLAZING:	SHGC=0.40 (MIN), U-VALUE=0.5 (MIN)
GLAZED DOOR:	U=0.85 (MIN)

FIRE PROTECTION SYSTEM (SECTION 9.7 LSC)
THIS BUILDING HAS BEEN DESIGNED WITH AN ESFR FIRE PROTECTION SYSTEM DUE TO THE FOLLOWING:
- THE MATERIALS BEING STORED: THERE IS A POTENTIAL FOR STORAGE OF GROUP A EXPANDED AND UNEXPANDED PLASTICS, REQUIRING A HIGHER LEVEL OF PROTECTION PER NFPA 13 (2016 ED.), SECTION 15.4.
- THE HEIGHT OF THE STORAGE IS BELOW 12 FEET. THEREFORE, THE CASE PRESENTED IS NOT CLASSIFIED AS HIGH-PILED STORAGE PER NFPA 13 (2016 ED.), SECTION 3.9.1.16.

INCLUDED SYSTEMS
1. FIRE PROTECTION SYSTEM - YES, APPROVED FIRE SUPPRESSION SYSTEM PER SECTION 9.7 [LSC]
2. ALARMS - YES, APPROVED FIRE ALARM SYSTEM PER SECTION 9.6 [LSC].NFPA 72
3. AUTOMATIC FIRE DETECTION SYSTEM - YES, APPROVED FIRE DETECTION SYSTEM PER SECTION 9.6.2.9 [LSC] & NFPA 72
4. SMOKE CONTROL SYSTEM - N/A
5. SUPERVISION - YES, BY APPROVED SUPERVISING AGENCY (SECTION 9.7.2 [LSC])

FIRE ALARM & FIRE PROTECTION NOTES:
1. FIRE SUPPRESSION SYSTEM - REFER TO FIRE PROTECTION DRAWINGS
2. FIRE ALARM SYSTEM - REFER TO FIRE ALARM DRAWINGS
3. COORDINATE BUILDING KEYING AND KNOX BOX LOCATION(S) WITH TENANT AND AHJ/FIRE OFFICIAL.
4. MANUAL PULL STATION PROVIDED AT ALL AGRESS DOORS

FIRE EXTINGUISHERS - PORTABLE FIRE EXTINGUISHERS ARE PROVIDED AS REQUIRED BY SECTION 9.9 OF LSC. REFER TO PLAN BELOW FOR GENERAL LAYOUT FOR REFERENCE. REFER TO FIRE PROTECTION DRAWINGS FOR FE SIZE, TYPE AND LOCATION.

EXIT DOORS
1. EXIT DOORS SHALL BE OPENABLE FROM THE EGRESS SIDE WITHOUT SPECIAL KNOWLEDGE, EFFORT OR THE USE OF A SPECIAL KEY OR LATCH.
2. EXIT DOORS SHALL SWING IN THE DIRECTION OF TRAVEL WHEN SERVING AN OCCUPANT LOAD OF 50 OR MORE.
3. UNLATCHING FORCE OF PANIC HARDWARE SHALL NOT EXCEED 15 POUNDS WHEN APPLIED IN THE DIRECTION OF TRAVEL.
4. CORRIDORS SHALL BE MAINTAINED WITH A MINIMUM CLEAR WIDTH OF 44" AND 7'-6" MINIMUM HEIGHT, OR AS REQUIRED BY AHJ.
5. EXIT DOORS SHALL BE A MINIMUM OF 32" CLEAR WIDTH & MAXIMUM 48" WIDE LEAF. MINIMUM 6'-8" DOOR HEIGHT.
6. DOORS IN ANY POSITION SHALL NOT REDUCE THE REQUIRED CORRIDOR EXIT WIDTH BY MORE THAN HALF.
7. EXTERIOR LANDINGS AT ALL EXIT DOORS SHALL BE LEVEL WITH A SLOPE OF 2% MAX.

EXIT SIGNAGE
1. MAIN EXIT DOORS WITHOUT PANIC HARDWARE SHALL HAVE A SIGN WITH LETTERS ON A CONTRASTING BACKGROUND STATING: " THIS DOOR TO REMAIN UNLOCKED WHEN THIS SPACE IS OCCUPIED " VERIFY WITH JURISDICTION PRECISE WORDING.
2. TACTILE EXIT SIGNAGE SHALL BE REQUIRED. REFER TO SIGNAGE DRAWINGS FOR DETAILS AND SPECIFICATIONS:
   A. EACH GRADE-LEVEL EXTERIOR EXIT DOOR SHALL BE IDENTIFIED BY A TACTILE SIGN WITH THE WORD "EXIT".
   B. EXIT DOOR THAT LEADS DIRECTLY TO A GRADE-LEVEL EXTERIOR EXIT BY MEANS OF A STAIRWAY OR RAMP SHALL BE IDENTIFIED BY A TACTILE SIGN WITH THE FOLLOWING WORDS, "EXIT STAIR DOWN", "EXIT RAMP DOWN", EXIT STAIR UP", OR "EXIT RAMP UP"
   C. EACH EXIT DOOR THAT LEADS DIRECTLY TO A GRADE-LEVEL EXTERIOR EXIT BY MEANS OF AN EXIT ENCLOSURE OR AN EXIT PASSAGEWAY SHALL BE IDENTIFIED BY A TACTILE EXIT SIGN WITH THE WORDS, "EXIT ROUTE".
   D. EACH EXIT ACCESS DOOR FROM AN INTERIOR ROOM, OR AREA TO A CORRIDOR OR HALLWAY THAT IS REQUIRED TO HAVE A VISUAL EXIT SIGN, SHALL BE IDENTIFIED BY A TACTILE EXIT SIGN WITH THE WORDS, "EXIT ROUTE".
3. SIGNAGE SHALL BE LOCATED AT LATCH SIDE OF SINGLE DOOR AND RIGHT SIDE OF DOUBLE DOORS FROM DIRECTION OF EGRESS.
4. SIGNAGE AND TACTILE FLOOR DESIGNATIONS SHALL BE LOCATED AT EACH STAIR IDENTIFYING EACH STAIR BY NAME OR NUMBER.
5. FOR A-2 AND A-3 OCCUPANCIES PROVIDE SIGNAGE POSTING THE ROOM CAPACITY.
6. SIGNAGE AND TACTILE SIGNAGE SHALL BE PROVIDED AT EACH EXIT DOOR WITH DELAYED EGRESS LOCK, AND SHALL BE LOCATED ABOVE AND WITHIN 12" OF DOOR EXIT HARDWARE.
   A. FOR DOORS THAT SWING IN THE DIRECTION OF EGRESS, THE SIGN SHALL READ "KEEP PUSHING. THIS DOOR WILL OPEN IN 15 SECONDS. ALARM WILL SOUND."
   B. FOR DOORS IN THE OPPOSITE DIRECTION OF EGRESS, THE SIGN SHALL READ "KEEP PULLING. THIS DOOR WILL OPEN IN 15 SECONDS. ALARM WILL SOUND."
7. SIGNAGE AND TACTILE SIGNAGE SHALL BE LOCATED AT EACH EXIT SERVING A REQUIRED ACCESSIBLE SPACE. SIGNAGE SHALL BE INSTALLED INDICATING THE LOCATION OF ACCESSIBLE MEANS OF EGRESS.
8. EXITS IN EXCESS OF THOSE REQUIRED BY THE CODE WITHOUT A RAMP AND MORE THAN 24" ABOVE GRADE SHALL HAVE SIGNS "EXIT STAIR DOWN"
9. EXIT SIGNAGE SHALL BE INTERNALLY ILLUMINATED AT ALL TIMES WITH EMERGENCY ELECTRICAL BACK-UP POWER.
10. EXIT SIGN ILLUMINATION SHALL NOT BE LESS THAN 5 FOOT CANDLES EXIT SIGNS SHALL HAVE TWO POWER SOURCES, ONE FROM THE PREMISES WIRING SYSTEM, THE OTHER FROM BATTERIES.
11. FINAL PLACEMENT OF EXIT SIGNS IS SUBJECT TO APPROVAL AND MODIFICATION OF THE FIRE DEPARTMENT FIELD INSPECTOR.
12. GC, WITH FIRE MARSHAL'S DIRECTION, WILL DETERMINE IF ANY ADDITIONAL LIGHTED EMERGENCY EXIT SIGNAGE IS NEEDED. GC TO INSTALL IF ADDITIONAL SIGNAGE IS REQUIRED.

EXIT ILLUMINATION
1. MEANS OF EGRESS SHALL BE ILLUMINATED AT ANY TIME THE BUILDING IS OCCUPIED WITH LIGHT HAVING AN INTENSITY OF NOT LESS THAN ONE FOOT CANDLE AT WALKING SURFACE LEVEL EXIT ILLUMINATION FIXTURES SHALL BE ON A SEPARATE NIGHT LIGHT CIRCUIT WITH BATTERY BACK-UP EXIT ILLUMINATION SHALL BE PROVIDED FOR NOT LESS THAN 90 MINUTES VIA STORAGE BATTERIES, OR ON-SITE GENERATOR.

INTERIOR WALL AND CEILING FINISHES

SECTIONS 10.2.3.3 2018 LSC

INTERIOR WALL AND CEILING FINISH MATERIAL

CLASS A:	FLAME SPREAD INDEX 0-25; SMOKE -DEVELOPED INDEX 0-450.
CLASS B:	FLAME SPREAD INDEX 26-75; SMOKE -DEVELOPED INDEX 0-450.
CLASS C:	FLAME SPREAD INDEX 76-200; SMOKE -DEVELOPED INDEX 0-450.

TABLE 10.2.3.3 2018 LSC

INTERIOR WALL AND CEILING FINISH REQUIREMENTS BY OCCUPANCY

	INTERIOR EXIT STAIR WAYS AND RAMPS AND EXIT...	CORRIDOR AND ENCLOSURE FOR EXIT ACCESS...	ROOMS AND ENCLOSED SPACES
A-2	B	B	C
A-3	B	B	C
B	B	B	C
S	C	C	C

SECTION 10.2.2.2

INTERIOR FLOOR FINISH REQUIREMENTS

CLASS	TEST
II	DOC FF-1
II	DOC FF-1
II	DOC FF-1
II	DOC FF-1

NOTES:
1. IN OTHER THAN GROUP I-3 OCCUPANCIES IN BUILDINGS LESS THAN THREE STORIES ABOVE GRADE PLANE, CLASS B INTERIOR FINISH FOR NON-SPRINKLERED BUILDINGS AND CLASS C INTERIOR FINISH FOR SPRINKLERED BUILDINGS SHALL BE PERMITTED IN INTERIOR EXIT STAIRWAYS AND RAMPS.
2. REQUIREMENTS FOR ROOMS AND ENCLOSED SPACES SHALL BE BASED UPON SPACES ENCLOSED BY PARTITIONS. WHERE A FIRE-RESISTANCE RATING IS REQUIRED FOR STRUCTURAL ELEMENTS, THE ENCLOSING PARTITIONS SHALL EXTEND FROM THE FLOOR TO THE CEILING. PARTITIONS THAT DO NOT COMPLY WITH THIS SHALL BE CONSIDERED ENCLOSING SPACES AND THE ROOMS OR SPACES ON BOTH SIDES SHALL BE CONSIDERED ONE. IN DETERMINING THE APPLICABLE REQUIREMENTS FOR ROOMS AND ENCLOSED SPACES, THE SPECIFIC OCCUPANCY THEREOF SHALL BE THE GOVERNING FACTOR REGARDLESS OF THE GROUP CLASSIFICATION OF THE BUILDING OR STRUCTURE.

REFER TO CHAPTER 10 OF THE LSC WALL AND CEILING FINISHES FOR COMPLETE REQUIREMENTS FOR FINISHES

PLUMBING FIXTURE REQUIREMENTS

2021 INTERNATIONAL PLUMBING CODE WITH ARKANSAS AMENDMENTS

OCCUPANCY		WATER CLOSETS/URINALS				LAVATORIES				DRINKING FOUNTAIN
USE	LOAD	RATIO	MALE (50%)	FEMALE (50%)	SINGLE OCCUPANCY	RATIO	MALE (50%)	FEMALE (50%)	SINGLE OCCUPANCY	RATIO
BUSINESS (B)	12	1 PER 25 FIRST 50; THEN 1 PER 50 EXCEEDING 50	(6) 0.24 REQ	(6) 0.24 REQ	OCCUPANT LOADS OF 15 OR LESS CAN BE SERVED WITH ONE RESTROOM	1 PER 40 FIRST 80; THEN 1 PER 80 EXCEEDING 80	(6) 0.15 REQ	(6) 0.15 REQ	OCCUPANT LOADS OF 15 OR LESS CAN BE SERVED WITH ONE RESTROOM	1 PER 100 (0.12 REQ)
WAREHOUSE (S-1)	97	1 PER 100	(49) 0.49 REQ	(49) 0.49 REQ		1 PER 100	(49) 0.49 REQ	(49) 0.49 REQ		1 PER 1000 (0.10 REQ)
ASSEMBLY (A-2)	85	1 PER 75	(43) 0.58 REQ	(43) 0.58 REQ		1 PER 200	(43) 0.22 REQ	(43) 0.22 REQ		1 PER 500 (0.17 REQ)
SUBTOTALS	194		1.31	1.31			0.86	0.86		0.39
TOTAL REQUIRED			2	2	5 UNISEX		1	1	5 UNISEX	1
TOTAL PROVIDED			--	--			--	--		2

ACCESSIBLE TOILET STALL REQUIREMENTS

TOTAL STALLS PER ROOM PROVIDED:	ROOM #	QTY	ADA	DESCRIPTION
SINGLE USER RESTROOM	108	1	•	TOILET, ADA
		1		
SINGLE USER RESTROOM	109	1	•	TOILET, ADA
		1		
SINGLE USER RESTROOM	110	1	•	TOILET, ADA
		1		
SINGLE USER RESTROOM	111	1	•	TOILET, ADA
		1		
SINGLE USER RESTROOM	116	1	•	TOILET, ADA
		1		

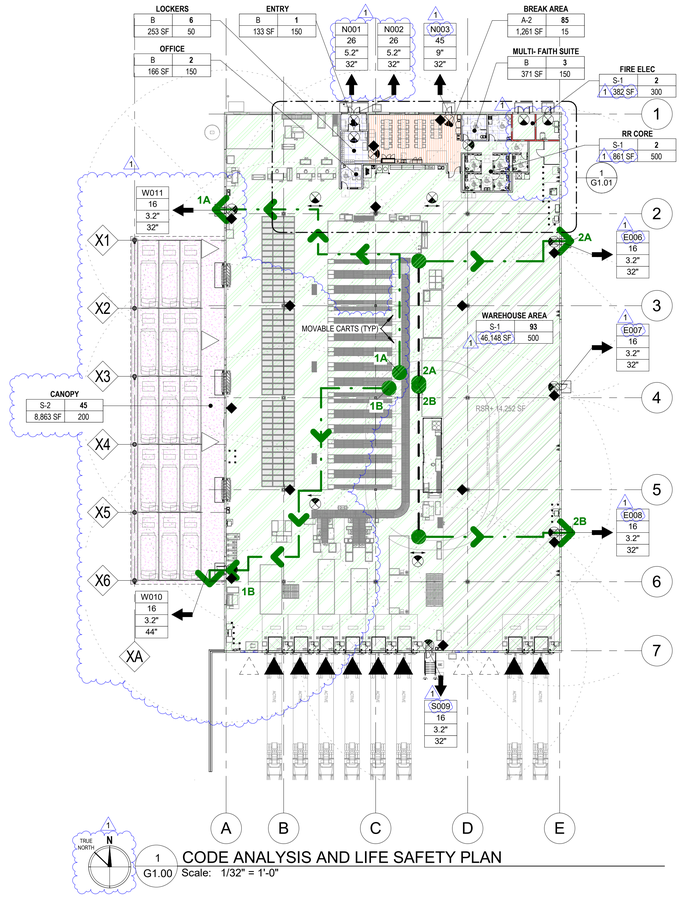
REQUIRED:
1 ACCESSIBLE STALL PER ROOM

LEGEND

- INTERIOR PARTITION, REFER TO SHEET A0.01
- 1-HR RATED PARTITION
- CONCRETE WALL PANEL
- A-2 OCCUPANCY
- B OCCUPANCY
- S-1 OCCUPANCY
- S-2 OCCUPANCY
- END OF COMMON PATH OF TRAVEL WHERE EXITING OPTIONS DIVERGE (SEE PATH OF TRAVEL DISTANCES TABLE THIS SHEET.)
- START POINT OF EXIT DISTANCE MEASUREMENT (SEE PATH OF TRAVEL DISTANCES TABLE THIS SHEET.)
- PRIMARY EXIT
  ALL EXIT DISCHARGE AT GRADE (OR HAVE DIRECT ACCESS TO GRADE)
- EXIT DIRECTION
- LOADING DOCK
- LOADING DOOR
- KNOCK-OUT
- EXIT SIGN
  ALL WAREHOUSE EGRESS DOORS TO RECEIVE (2) SIGNS: (1) HIGH & (1) LOW.
  SEE ELECTRICAL DRAWINGS FOR FURTHER INFORMATION AND ADDITIONAL SIGNS.
- OCCUPANCY LOAD SIGN.
  CONFIRM LOCATION, OCCUPANCY AND QUANTITY WITH AHJ.
- FIRE EXTINGUISHER LOCATION. SEE DETAIL SHEET G1.01
  PORTABLE FIRE EXTINGUISHER REQUIREMENTS SHALL BE DETERMINED BY FIRE DEPARTMENT FIELD INSPECTOR IN ACCORDANCE WITH FIRE CODE.
  SEE SIGNAGE STANDARDS FOR SIGNAGE REQUIREMENTS.
  75' MIN TRAVEL DISTANCE BETWEEN FIRE EXTINGUISHER LOCATIONS.

AREA NAME
USE | ### | AREA NAME
150 SF | FACTOR | OCCUPANT TYPE
NUMBER OF AREA OCCUPANTS
OCCUPANT LOAD FACTOR
AREA SQUARE FOOTAGE (GROSS UNO)

DOOR# | EXIT DESIGNATION
| NUMBER OF OCCUPANTS EXITING
##' | WIDTH REQUIRED
| WIDTH PROVIDED



1 G1.00 CODE ANALYSIS AND LIFE SAFETY PLAN
Scale: 1/32" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL / RM
Checked By:	GJB/JR/MB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
CODE ANALYSIS AND LIFE SAFETY PLAN

G1.00

LEGEND

- INTERIOR PARTITION, REFER TO SHEET A0.01
- 1-HR RATED PARTITION
- CONCRETE WALL PANEL
- A-2 OCCUPANCY
- A-3 OCCUPANCY
- B OCCUPANCY
- S-1 OCCUPANCY
- S-2 OCCUPANCY

AREA NAME
USE ### — AREA NAME, OCCUPANCY TYPE, NUMBER OF AREA OCCUPANTS
150 SF FACTOR — OCCUPANT LOAD FACTOR
AREA SQUARE FOOTAGE (GROSS UNO)

DOOR# — EXIT DESIGNATION
— NUMBER OF OCCUPANTS EXITING
##" — WIDTH REQUIRED
— WIDTH PROVIDED

END OF COMMON PATH OF TRAVEL WHERE EXITING OPTIONS DIVERGE
(SEE PATH OF TRAVEL DISTANCES TABLE THIS SHEET.)

START POINT OF EXIT DISTANCE MEASUREMENT
(SEE PATH OF TRAVEL DISTANCES TABLE THIS SHEET.)

PRIMARY EXIT
ALL EXIT DISCHARGE AT GRADE (OR HAVE DIRECT ACCESS TO GRADE)

EXIT DIRECTION

LOADING DOCK

LOADING DOOR

KNOCK-OUT

EXIT SIGN
ALL WAREHOUSE EGRESS DOORS TO RECEIVE (2) SIGNS: (1) HIGH & (1) LOW.
SEE ELECTRICAL DRAWINGS FOR FURTHER INFORMATION AND ADDITIONAL SIGNS.

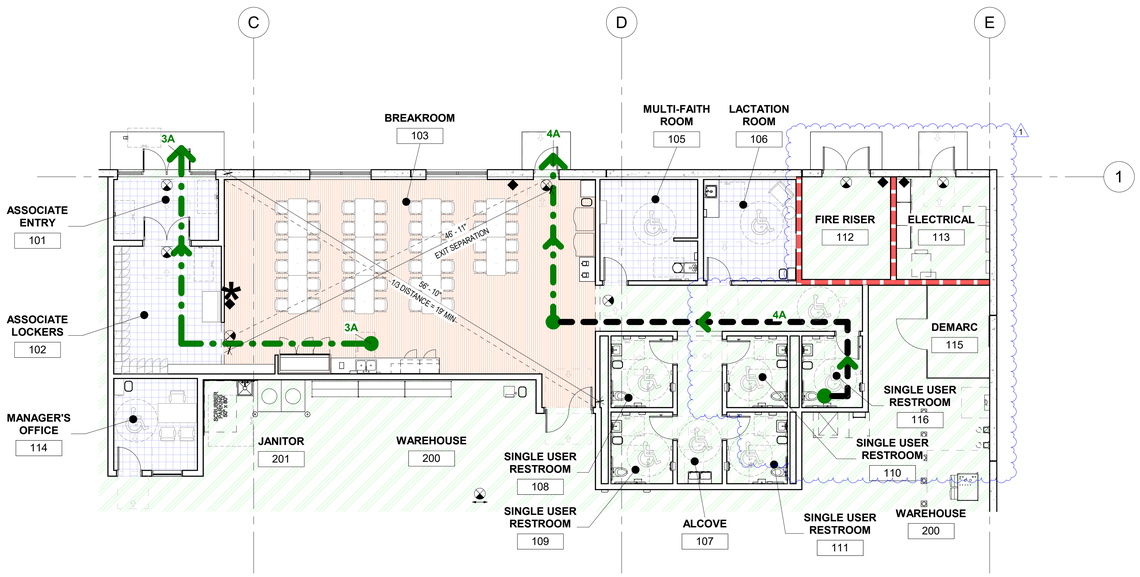
OCCUPANCY LOAD SIGN.
CONFIRM LOCATION, OCCUPANCY AND QUANTITY WITH AHJ.

FIRE EXTINGUISHER LOCATION. SEE DETAIL SHEET G1.01
PORTABLE FIRE EXTINGUISHER REQUIREMENTS SHALL BE DETERMINED BY FIRE DEPARTMENT FIELD INSPECTOR IN ACCORDANCE WITH FIRE CODE.
SEE SIGNAGE STANDARDS FOR SIGNAGE REQUIREMENTS.

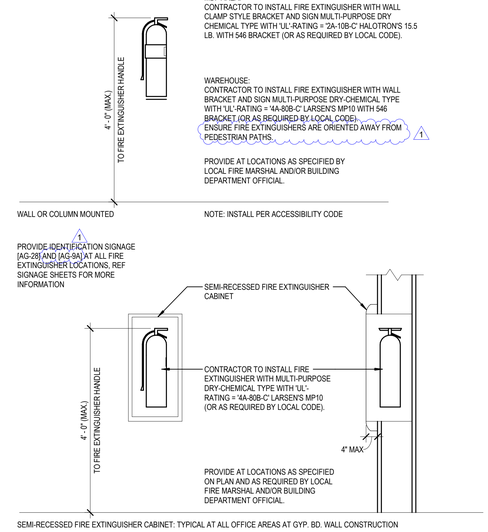
PATH OF TRAVEL DISTANCES

BUILDING USE GROUP PATH OF TRAVEL DISTANCES (FIRST FLOOR)

	EGRESS TRAVEL DISTANCE		COMMON PATH OF TRAVEL DISTANCE		
PATH ID	ACTUAL	ALLOWABLE	ACTUAL	ALLOWABLE	USE GROUP
3A	50' - 3"	250' - 0"	0"	75' - 0"	B, A2
4A	72' - 9" /1	250' - 0"	51' - 1" /1	75' - 0"	B, A2



1 G1.01 CODE ANALYSIS AND LIFE SAFETY PLAN
Scale: 1/8" = 1'-0"



2 G1.01 FIRE EXTINGUISHER MOUNTING DETAIL
Scale: 3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

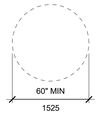
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/JR/MB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OFFICE CORE LIFE SAFETY PLAN

G1.01



SECTION 304.3.1 CIRCULAR SPACE - NEW BUILDINGS

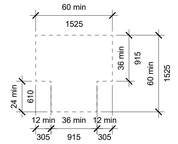


FIGURE 304.3.2 T-SHAPED TURNING SPACE - NEW BUILDINGS

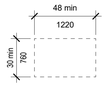
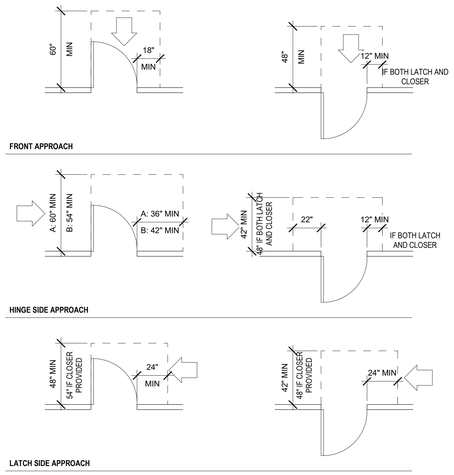


FIGURE 305.3 SIZE OF CLEAR FLOOR SPACE - NEW BUILDINGS

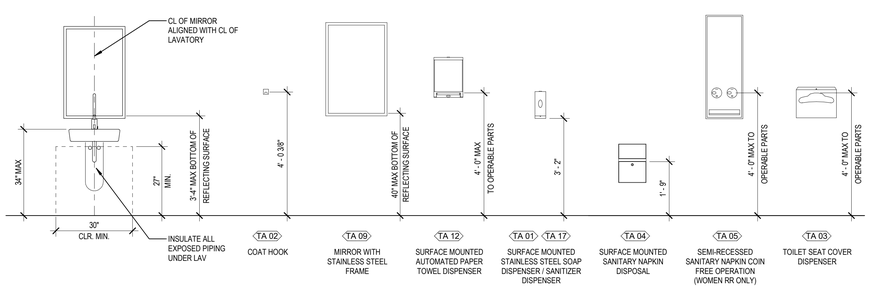
4 G1.02 2010 ADA FLOOR CLEARANCES

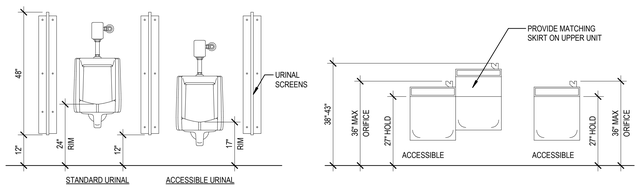
Scale: 1/4" = 1'-0"

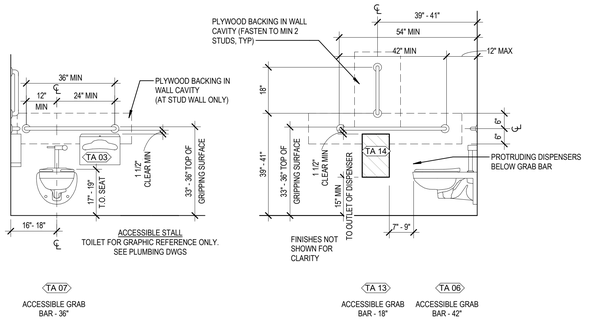


1 G1.02 ACCESSIBLE DOOR CLEARANCES

Scale: 1/4" = 1'-0"

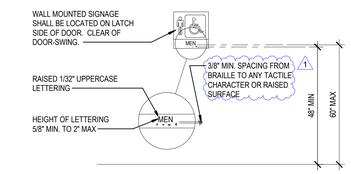


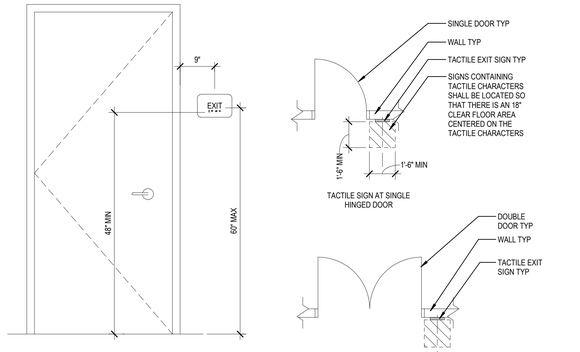




2 G1.02 TYPICAL FIXTURE ELEVATIONS AND CLEARANCES 1

Scale: 1/2" = 1'-0"





3 G1.02 TACTILE SIGN REQUIREMENTS 1

Scale: 3/4" = 1'-0"

2010 ADA STANDARDS NOTES

1. THIS PROJECT MUST COMPLY WITH THE REQUIREMENTS OF THE 2010 ADA STANDARDS.

2. THE JURISDICTIONS HAVING AUTHORITY WILL NOT REVIEW THE PROJECT DOCUMENTS OR CONSTRUCTION FOR CONFORMANCE WITH THE 2010 ADA STANDARDS. COMPLIANCE WITH THE ACCESSIBILITY CODE IS THE RESPONSIBILITY OF THE ENTIRE PROJECT TEAM. IT IS THE CONTRACTOR'S RESPONSIBILITY TO CONFIRM COMPLIANCE PRIOR TO INSTALLATION OF FINISHED PRODUCTS. IF THERE ARE QUESTIONS REGARDING COMPLIANCE: DO NOT PROCEED WITH THE WORK, REQUEST CLARIFICATION FROM THE ARCHITECT AND AFTER RECEIPT OF RESPONSE, WORK MAY COMMENCE.

3. CHANGES IN LEVEL ON ACCESSIBLE ROUTES. CHANGES IN LEVEL OF 1/4 INCH HIGH MAXIMUM SHALL BE PERMITTED TO BE VERTICAL. (SECTION 303.2) CHANGES IN LEVEL 1/4 INCH HIGH MINIMUM AND 1/2 INCH HIGH MAXIMUM SHALL BE BEVELED WITH A SLOPE NOT STEEPER THAN 1:2. (SECTION 303.3) CHANGES IN LEVEL GREATER THAN 1/2 INCH HIGH SHALL BE RAMPED AND SHALL COMPLY WITH SECTION 405 OR 406. (SECTION 303.4)

4. DOOR HARDWARE ON ACCESSIBLE DOORS. HANDLES, PULLS, LATCHES, LOCKS, AND OTHER OPERABLE PARTS ON ACCESSIBLE DOORS SHALL HAVE A SHAPE THAT IS EASY TO GRASP WITH ONE HAND AND DOES NOT REQUIRE TIGHT GRASPING, PINCHING, OR TWISTING OF THE WRIST TO OPERATE. OPERABLE PARTS OF SUCH HARDWARE SHALL BE 34 INCHES MINIMUM AND 48 INCHES MAXIMUM ABOVE THE FINISHED FLOOR OR GROUND. (SECTION 404.2.6). OPERABLE PARTS OF CONSTRUCTION ELEMENTS SHALL BE OPERABLE WITH ONE HAND AND SHALL NOT REQUIRE TIGHT GRASPING, PINCHING, OR TWISTING OF THE WRIST. THE FORCE REQUIRED TO ACTIVATE OPERABLE PARTS SHALL BE 5 POUNDS MAXIMUM. (SECTION 309.4)

5. DOOR CLOSERS ON ACCESSIBLE DOORS. DOOR CLOSERS SHALL BE ADJUSTED SO THAT FROM AN OPEN POSITION OF 90 DEGREES, THE TIME REQUIRED TO MOVE THE DOOR TO AN OPEN POSITION OF 12 DEGREES SHALL BE 5 SECONDS MINIMUM. (SECTION 404.2.8.1)

6. DOOR SURFACE OF ACCESSIBLE DOORS. DOOR SURFACES WITHIN 10 INCHES OF THE FINISHED FLOOR OR GROUND, MEASURED VERTICALLY, SHALL BE A SMOOTH SURFACE ON THE PUSH SIDE EXTENDING THE FULL WIDTH OF THE DOOR. PARTS CREATING HORIZONTAL OR VERTICAL JOINTS IN SUCH SURFACE SHALL BE WITHIN 1/16 INCH OF THE SAME PLANE AS THE OTHER. CAVITIES CREATED BY ADDED KICK PLATES SHALL BE CAPPED. (SECTION 404.2.10)

7. VISION LITES IN ACCESSIBLE DOORS. DOORS AND SIDELITES ADJACENT TO DOORS CONTAINING ONE OR MORE GLAZING PANELS THAT PERMIT VIEWING THROUGH THE PANELS SHALL HAVE THE BOTTOM OF AT LEAST ONE GLAZED PANEL LOCATED 43 INCHES MAXIMUM ABOVE THE FLOOR. (SECTION 404.2.11)

8. EXPOSED PIPES AND SURFACES AT ACCESSIBLE SINKS. WATER SUPPLY AND DRAINPIPES UNDER LAVATORIES AND SINKS SHALL BE INSULATED OR OTHERWISE CONFIGURED TO PROTECT AGAINST CONTACT. THERE SHALL BE NO SHARP OR ABRASIVE SURFACES UNDER LAVATORIES AND SINKS. (SECTION 606.5)

9. GRAB BAR CROSS SECTION. GRAB BARS WITH A CIRCULAR CROSS SECTION SHALL HAVE AN OUTSIDE DIAMETER OF 1-1/4 INCH MINIMUM AND 2 INCHES MAXIMUM. (SECTION 609.2.1) GRAB BARS WITH A NONCIRCULAR CROSS SECTION SHALL HAVE A CROSS SECTION DIMENSION OF 2 INCHES MAXIMUM, AND A PERIMETER DIMENSION OF 4 INCHES MINIMUM AND 4.8 INCHES MAXIMUM. (SECTION 609.2.2)

10. GRAB BAR SPACING. THE SPACE BETWEEN THE WALL AND THE GRAB BAR SHALL BE 1-1/2 INCHES. THE SPACE BETWEEN THE GRAB BAR AND PROJECTING OBJECTS BELOW AND AT THE ENDS OF THE GRAB BAR SHALL BE 1-1/2 INCHES MINIMUM. THE SPACE BETWEEN THE GRAB BAR AND PROJECTING OBJECTS ABOVE THE GRAB BAR SHALL BE 12 INCHES MINIMUM. (SECTION 609.3)

11. GRAB BAR STRUCTURAL STRENGTH. ALLOWABLE STRESSES SHALL NOT BE EXCEEDED FOR MATERIALS USED WHERE A VERTICAL OR HORIZONTAL FORCE OF 250 POUNDS IS APPLIED AT ANY POINT ON THE GRAB BAR, FASTENER, MOUNTING DEVICE, OR SUPPORTING STRUCTURE. (SECTION 609.8)

12. PARALLEL APPROACH TO COUNTER. A PORTION OF THE COUNTER SURFACE THAT IS 36 INCHES LONG MINIMUM AND 36 INCHES HIGH MAXIMUM ABOVE THE FINISHED FLOOR SHALL BE PROVIDED. WHERE THE COUNTER SURFACE IS LESS THAN 36 INCHES LONG, THE ENTIRE COUNTER SURFACE SHALL BE 36 INCHES HIGH MAXIMUM. ABOVE THE FINISHED FLOOR. A CLEAR FLOOR SPACE COMPLYING WITH SECTION 305 SHALL BE POSITIONED FOR A PARALLEL APPROACH ADJACENT TO THE 36 INCH MINIMUM LENGTH OF COUNTER. (SECTION 904.4.1)

FORWARD APPROACH TO COUNTER. A PORTION OF THE COUNTER SURFACE THAT IS 30 INCHES LONG MINIMUM AND 36 INCHES HIGH MAXIMUM SHALL BE PROVIDED. A CLEAR FLOOR SPACE COMPLYING WITH SECTION 305 SHALL BE POSITIONED FOR A FORWARD APPROACH TO THE ACCESSIBLE COUNTER. KNEE AND TOE CLEARANCE COMPLYING WITH SECTION 306 SHALL BE PROVIDED UNDER THE ACCESSIBLE COUNTER. (SECTION 904.4.2)

13. CARPET. CARPET OR CARPET TILE SHALL BE SECURELY ATTACHED AND SHALL HAVE A FIRM CUSHION, PAD OR BACKING OR NO CUSHION OR PAD. CARPET OR CARPET TILE SHALL HAVE A LEVEL LOOP, TEXTURED LOOP, LEVEL CUT PILE, OR LEVEL CUT/UNCUT PILE TEXTURE. PILE HEIGHT SHALL BE 1/2" MAXIMUM. EXPOSED EDGES OF CARPET SHALL BE FASTENED TO THE FLOOR OR GROUND SURFACES AND SHALL HAVE TRIM ALONG THE ENTIRE LENGTH OF THE EXPOSED EDGE. CARPET EDGE TRIM SHALL COMPLY WITH SECTION 303. (SECTION 302.2)

14. ACCESSIBLE DOORS SHALL MEET ALL OF THE APPLICABLE REQUIREMENTS OF SECTION 404 FOR DOOR MANEUVERING SPACE, DOOR HARDWARE, DOOR CLOSERS AND DOOR OPENING FORCE.

TACTILE SIGN REQUIREMENTS - NOTES

1. THE INTERNATIONAL SYMBOL OF ACCESSIBILITY SHALL BE THE STANDARD USED TO IDENTIFY FACILITIES THAT ARE ACCESSIBLE TO AND USABLE BY PHYSICALLY DISABLED PERSONS AS SET FORTH IN THE ACCESSIBILITY CODE NOTED ON THE CODE ANALYSIS SHEET AND AS SPECIFICALLY REQUIRED IN THIS SECTION.

2. REQUIRED ACCESSIBLE ELEMENTS SHALL BE IDENTIFIED BY THE INTERNATIONAL SYMBOL OF ACCESSIBILITY AT THE FOLLOWING LOCATIONS:

   A. ACCESSIBLE ENTRANCES WHERE NOT ALL ENTRANCES ARE ACCESSIBLE. A TACTILE SIGN STATING "EXIT" AND COMPLYING WITH THE ACCESSIBILITY CODE NOTED ON THE COVER SHEET SHALL BE PROVIDED ADJACENT TO EACH DOOR TO AN EXIT PASSAGEWAY AND THE EXIT DISCHARGE. REF DOOR SCHEDULE FOR LOCATIONS.
   B. ACCESSIBLE ROOMS WHERE MULTIPLE SINGLE-USER TOILETS ARE CLUSTERED AT A SINGLE LOCATION.
   C. UNISEX TOILET AND BATHING ROOMS.
   D. DIRECTIONAL SIGNAGE INDICATING THE ROUTE TO THE NEAREST LIKE ACCESSIBLE ELEMENT SHALL BE PROVIDED AT EACH SEPARATE -SEX TOILET INDICATING THE LOCATION OF THE NEAREST UNISEX TOILET.

3. CHARACTERS SHALL CONFORM TO THE FOLLOWING:

   A. CHARACTERS, SYMBOLS AND PICTOGRAMS SHALL CONTRAST THEIR FIELDS AND HAVE A NON-GLARE FINISH. CONTRAST CAN BE ACHIEVED WITH EITHER A LIGHT PICTOGRAM ON A DARK FIELD OR A DARK PICTOGRAM ON A LIGHT FIELD.
   B. WHEN PERMANENT IDENTIFICATION IS PROVIDED FOR ROOMS AND SPACES, RAISED LETTERS SHALL BE ACCOMPANIED BY BRAILLE.
   C. LETTERS AND NUMBERS ON SIGNS SHALL BE RAISED 1/32" MINIMUM AND SHALL BE SANS-SERIF UPPERCASE CHARACTERS ACCOMPANIED BY GRADE 2 BRAILLE
   D. CONTRACTED GRADE 2 BRAILLE SHALL BE USED. DOTS SHALL BE 0.090" (2.3 MM) TO 0.100" (2.5 MM) ON CENTER IN EACH CELL WITH 0.241" (6.1 MM) TO 0.300" (7.6 MM) SPACE BETWEEN CELLS. DOTS SHALL BE RAISED A MINIMUM OF 0.025" (0.6 MM) TO 0.037" (0.9 MM) ABOVE THE BACKGROUND.
   E. FOR CHARACTER SIZE, THE UPPERCASE LETTER "O" SHALL BE USED TO DETERMINE THE ALLOWABLE WIDTH OF ALL CHARACTERS OF A FONT. THE WIDTH OF THE UPPERCASE LETTER "O" OF THE FONT SHALL BE 60 PERCENT MINIMUM AND 110 PERCENT MAXIMUM OF THE HEIGHT OF THE UPPERCASE "I" OF THE FONT. CHARACTER HEIGHT MEASURED FROM THE BASELINE OF THE CHARACTER SHALL BE 5/8" (16 MM) MINIMUM AND 2 INCHES (51 MM) MAXIMUM BASED ON THE HEIGHT OF THE UPPERCASE LETTER "I".
   F. PICTORIAL SYMBOL SIGNS (PICTOGRAMS) SHALL BE ACCOMPANIED BY THE EQUIVALENT VERBAL DESCRIPTION PLACED DIRECTLY BELOW THE PICTOGRAM. THE BORDER DIMENSION OF THE PICTOGRAM SHALL BE A MINIMUM OF 6" IN HEIGHT

4. SIGNS SHALL BE INSTALLED ON THE WALL ADJACENT TO THE LATCH SIDE OF THE DOOR. WHERE THERE IS NO WALL SPACE ON THE LATCH SIDE OF SINGLE DOORS, SIGNS SHOULD BE PLACED ON THE NEAREST WALL ADJACENT TO THE LATCH SIDE. WHERE THERE IS NO WALL SPACE ON THE LATCH SIDE OF DOUBLE DOORS, SIGNS SHALL BE PLACED ON THE NEAREST WALL ADJACENT TO THE RIGHT SIDE. WHERE A TACTILE SIGN IS PROVIDED AT A DOOR, THE SIGN SHALL BE LOCATED ALONGSIDE THE DOOR AT THE LATCH SIDE. WHERE A TACTILE SIGN IS PROVIDED AT DOUBLE DOORS WITH ONE ACTIVE LEAF, THE SIGN SHALL BE LOCATED ON THE INACTIVE LEAF. WHERE A TACTILE SIGN IS PROVIDED AT DOUBLE DOORS WITH TWO ACTIVE LEAFS, THE SIGN SHALL BE LOCATED TO THE RIGHT OF THE RIGHT HAND DOOR. WHERE THERE IS NO WALL SPACE AT THE LATCH SIDE OF A SINGLE DOOR OR AT THE RIGHT SIDE OF DOUBLE DOORS, SIGNS SHALL BE LOCATED ON THE NEAREST ADJACENT WALL. SIGNS CONTAINING TACTILE CHARACTERS SHALL BE LOCATED SO THAT A CLEAR FLOOR SPACE OF 18 INCHES (455 MM) MINIMUM BY 18 INCHES (455 MM) MINIMUM, CENTERED ON THE TACTILE CHARACTERS, IS PROVIDED BEYOND THE ARC OF ANY DOOR SWING BETWEEN THE CLOSED POSITION AND 45 DEGREE OPEN POSITION. EXCEPTION: SIGNS WITH TACTILE CHARACTERS SHALL BE PERMITTED ON THE PUSH SIDE OF DOORS WITH CLOSERS AND WITHOUT HOLD-OPEN DEVICES.

5. MOUNTING HEIGHT SHALL BE LOCATED 48 INCHES (1220 MM) MINIMUM ABOVE THE FINISH FLOOR OR GROUND SURFACE, MEASURED FROM THE BASE OF THE LOWEST BRAILLE CELLS AND 60 INCHES (1525 MM) MAXIMUM ABOVE THE FINISH FLOOR OR GROUND SURFACE, MEASURED FROM THE BASELINE OF THE HIGHEST TACTILE CHARACTER.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

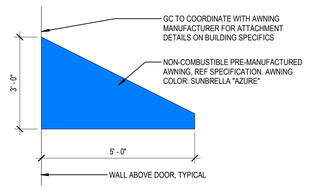
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/MB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
2010 ACCESSIBILITY STANDARDS

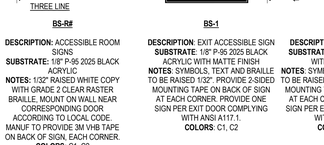
G1.02



5 FABRIC AWNING
G1.10 Scale: 1/2" = 1'-0"

REFERENCE DETAIL
2
AS.05.03
AG-40

CLEAR ZONE AT ROLL-UP DOORS.



AG-14

DESCRIPTION: DOCK EDGE SAFETY STRIPE
SUBSTRATE: PRIMED STEEL DOCK EDGE
NOTES: EXTERIOR GRADE PAINT, PAINT STEEL EDGE OF DOCK SAFETY YELLOW. TYPICAL AT ALL DOCK LOCATIONS.
COLORS: PT-3

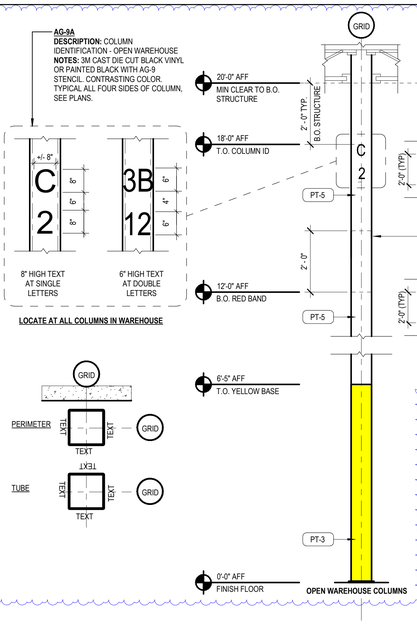
AG-XX

FIRE EXIT STRIPING
RED PAINTED (PT-4) 12" STRIPING OUTLINE AND HATCH FILL TYPICAL AT ALL FIRE EXIT DOORS.

4 FLOOR STRIPING
G1.10 Scale: 1/4" = 1'-0"

AG-9A
DESCRIPTION: COLUMN IDENTIFICATION - OPEN WAREHOUSE
NOTES: 3M CAST DIE CUT BLACK VINYL OR PAINTED BLACK WITH AG-9 STENCIL. CONTRASTING COLOR. TYPICAL ALL FOUR SIDES OF COLUMN, SEE PLANS.

LOCATE AT ALL COLUMNS IN WAREHOUSE



NOTE: HEIGHT FOR COLUMN ID AND RED BAND STRIPING TO BE SET BY LOWEST BOTTOM OF STRUCTURE AND HEIGHT CONSISTENTLY MAINTAINED ON ALL COLUMNS. DETAIL BELOW OCCURS AND LOW SIDE OF BUILDING.

NOTE: PROVIDE COLUMN IDENTIFICATION NUMBERS AT BUILDING COLUMNS ONLY (TYP. ENTIRE BUILDING). ENTIRE COLUMN PAINTED WHITE ON ALL FOUR SIDES PRIOR TO INSTALLED SIGNAGE.

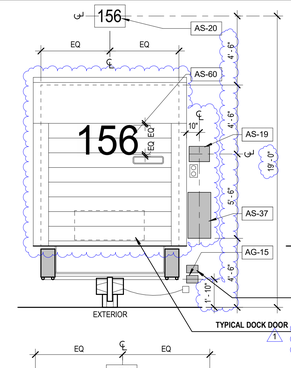
24" HIGH, PAINTED PT-4 BAND, TYPICAL AROUND ALL FOUR (4) COLUMN SIDES. **PROVIDE ONLY AT FIRE EXTINGUISHER LOCATIONS.**

NOTE: WHEN LOCATION HAS BOTH A FIRE EXTINGUISHER AND A WATER COOLER, THE 24" HIGH PAINTED BANDS SHALL BE STACKED WITH THE RED BAND LOCATED ON THE TOP.

24" HIGH PAINTED MUSTER BLUE BAND, TYPICAL AROUND ALL FOUR COLUMN SIDES. **PROVIDE ONLY AT WATER COOLER LOCATIONS.**

OPEN WAREHOUSE COLUMNS

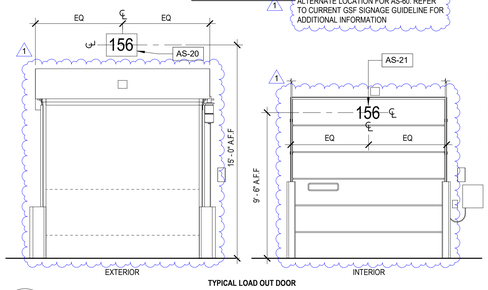
6 COLUMN ID DETAIL
G1.10 Scale: 1/2" = 1'-0"



NOTE: VISION PANEL SHOWN SCHEMATICALLY

DOCK LOCK INDICATOR SIGNAGE TO BE PROVIDED AND INSTALLED BY DOCK EQUIPMENT INSTALLER.

ALTERNATE LOCATION FOR AS-60. REFER TO CURRENT GSF SIGNAGE GUIDELINE FOR ADDITIONAL INFORMATION



7 DOOR SIGNAGE PLACEMENT DETAILS
G1.10 Scale: 1/4" = 1'-0"

SAFETY COLOR LEGEND

COLOR NAME	COLOR	GLOSS VINYL	REFLECTIVE VINYL	PAINT
SAFETY RED		PMS 186C		(PT-4)
SAFETY ORANGE		PMS 151C		
SAFETY YELLOW		PMS 109C		(PT-3)
SAFETY GREEN		PMS 335C		

VINYL GRAPHICS GENERAL NOTES

DOOR SIGNS:
REFER TO DOOR SIGN PLACEMENT DETAIL ON THIS SHEET FOR MOUNTING HEIGHTS.

DESCRIPTION: CUSTOM CUT VINYL GRAPHICS, ATTACHED TO FIRST SURFACE OF EXTERIOR GLASS

GRAPHICS AND TYPOGRAPHY:
SIGN GRAPHICS ARE HEAVY DUTY '3M' VINYL. LOGO IS A HIGH RESOLUTION DIGITAL PRINT ON PERMANENT ADHESIVE PRESSURE SENSITIVE VINYL SUBSTRATE WITH LUSTER OVER LAMINATE, CUT TO SHAPE FROM VECTOR FILE. COPY IS MATTE WHITE VINYL.

INSTALLATION:
LOCATIONS ARE GENERALLY NOTED ON THE ATTACHED LOCATION PLANS. THE CONTRACTOR IS RESPONSIBLE FOR FIELD VERIFYING ALL INSTALLATION CONDITIONS PRIOR TO FABRICATION. THE INSTALLATION METHODS AND DETAILS FOR EACH LOCATION SHALL BE ILLUSTRATED IN THE SUBMITTED SHOP DRAWINGS. FINAL LOCATION WILL BE APPROVED ON SITE BY THE TENANT REPRESENTATIVE.

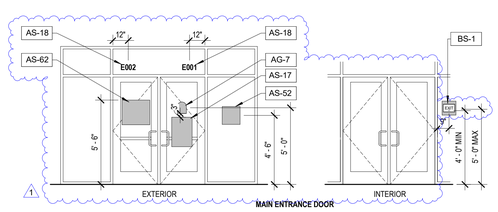
SUBMITTALS:
SHOP DRAWINGS SHALL BE SUBMITTED FOR APPROVAL PRIOR TO FABRICATION.

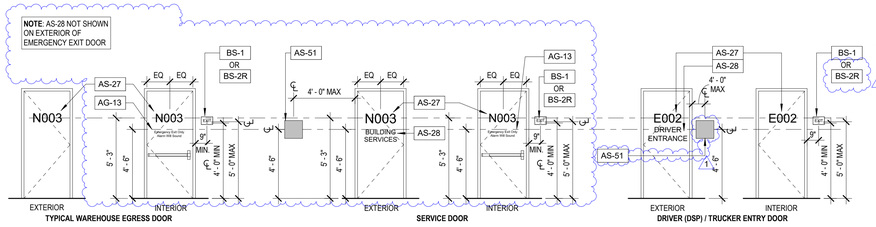
SIGNAGE COLOR LEGEND

COLOR NAME	COLOR	GLOSS VINYL	REFLECTIVE VINYL	PAINT
C1 WHITE		SCOTCHCAL WHITE 230-20	SCOTCHCAL 280-WHITE 280-10	GLOSS WHITE TWO PART CATALYST HARDENED ACRYLIC ENAMEL
C2 BLACK		SCOTCHCAL BLACK 230-22 (PANTONE BLACK)	SCOTCHCAL BLACK 280-85	
C2b DARK SQUID INK		PANTONE 4146 C NEX #0F141A RGB: 15,20,26 CMYK: 97,70,0,85		ACRYLIC PUSH-THRU GRAPHICS, W/OPAQUE SQUID INK
C3 SMILE		PANTONE 1585 C		
C4 GRAY		SCOTCHCAL MEDIUM GRAY 230-31		SATIN FINISH TWO PART CATALYST HARDENED ACRYLIC ENAMEL
C5 RED		SCOTCHCAL RED 230-33 (PANTONE 485C)		
C6 BLUE		SCOTCHCAL COBALT BLUE (PANTONE 288C)	SCOTCHCAL BLUE 230-75	
C7 TENANT BLUE		PANTONE 2172 C NEX #0578FF RGB: 5,120,255 CMYK: 88,45,0,0		
C8 ACCESSIBLE BLUE		SCOTCHCAL ACCESSIBLE BLUE (PANTONE 293C)		
C9 GREEN		GREEN (PANTONE 348C)		
C10 MUSTER BLUE		MUSTER BLUE (PANTONE 300C)		
C11 ORANGE		ORANGE (PANTONE 165C)		
C12 PURPLE		PURPLE (PANTONE 267C)		
C13 MUSTER RED		MUSTER RED (PANTONE 185C)		
C14 MUSTER YELLOW		MUSTER YELLOW (PANTONE 116C)		
C15 LAND ON BLUE				SHERWIN WILLIAMS - CUSTOM CCE * COLORANT DZ 32 64 128 L1-BLUE 24 32 - -

SIGNAGE GENERAL NOTES

1. REFER TO SEPARATE CIVIL DRAWINGS FOR EXTERIOR SIGNAGE AND PAVEMENT MARKINGS.
2. FINAL QUANTITIES OF SIGNAGE SHALL BE COORDINATED AND VERIFIED IN FIELD.
3. ADDITIONAL SIGNAGE NOT SHOWN ON GRAPHICS PLAN MAY BE REQUIRED PER LOCAL CODE AND/OR AHJ. SUB-CONTRACTOR SHALL COORDINATE WITH LOCAL AHJ AND PROVIDE AS REQUIRED.
4. MOUNT SIGNAGE ACCORDING TO LOCAL CODES.
5. TYPICAL SIGN FONT IS SET IN TENANT'S EMBER MODERN DISPLAY STANDARD.
6. ALL TEXT AND GRAPHICS SHALL BE WHITE IF THEY ARE TO BE PLACED ON A RED BACKGROUND.
7. UNLESS NOTED OTHERWISE, ALL SIGNAGE AND GRAPHICS ARE TO BE PROVIDED AND INSTALLED BY G.C.
8. ALL PERMANENT SIGNAGE TO ACCESSIBLE AREAS TO HAVE RAISED BRAILLE CHARACTERS PER ACCESSIBILITY CODE.
9. REFER TO DOOR SCHEDULE FOR DOOR SIGNAGE REQUIRED TEXT.
10. ALL SIGNS ARE SHOWN FOR REFERENCE ONLY. REFER TO MOST CURRENT GSF SIGNAGE GUIDELINE FOR FULL SIGNAGE PACKAGE AND CRITERIA.
11. REFER TO SPECS FOR FLOOR MARKINGS REQUIRED AT ELECTRICAL EQUIPMENT.





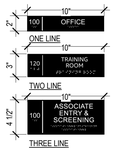
3 SIGNS - DOOR SIGN PLACEMENT DETAILS
G1.10 Scale: 1/4" = 1'-0"

PICTORIAL ACCESSIBILITY SIGN DIRECTLY ABOVE (WHERE OCCURS)



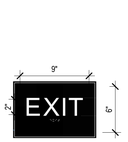
BS-R#4

NOTE: IN LOCATIONS WHERE ACCESSIBLE PICTORIAL SIGN IS SPECIFIED, NO ADDITIONAL NAME PLATE SIGNAGE IS NEEDED. FOR THESE ROOMS, SUPPLY A 2" X 6" ROOM NUMBER SIGN, WHICH WILL ABUT TO THE BOTTOM OF THE ACCESSIBILITY SIGN, MAKING IT APPEAR TO BE A SINGLE SIGN



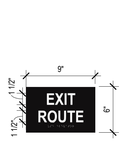
BS-R#

DESCRIPTION: ACCESSIBLE ROOM SIGNS
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC
NOTES: 1/32" RAISED WHITE COPY WITH GRADE 2 CLEAR RASTER BRAILLE, MOUNT ON WALL NEAR CORRESPONDING DOOR ACCORDING TO LOCAL CODE. MANUF TO PROVIDE 3M VHB TAPE ON BACK OF SIGN, EACH CORNER.
COLORS: C1, C2



BS-1

DESCRIPTION: EXIT ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. PROVIDE ONE SIGN PER EXIT DOOR COMPLYING WITH ANSI A117.1.
COLORS: C1, C2



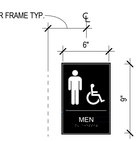
BS-1R

DESCRIPTION: EXIT ROUTE SIGN
SUBSTRATE: 1/8" BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. PROVIDE ONE SIGN PER EXIT ROUTE COMPLYING WITH ANSI A117.1.
COLORS: C1, C2



BS-2R

DESCRIPTION: EXIT ROUTE SIGN
SUBSTRATE: 1/8" BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. PROVIDE ONE SIGN PER EXIT ROUTE COMPLYING WITH ANSI A117.1.
COLORS: C1, C2



BS-2M

DESCRIPTION: MENS TOILET ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL AT ALL MEN'S TOILET ROOMS.
COLORS: C1, C2



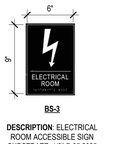
BS-2

DESCRIPTION: ALL INCLUSIVE RESTROOM ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL AT ALL INCLUSIVE TOILET ROOMS.
COLORS: C1, C2



BS-2W

DESCRIPTION: WOMEN'S TOILET ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BRAILLE ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL AT ALL WOMEN'S TOILET ROOMS.
COLORS: C1, C2



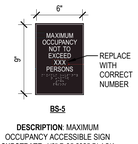
BS-3

DESCRIPTION: ELECTRICAL ROOM ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BRAILLE ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL AT ALL ELECTRICAL ROOMS.
COLORS: C1, C2



BS-4

DESCRIPTION: JANITOR'S CLOSET ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BRAILLE ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL AT ALL JANITOR'S CLOSET.
COLORS: C1, C2



BS-5

DESCRIPTION: MAXIMUM OCCUPANCY ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL WHERE REQUIRED ON FLOOR PLANS PER LOCAL CODE. REFER TO OCCUPANCY SCHEDULE ON SHEET G021 FOR MAXIMUM OCCUPANCY NUMBER.
COLORS: C1, C2



BS-8

DESCRIPTION: DRINKING FOUNTAIN ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: SYMBOLS, TEXT AND BRAILLE TO BE RAISED 1/32". PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. TYPICAL WHERE REQUIRED ON FLOOR PLANS PER LOCAL CODE.
COLORS: C1, C2



BS-10

DESCRIPTION: ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 BLACK ACRYLIC WITH MATTE FINISH
NOTES: MOUNT ON WALL NEAR CORRESPONDING DOOR ACCORDING TO LOCAL CODE. MANUF TO PROVIDE 3M VHB TAPE ON BACK OF SIGN, EACH CORNER. USE AS REQUIRED IF NO OTHER ACCESSIBLE SIGN IS REQUIRED.
COLORS: C1, C2



AS-17

DESCRIPTION: WELCOME VISITORS
SUBSTRATE: OPTICALLY CLEAR VINYL WITH GLOSS LAMINATE
NOTES: GRAY BACKGROUND REPRESENTS GLASS. CLEAR DECAL WITH PRINTED GRAPHICS & GLOSS LAMINATE. APPLY 1ST SURFACE TO GLASS.



AS-18

DESCRIPTION: GLASS ENTRY DOOR NUMBER VINYL
INSTALLATION: MOUNTED TO 1ST SURFACE OF GLASS, EXTERIOR FACING ONLY. USE BLACK BACKGROUND, EXTENDING 1" BEYOND TEXT, IF AHJ REQUIRES NUMBER SON BOTH SIDES OF GLASS.



AS-19

DESCRIPTION: MIRRORED DOCK DOOR NUMBER PANEL
SUBSTRATE: 1/8" ACM PANEL PRE-FINISHED WHITE -OR- 060" PRE-FINISHED WHITE ALUM.
INSTALLATION: MOUNTED WITH GALVANIZED STEEL LAG SCREWS / TO BE FIELD VERIFIED PER SITE.



AS-20

DESCRIPTION: DOCK DOOR/TRAILER PARKING NUMBER PANEL
SUBSTRATE: 1/8" ACM PANEL PRE-FINISHED WHITE -OR- 060" PRE-FINISHED WHITE ALUM.
INSTALLATION: MOUNTED WITH GALVANIZED STEEL LAG SCREWS / TO BE FIELD VERIFIED PER SITE.
NOTES: MOUNT CENTERED ABOVE DOORS/KNOCKOUT PANELS.



AS-21

DESCRIPTION: INTERIOR DOCK DOOR NUMBER VINYL
INSTALLATION: MOUNTED 1ST SURFACE TO DOCK DOORS
NOTES: TYPICAL AT TOP OF ALL DOCK DOORS ON INTERIOR SIDE



AS-27

DESCRIPTION: EXTERIOR HOLLOW METAL DOOR NUMBER VINYL
NOTES: MOUNTED TO 1ST SURFACE TO ALL HOLLOW METAL EGRESS AND SERVICE DOORS. NUMBERS ARE TO BE MOUNTED TO INSIDE AND OUTSIDE OF DOOR.



AS-28

DESCRIPTION: BUILDING SERVICES DOOR NAME VINYL
NOTES: MOUNTED TO 1ST SURFACE TO ALL HOLLOW METAL SERVICE DOORS. DOOR NAMES NOTES ON SIGNAGE PLAN(S). DOOR NAMES SHALL BE MOUNTED ON OUTSIDE OF DOOR.

AS-37

DESCRIPTION: DOCK LOCK SIGN
SUBSTRATE: 1/8" PRE-FINISHED WHITE ALUM.
NOTES: TYPICAL AT ALL DOCK POSITIONS, DRIVERS SIDE OF DOCK DOORS. MOUNT DIRECTLY TO EXTERIOR BUILDING FACADE.



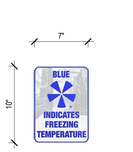
AS-51

DESCRIPTION: NO WEAPONS SIGN PANEL HOLLOW METAL DOOR
SUBSTRATE: 1/8" DI-BOND PREFINISHED WHITE
NOTES: MUST BE POSTED AT 5'-0" FROM BOTTOM OF ENTRANCE DOOR. MUST BE POSTED WITHIN 300' OF THE AREA CLOSED TO THE PUBLIC. MUST NOT BE MORE THAN 4'-0" LATERALLY FROM ENTRANCE. MUST NOT BE OBSTRUCTED OR ALTERED IN ANY WAY. MUST BE REPLACED IF IT BECOMES ILLEGIBLE FOR ANY REASON. (REFERENCE GUIDELINE FOR EXCEPTIONS AT TEXAS, ILLINOIS, KANSAS, NEW MEXICO, ARIZONA, AND TENNESSEE)



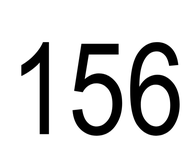
AS-52

DESCRIPTION: NO WEAPONS DECAL GLASS DOOR
SUBSTRATE: 3M CAST VINYL
NOTES: MUST BE POSTED AT 5'-0" FROM BOTTOM OF ENTRANCE DOOR. MUST BE POSTED WITHIN 300' OF THE AREA CLOSED TO THE PUBLIC. MUST NOT BE MORE THAN 4'-0" LATERALLY FROM ENTRANCE. MUST NOT BE OBSTRUCTED OR ALTERED IN ANY WAY. MUST BE REPLACED IF IT BECOMES ILLEGIBLE FOR ANY REASON. (REFERENCE GUIDELINE FOR EXCEPTIONS AT TEXAS, ILLINOIS, KANSAS, NEW MEXICO, ARIZONA, AND TENNESSEE)



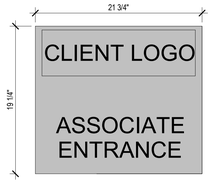
AS-56b

DESCRIPTION: FREEZING TEMPERATURE EXPLANATORY WINDOW CLING SIGN
SUBSTRATE: WINDOW CLING VINYL
NOTES: USED TO EXPLAIN ICE ALERT WARNING SIGN PANELS (AS-56). REQUIRED AT SITES WITH WINTER TEMPERATURES OF 35 DEGREES F OR LESS. MOUNTED ON THE INTERIOR SIDE OF EACH EXIT DOOR SO EVERYONE PASSES ONE ON THE WAY OUT.



AS-60

DESCRIPTION: DOCK DOOR NUMBER VINYL (EXTERIOR)
INSTALLATION: MOUNTED 1ST SURFACE TO DOCK DOOR.



AS-62

DESCRIPTION: ASSOCIATE ENTRANCE VINYL
SUBSTRATE: 3M CAST VINYL
NOTES: AS-62 MAY BE USED ON ADJACENT DOOR OR GLASS NEXT TO AS-17. DO NOT INSTALL AS-17 AND AS-62 ON THE SAME DOOR.



AS-73

DESCRIPTION: ROOF ACCESS PERMIT SIGN
SUBSTRATE: .080" PRE-FINISHED WHITE ALUM. PANEL - OR -PAINTED VINYL DECAL
NOTES: SIGN WILL BE PLACED TO THE SIDE OF ANY CONTROLLED ROOF ACCESS POINT. MOUNT 5'-0" AFF. TYPICAL. PROVIDE SIGN ON FIXED LADDER. MOUNT AT 5'-0" AFF. ATTACH TO METAL MESH WITH WIRE TIES

2 INTERIOR ACCESSIBLE SIGNS
G1.10 Scale: 1 1/2" = 1'-0"

1 TENANT SIGNAGE - EXTERIOR
G1.10 Scale: 1 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
BUILDING SIGNAGE AND GRAPHICS

G1.10

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

AG-1

DESCRIPTION: WOMEN'S RESTROOM SYMBOL
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE
COLORS: C3

AG-2

DESCRIPTION: MEN'S RESTROOM SYMBOL
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE
COLORS: C7

AG-3

DESCRIPTION: WOMEN'S RESTROOM WALL TEXT
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE
COLORS: C3

AG-4

DESCRIPTION: MEN'S RESTROOM WALL TEXT
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE
COLORS: C7

AG-7

DESCRIPTION: AUTOMATIC DOOR GRAPHIC
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE. MUST BE INSTALLED ON BOTH SIDES OF AUTOMATIC DOORS. MOUNTED TO 1ST SURFACE OF AUTOMATIC DOORS. USE ONLY IF NOT PROVIDED BY AUTOMATIC DOOR MANF.
COLORS: C1, C2, C10, C14

AG-8

DESCRIPTION: CLIENT SLOGAN
NOTES: 3M CAST VINYL, BLACK VINYL GRAPHIC. PROVIDE AT MAIN BREAK ROOM. SIDE WALLS ARE TO BE PAINTED C7. CENTER ON WALL AND MOUNT TO TOP EDGE AT 10'-0" AFF. POSITION ON WALL OPPOSITE ENTRANCE TO BREAK ROOM, SO THAT AS ASSOCIATES ARE WALKING IN TO THE BREAK ROOM, THEY SEE THIS SLOGAN IMMEDIATELY AHEAD OF THEM.
COLORS: C2

AG-13

DESCRIPTION: EMERGENCY EXIT ALARM WILL SOUND (HM DOOR)
NOTES: DIGITALLY CUT 3M VINYL, 1ST SURFACE MOUNT. PROVIDE TRANSFER TAPE MARKED WITH CENTERLINES. DIE CUT LETTERS, FONT: "CLIENT EMBER"
COLORS: C1

AG-13b

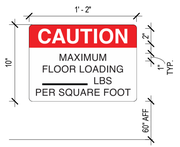
DESCRIPTION: EMERGENCY EXIT ALARM WILL SOUND (GLASS DOOR)
SUBSTRATE: 3M WHITE CONTROLTAC VINYL (GRAY BLACK)
NOTES: DIGITAL PRINT ON 3M 180KC-13 VINYL WITH LUSTER LAMINATE PROVIDE PREMASK WITH CENTERLINES. FONT: "CLIENT EMBER". ON GLASS DOORS, SOLID DECAL THAT CANNOT BE READ IN REVERSE FROM THE OUTSIDE OF THE BUILDING THROUGH THE GLASS. INCLUDE ON INSIDE FACE OF ALL EXTERNAL DOORS. CENTER ON DOOR BELOW DOOR NUMBERS AND COORDINATE
COLORS: C1, C5

AG-15

DESCRIPTION: CONFINED SPACE
SUBSTRATE: 1/8" ACM PANEL PRE-FINISHED WHITE OR 060" PRE-FINISHED WHITE ALUM.
NOTES: 3M BLACK VINYL 230-22 OR DIRECT PRINTED GRAPHICS MOUNTED WITH GALVANIZED STEEL LAG SCREWS. SIGN ONLY REQUIRED IN DOCK LEVELER PIT WHEN OPEN PIT LEVELER IS PROVIDED. INSTALL ON THE REAR WALL OF THE DOCK LEVELER PIT. MUST BE VISIBLE FROM TRUCK YARD WHEN LEVELER IS FULLY RAISED. INSTALL ON BUILDING EXTERIOR TO THE IMMEDIATE RIGHT OF THE LEVELER PIT.
COLORS: C2, C5

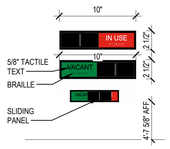
AG-16

DESCRIPTION: CARBON MONOXIDE
SUBSTRATE: 3M U180 OR EQUAL
NOTES: DIGITALLY PRINTED GRAPHICS WITH 3M GLOSS LAMINATE. USE TO INDICATE POSSIBLE PRESENCE OF CARBON MONOXIDE, TO BE INSTALLED AT EXTERIOR LAUNCH/QUEUING AREAS. AT EXTERIOR LOADING, MOUNT TO COLUMN AT LAUNCH AND ON A POST AT THE QUEUING PAD OUT OF THE LANE OF TRAFFIC (1) PER LAUNCH OR QUEUING PAD.
COLORS: C1, C2, C11



AG-17

DESCRIPTION: MAX FLOOR LOADING
SUBSTRATE: .080" ALUMINUM SHEET DIGITALLY CUT
NOTES: DIGITALLY CUT PRINT, USED TO INDICATE SAFE FLOOR WARNING AT THE PROCESS MEZZANINE, RSP & INTERIOR ROOF STRUCTURES OVER BREAK ROOMS. ONLY USE AS OCCURS FOR SPACES WITH MEZZANINE OVER BREAKROOM.
COLORS: C2, C5



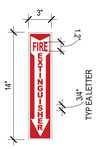
AG-20

DESCRIPTION: ROOM USE SLIDER ACCESSIBLE SIGN
SUBSTRATE: 1/8" P-95 2025 MATTE BLACK ACRYLIC
NOTES: 1/32" RAISED WHITE COPY WITH GRADE 2 CLEAR RASTER BRAILLE. MANUFACTURER TO PROVIDE 2-SIDED MOUNTING TAPE ON BACK OF SIGN AT EACH CORNER. ALL RAISED FEATURES, TACTILE TEXT AND BRAILLE SHALL HAVE ROUNDED TOPS. TACTILE TEXT SHALL BE 5/8" TALL. ALL SIGN BASES SHALL BE 1/8" THICK BLACK ACRYLIC WITH MAT NON-GLARE FINISH. ALL OTHER FEATURES SHALL BE WHITE AND RAISED 1/32". MOUNTED DIRECTLY BELOW LACTATION ROOM SIGN.
COLORS: C1, C2, C5, C9



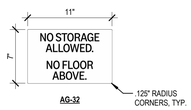
AG-24

DESCRIPTION: FIRE BARRIER PAINT STENCIL
SUBSTRATE: FINISHED WALL
NOTES: INSTALL ON WALL AT 5'-0" TO 7'-0" AFF. COORDINATE WITH SITE SPECIFIC CONDITIONS. MINIMUM OF 3" TALL LETTERS STENCILED IN "RED" PAINT LOCATED WITHIN A CONCEALED SPACE AND BE WITHIN 15 FEET OF THE END OF EACH WALL AND AT INTERVALS NOT EXCEEDING 30 FEET MEASURED HORIZONTALLY ALONG THE PARTITION WALL.
COLORS: C5



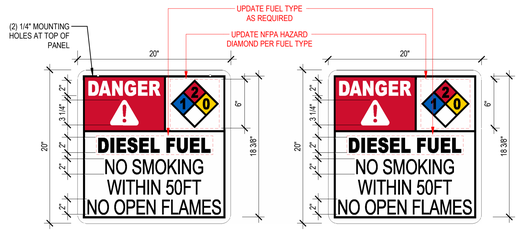
AG-28

DESCRIPTION: FIRE EXTINGUISHER DECAL
NOTES: USED AT FUEL STORAGE LOCATIONS. SIGN CAN BE .080" ALUM. PANEL HUNG FROM STRUCTURE ABOVE OR A VINYL DECAL AS REQUIRED PER SITE CONDITIONS
COLORS: C1, C5



AG-32

DESCRIPTION: NO STORAGE/NO FLOOR
SUBSTRATE: 1/8" THICK WHITE ACRYLIC
NOTES: DIRECT DIGITAL PRINT, INSTALL ON ALL SIDES TO WAREHOUSE STRUCTURES WHERE NO FLOOR ABOVE. INSTALL 2-SIDED TAPE AT ALL 4 CORNERS.
COLORS: C1, C2



AG-42

DESCRIPTION: FUEL DANGER SIGN
SUBSTRATE: .080" ALUMINUM PANEL OR 3M VINYL DECAL
NOTES: USED AT FUEL STORAGE LOCATIONS. SIGN CAN BE .080" ALUM. PANEL HUNG FROM STRUCTURE ABOVE OR A VINYL DECAL AS REQUIRED PER SITE CONDITIONS. UPDATE FUEL TYPE AND NFPA HAZARD DIAMOND AS REQUIRED (SHOWN IN DASHED RED FOR CLARITY). HANGING INSTALLATION : MOUNT AT 7'-0" AFF. HANG FROM STRUCTURE ABOVE VIA 1/16" X 90 LBS. WORKLOAD, COATED STEEL CABLE W/ FERRULE. VINYL DECAL INSTALLATION: MOUNTED 1ST SURFACE TO FUEL TANK OR GENERATOR ENCLOSURE. SURFACE MUST BE CLEAN AND FREE OF ANY OILY RESIDUE. INSTALL IN TEMPERATURES ABOVE 40 DEGREES FAHRENHEIT
COLORS: C1, C2, C10, C13, C14

1 / G1.11 INTERIOR BUILDING SIGNS
Scale: 1 1/2" = 1'-0"

© 2025 CESO, INC

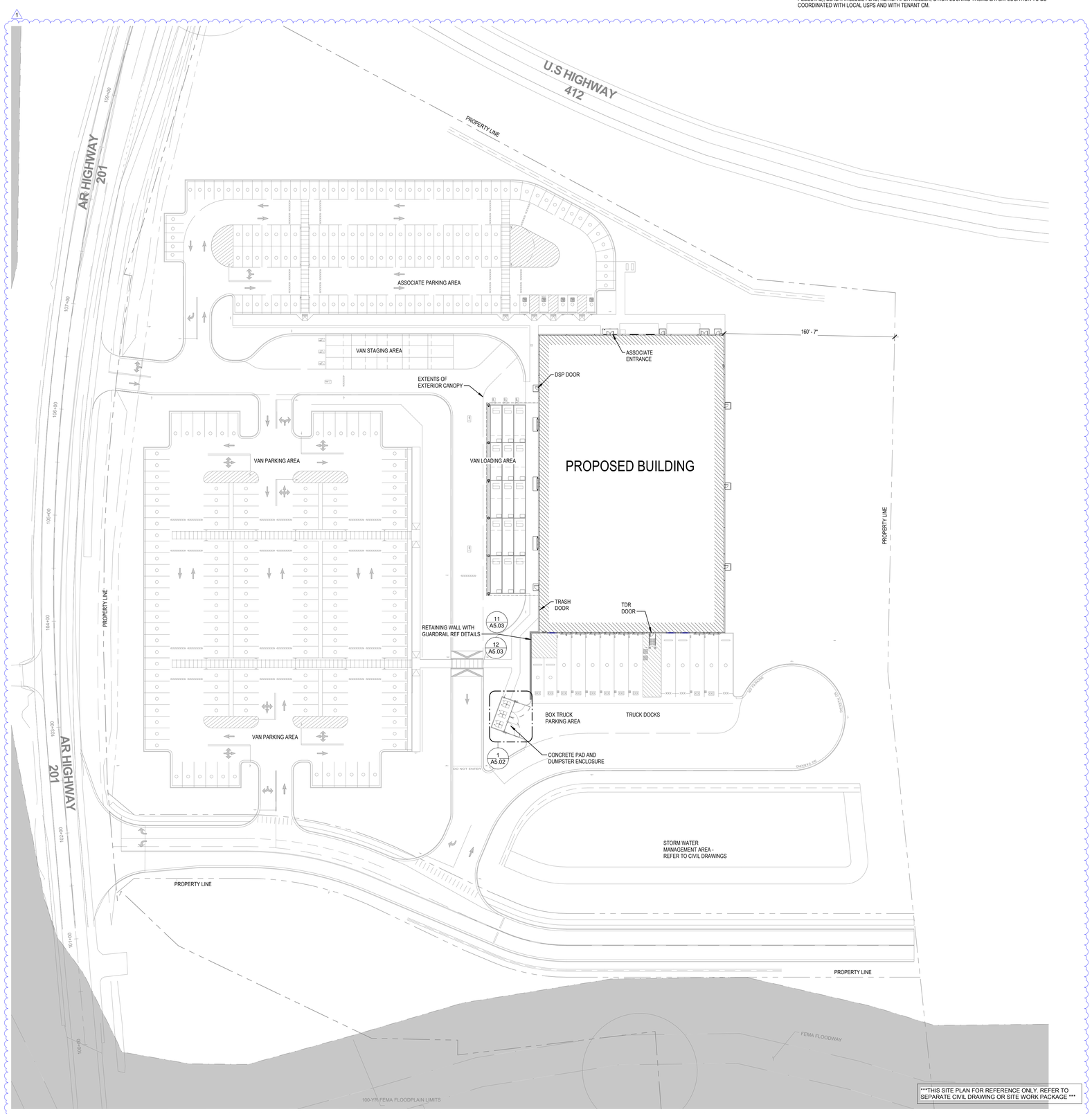
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	RS/JB
Checked By:	*REVIEWER*
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
BUILDING SIGNAGE AND GRAPHICS

G1.11

SITE PLAN SHEET NOTES

1. REFER TO CIVIL DRAWINGS FOR NEW SITE SIGNAGE.
2. REFER TO CIVIL DRAWINGS FOR NEW PARKING STALL DIMENSIONS AND SIZES.
3. REFER TO CIVIL DRAWINGS FOR FULL SITE SCOPE OF WORK.
4. MAIL BOX PROVIDED AND INSTALLED BY G.C. SALSBURY 4350 (MAILBOX), 4385 (IN-GROUND MOUNTED PEDESTAL), BLACK. INCLUDE FLAG, NEWSPAPER HOLDER, & NON-LOCKING THUMB LATCH. LOCATION TO BE COORDINATED WITH LOCAL USPS AND WITH TENANT CM.



TRUE NORTH

1 AS1.01 ARCHITECTURAL SITE PLAN
Scale: 1" = 40'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
NO. 912937
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL / RM
Checked By:	GJB/JR/MB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ARCHITECTURAL SITE PLAN

AS1.01

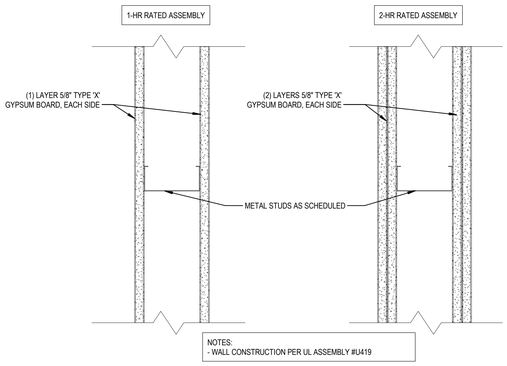
INTERIOR WALL TYPE PARTITIONS

PARTITION CODE (X#.#)	STUD SIZE	STUD SPACING	FINISH SIDES		PARTITION WIDTH	FIRE RATING INFORMATION		STC	COMMENTS
			SIDE 1 (TAG SIDE)	SIDE 2		FIRE RATING	FIRE TEST DESIGN NUMBER		
A3	3-5/8"	16" O.C.	5/8" GYP. BD (1 LAYER)	5/8" GYP. BD (1 LAYER)	4 7/8"				
A6	6"	16" O.C.	5/8" GYP. BD (1 LAYER)	5/8" GYP. BD (1 LAYER)	7 1/4"				
A8	8"	16" O.C.	5/8" GYP. BD (1 LAYER)	5/8" GYP. BD (1 LAYER)	9 1/4"				
A8.1	8"	16" O.C.	5/8" TYPE 'X' GYP. BD (1 LAYER)	5/8" TYPE 'X' GYP. BD (1 LAYER)	9 1/4"	1HR	UL U419		
C6	6"	16" O.C.	5/8" WATER RESISTANT GYP. BD (1 LAYER)	5/8" GYP. BD (1 LAYER)	7 1/4"				WATER RESISTANT GYP. BD. ON SIDES WITH PLUMBING FIXTURES, AND AS INDICATED IN SHEET NOTE I.
C8	8"	16" O.C.	5/8" WATER RESISTANT GYP. BD (1 LAYER)	5/8" GYP. BD (1 LAYER)	9 1/4"				WATER RESISTANT GYP. BD. ON SIDES WITH PLUMBING FIXTURES, AND AS INDICATED IN SHEET NOTE I.
D3	3-5/8"	16" O.C.	5/8" WATER RESISTANT GYP. BD (1 LAYER)	N/A	4 1/4"				WATER RESISTANT GYP. BD. ON SIDES WITH PLUMBING FIXTURES, AND AS INDICATED IN SHEET NOTE I.
F3	3-5/8"	16" O.C.	5/8" GYP. BD (1 LAYER)	N/A	4 1/4"				

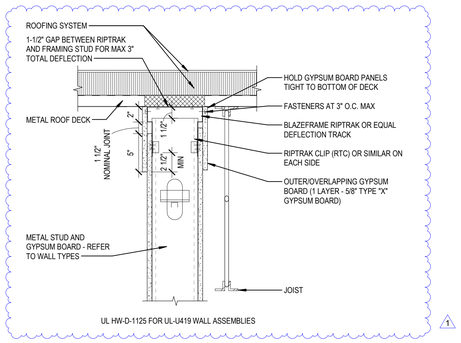
NOTES:
1. REFER TO G0.02 FOR WALL TAG LEGEND.
2. REFER TO FLOOR PLANS FOR EXTENTS OF WALL INSULATION.
3. REFER TO STRUCTURAL DRAWINGS "STEEL STUD SIZE" CHART FOR MINIMUM GAUGE.

SHEET NOTES

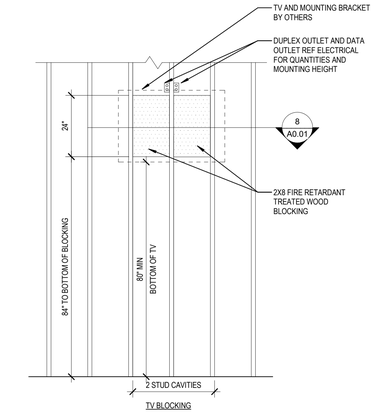
A. ALL WALLS THAT EXTEND TO THE UNDERSIDE OF DECK OR STRUCTURE ABOVE SHALL ALLOW FOR DEFLECTION IN THE VERTICAL DIRECTION. REFERENCE PARTITION DETAILS SHEET.
B. PROVIDE DIAGONAL BRACING AT CORNERS ABOVE CEILING FOR PARTIAL HEIGHT PARTITIONS AS REQUIRED TO STABILIZE PARTITIONS. REFERENCE CEILING JOIST PLAN.
C. PROVIDE HORIZONTAL CONSTRUCTION STRAP BRIDGING AT 1/3 POINTS OR SPACED 8'-0" VERTICALLY IN WALLS THAT ARE FULLY SHEATHED. PROVIDED BRIDGING AT 32" OC SPACED VERTICALLY FOR PORTION OF WALL WHERE IT IS NOT FULLY SHEATHED.
D. PROVIDE AND INSTALL FIRE RETARDANT TREATED WOOD BLOCKING IN WALL TO SUPPORT SHELVING, CABINETRY/MILLWORK, AND EQUIPMENT. REFERENCE SPECS, DETAILS, AND PLANS. ANCHOR WOOD BLOCKING TO METAL STUD FRAMING W/ #12 TEK SCREWS AT 16" OC MAX. STAGGER FASTENERS WHEN BLOCKING IS WIDER THAN 6" NOMINAL. REFERENCE SPECIFICATIONS FOR ADDITIONAL STUD REQUIREMENTS AT MILLWORK AND WALL HUNG FIXTURE LOCATIONS. THE GC SHALL PROVIDE ALL NECESSARY WOOD BLOCKING FOR ALL TRADES.
E. PROVIDE FIRE BLOCKING AT FLOOR AND ROOF LEVELS, CONCEALED SPACES BETWEEN STAIRWAY STRINGERS, PENETRATIONS IN FLOOR / CEILING ASSEMBLIES AND OTHER LOCATIONS AS REQUIRED BY CODE.
F. ALL GYPSUM BOARD JOINTS, NAIL/SCREW HEADS, CUTS, ETC. SHALL BE TAPED AND SANDED TO A LEVEL 4 FINISH PRIOR TO RECEIVING FINISHES, REFERENCE SPECIFICATIONS, UNO.
G. BASE SHEATHING MATERIAL IS 5/8" GYPSUM BOARD, UNO.
H. METAL STUDS ARE SPACED AT 16" OC MAX, UNO.
I. MOISTURE-RESISTANT GYPSUM WALL BOARD TO BE INSTALLED ON PARTITIONS WITH ENCLOSED PLUMBING, BOTH SIDES. WALLS RECEIVING PORCELAIN OR CERAMIC TILE OR FRP, ENTIRE WALL SHALL RECEIVE MOISTURE-RESISTANT GYPSUM WALL BOARD.
J. AT ALL EXTERIOR CONCRETE WALL PANELS TO RECEIVE FURRING, PROVIDE AND INSTALL VAPOR BARRIER, PLACED BETWEEN CONCRETE AND STUD WALL AND/OR FURRING CONSTRUCTION. TAPE ALL JOINTS AND GAPS.
K. WHEN BUILDING ANY NEW FIRE RATED PARTITIONS, ENSURE ALL PENETRATIONS AND JOINTS ARE SEALED IN ACCORDANCE WITH SPECIFICATIONS.
L. PROVIDE CONTROL JOINTS IN GYPSUM BOARD FRAMED ASSEMBLIES AT 30'-0" OC MAX.
M. HOLD ALL SUBSTRATE ½" ABOVE CONCRETE TO AVOID WICKING ACTION, UNO.
N. REFER TO STRUCTURAL DRAWINGS FOR STEEL STUD SIZING AND LIMITING HEIGHTS.



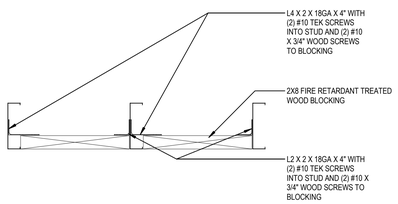
13 A0.01 TYPICAL RATED PARTITION ASSEMBLIES
Scale: 3" = 1'-0"



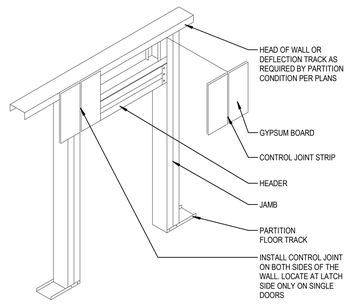
12 A0.01 TO DECK 1-HR RATED
Scale: 1 1/2" = 1'-0"



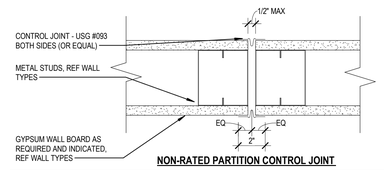
9 A0.01 BLOCKING ELEVATION
Scale: 1/2" = 1'-0"



8 A0.01 BLOCKING PLAN
Scale: 1 1/2" = 1'-0"

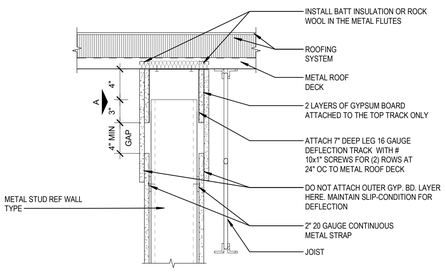


6 A0.01 CONTROL JOINT AT DOOR
Scale: 12" = 1'-0"



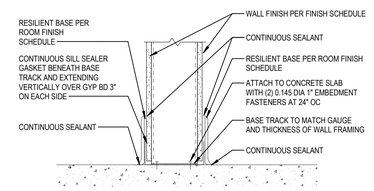
NOTE:
CONTROL JOINTS TO BE SPACED 30'-0" OC MAX. OR AS INDICATED ON DRAWINGS. COVER JOINT GROOVE WITH PLASTIC TAPE PRIOR TO APPLICATION OF JOINT COMPOUND. REMOVE AFTER FINISHING WITH COMPOUND. FINISH WALLS AS INDICATED ON SCHEDULES. TOP AND BOTTOM RUNNER CHANNELS SHALL BE DISCONTINUOUS AT JOINT.

5 A0.01 GYP. BOARD CONTROL JOINTS
Scale: 3" = 1'-0"

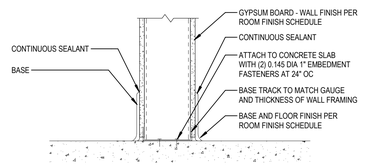


PARTITION ATTACHMENT PARALLEL TO JOIST

4 A0.01 PARTITION ATTACHMENT - METAL DECK - NON FIRE RATED
Scale: 1 1/2" = 1'-0"



2 A0.01 TYPICAL WALL BASE AT WET ROOM
Scale: 1 1/2" = 1'-0"



1 A0.01 TYPICAL WALL BASE
Scale: 1 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

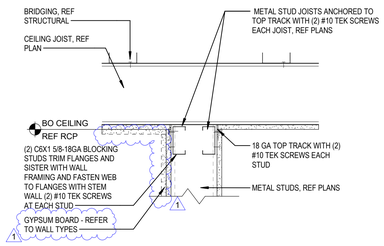
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

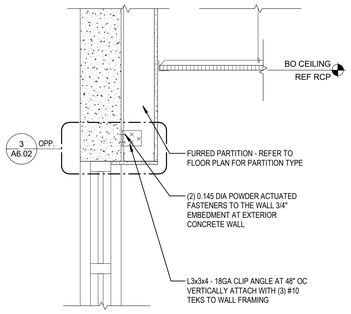
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
WALL/PARTITION TYPES & DETAILS

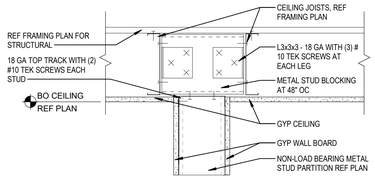
A0.01



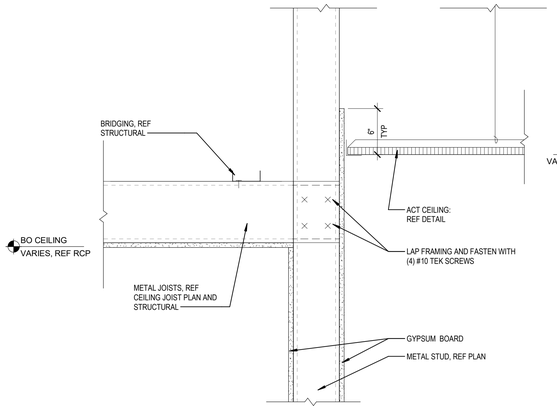
12 A0.03 JOISTS PERPENDICULAR - CONTINUOUS
Scale: 1 1/2" = 1'-0"



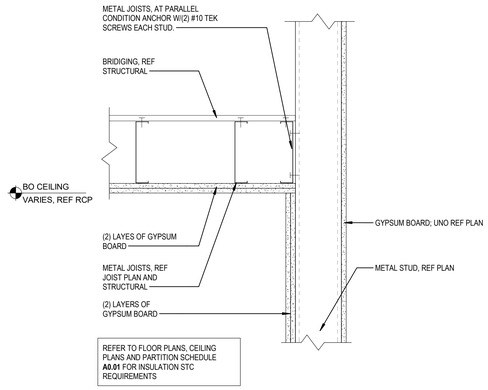
11 A0.03 SECTION AT WINDOW
Scale: 1" = 1'-0"



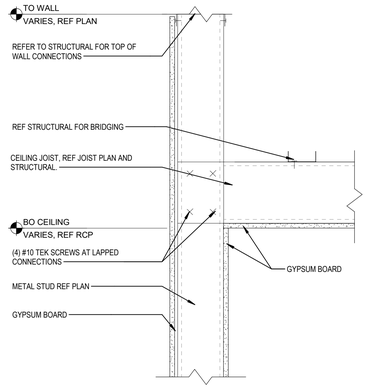
9 A0.03 JOISTS PARALLEL - TOP OF WALL
Scale: 1 1/2" = 1'-0"



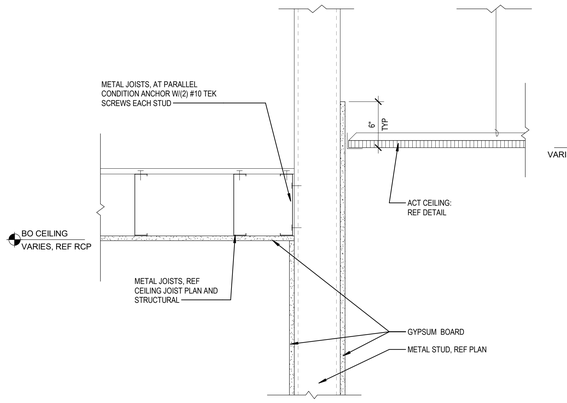
8 A0.03 JOISTS PERPENDICULAR - CEILING TRANSITION
Scale: 1 1/2" = 1'-0"



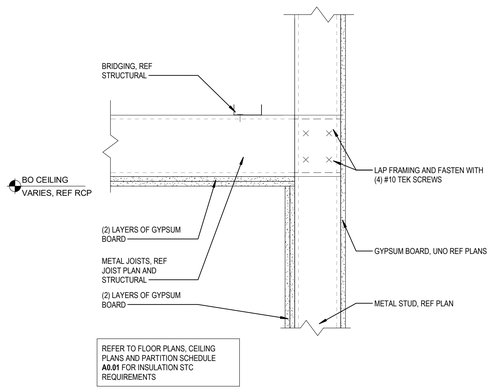
7 A0.03 JOISTS PARALLEL - SOUND ATTENUATING WALL AND CEILING
Scale: 1 1/2" = 1'-0"



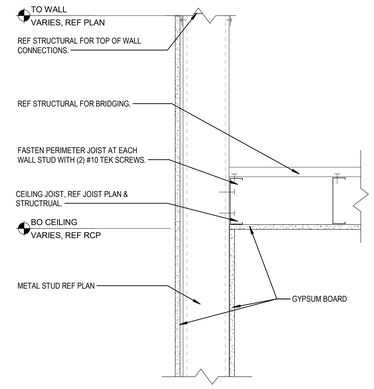
6 A0.03 JOISTS PERPENDICULAR - GYP CEILING
Scale: 1 1/2" = 1'-0"



4 A0.03 JOISTS PARALLEL - CEILING TRANSITION
Scale: 1 1/2" = 1'-0"



3 A0.03 JOISTS PERPENDICULAR - SOUND ATTENUATING WALL AND CEILING
Scale: 1 1/2" = 1'-0"



2 A0.03 JOISTS PARALLEL - GYP CEILING
Scale: 1 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

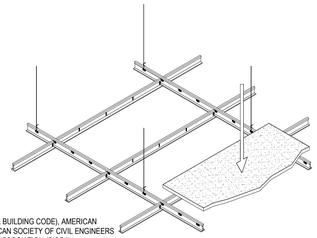
© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
CEILING DETAILS

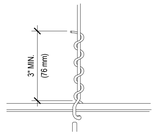
A0.03

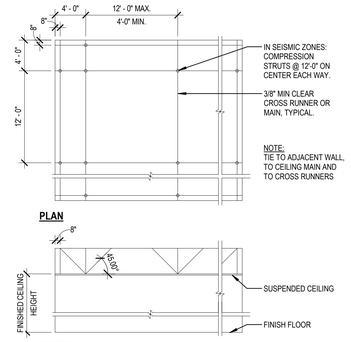
THIS DOCUMENT PROVIDES THE IBC-REFERENCED STANDARDS FOR THE INSTALLATION OF SUSPENSION SYSTEMS FOR ACOUSTICAL LAY-IN CEILINGS. INCORPORATION OF THIS DOCUMENT WILL PROVIDE A MORE UNIFORM STANDARD FOR INSTALLATION AND INSPECTION. THIS DOCUMENT IS DESIGNED TO ACCOMPLISH THE INTENT OF THE INTERNATIONAL BUILDING CODE (IBC) WITH REGARD TO THE REQUIREMENTS FOR SEISMIC DESIGN CATEGORY D, E, AND F FOR SUSPENDED CEILINGS AND RELATED ITEMS. UNLESS SUPPORTED BY ENGINEERING, THE SUSPENSION SYSTEM SHALL BE INSTALLED PER THE REQUIREMENTS FOR SEISMIC DESIGN CATEGORY (SDC)D, E AND F PER THE IBC, MANUFACTURERS' RECOMMENDATIONS SHOULD BE FOLLOWED.



GENERAL RECOMMENDATIONS

- REFERENCED SOURCES PER HIERARCHY: 2021 IBC (INTERNATIONAL BUILDING CODE), AMERICAN SOCIETY OF TESTING MATERIALS (ASTM C 635, ASTM C 636), AMERICAN SOCIETY OF CIVIL ENGINEERS (ASCE 7-16) AND CEILING AND INTERIOR SYSTEMS CONSTRUCTION ASSOCIATION (CISCA).
- PARTITIONS THAT ARE TIED TO THE CEILING AND ALL PARTITIONS GREATER THAN 6FT IN HEIGHT SHALL BE LATERALLY BRACED TO THE STRUCTURE. BRACING SHALL BE INDEPENDENT OF THE CEILING BRACING SYSTEM.
- FOR FURTHER INFORMATION ON BRACING OF NON-LOAD BEARING PARTITIONS REFER TO NWCB TECHNICAL DOCUMENT #201.
- ALL MAIN BEAMS ARE TO BE HEAVY DUTY (HD). SOURCE ASCE 7-16 ITEM 9.6.2.6.2.2 ITEM a.
- ALL CROSS TEES SHALL BE CAPABLE OF CARRYING THE DESIGN LOAD WITHOUT EXCEEDING DEFLECTION EQUAL TO 1/360 OF ITS SPAN. SOURCE CISCA ZONES 3-4.
- THESE RECOMMENDATIONS ARE INTENDED FOR SUSPENDED CEILING INCLUDING GRID, PANEL OR TILE, LIGHT FIXTURES AND AIR TERMINALS WEIGHING NO MORE THAN 4 POUNDS PER SQUARE FOOT. SOURCE ASCE 7-16 ITEM 9.6.2.6.1.
- ALL WIRE TIES ARE TO BE THREE TIGHT TURNS AROUND ITSELF WITHIN THREE INCHES. TWELVE GAUGE HANGER WIRE SPACED 4 FOOT ON CENTER (FIGURE 1). SOURCE ASTM C 636 ITEM 2.3.4.
- CHANGES IN CEILING PLANES WILL REQUIRE POSITIVE BRACING. SOURCES ASCE 7-16 SECTION 9.6.2.6.2.2. ITEM f.





PLAN

SECTION

FIGURE 2
LATERAL FORCE BRACING

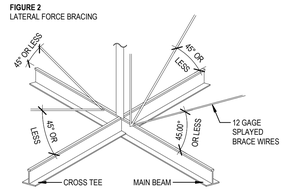


FIGURE 3
MAXIMUM RECOMMENDED LENGTHS FOR VERTICAL STRUTS

EMT CONDUIT	
1/2" EMT conduit	up to 2' - 8"
3/4" EMT conduit	up to 4' - 4"
1" EMT conduit	up to 6' - 7"
1 1/4" EMT conduit	up to 10' - 5"
1 1/2" EMT conduit	up to 12' - 11"
2" EMT conduit	up to 18' - 4"
METAL STUDS	
Single 3-5/8" metal stud (20 gauge)	up to 9' - 6"
Back-to-back 2-1/2" metal stud (20 gauge)	up to 16' - 6"
Back-to-back 3-5/8" metal stud (20 gauge)	up to 24' - 0"

NOTE: PLENUM AREAS GREATER THAN 15'-0" WILL REQUIRE ENGINEERING CALCULATIONS.

FIGURE 4A
ATTACHED WALL MOLDING REQUIREMENTS

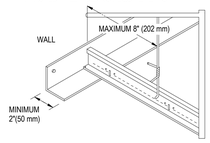
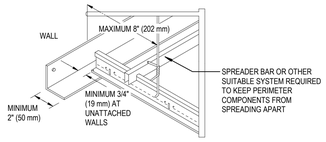
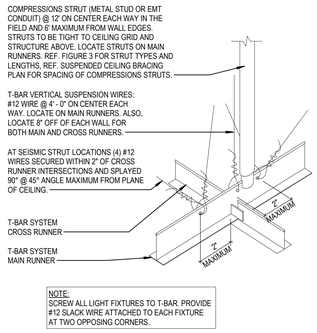


FIGURE 4b
UNATTACHED WALL MOLDING REQUIREMENTS

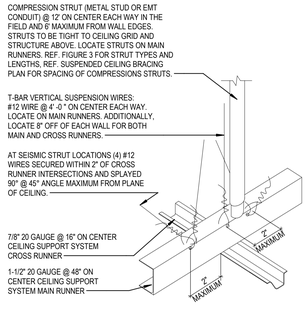


SUSPENDED CEILING BRACING



NOTE:
SCREW ALL LIGHT FIXTURES TO T-BAR. PROVIDE #12 SLACK WIRE ATTACHED TO EACH FIXTURE AT TWO OPPOSING CORNERS.

CEILING BRACING (T-BAR)



CEILING BRACING (GYP. BD)

LATERAL FORCE BRACING (FIGURES 2 AND 3)

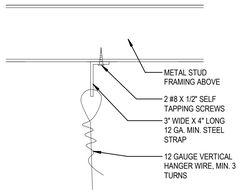
- CEILING CONSTRUCTED OF LATH AND PLASTER OR GYPSUM BOARD, SCREW OR NAIL ATTACHED TO SUSPENDED MEMBERS THAT SUPPORT A CEILING ON ONE LEVEL EXTENDING FROM WALL TO WALL SHALL BE EXEMPT FROM THE LATERAL FORCE BRACING REQUIREMENTS. SOURCE: CISCA ZONES 3-4.
- LATERAL FORCE BRACING IS THE USE OF VERTICAL STRUTS (COMPRESSION POST AND SPLAY WIRES (SEE FIGURE 2).
- LATERAL FORCE BRACING IS REQUIRED FROM CEILINGS OVER 144 SQUARE FEET AND NOT REQUIRED FOR CEILINGS LESS THAN 144 SQUARE FEET PROVIDED THEY ARE SURROUNDED BY FOUR WALLS AND BRACED TO STRUCTURE.
- SEISMIC SPLAY WIRES ARE TO BE FOUR 12 GAGE WIRES ATTACHED TO THE MAIN BEAM. WIRES ARE ARRAYED 90° FROM EACH OTHER AND AT AN ANGLE NOT EXCEEDING 45° FROM THE PLANE OF THE CEILING. SOURCE: CISCA SEISMIC ZONES 3-4.
- "POWDER DRIVEN SHOT-IN-ANCHORS" WHEN USED FOR SEISMIC APPLICATIONS AS PART OF THE PRESCRIPTIVE PATH IN SEISMIC DESIGN CATEGORIES D, E, AND F SHALL HAVE AN ICC-ES APPROVAL FOR SEISMIC APPLICATIONS AND SHALL REQUIRED "SPECIAL INSPECTION" IRRESPECTIVE OF THE TYPE OF OCCUPANCY CATEGORY THE STRUCTURE IS IN. ANCHORS FOR KICKER WIRES (SPLAYED WIRES INSTALLED FOR PURPOSES OTHER THAN SEISMIC RESTRAINT) ARE EXEMPT FROM REQUIREMENT.
- SPLAY WIRES ARE TO BE WITHIN 2 INCHES OF THE CONNECTION OF THE VERTICAL STRUT TO SUSPENDED CEILING. SOURCE: CISCA SEISMIC ZONES 3-4.
- RIDGED BRACING MAY BE USED IN LIEU OF SPLAY WIRES. SOURCE: ASCE SECTION 9.6.2.6.2.2.
- CEILINGS WITH PLENUMS LESS THAN 12" TO STRUCTURE ARE NOT REQUIRED TO HAVE LATERAL FORCE BRACING.
- VERTICAL STRUTS MUST BE POSITIVELY ATTACHED TO THE SUSPENSION SYSTEM AND THE STRUCTURE ABOVE. SOURCE: CISCA 3-4
- THE VERTICAL STRUT MAY BE EMT CONDUIT, METAL STUDS OR A PROPRIETARY COMPRESSION POST (SEE FIGURE 3)

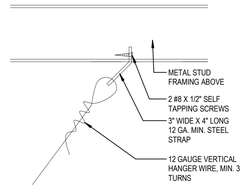
WALL MOLDINGS (FIGURES 4a AND 4b)

- WALL MOLDINGS (PERIMETER CLOSURE ANGLES ARE REQUIRED TO HAVE A HORIZONTAL FLANGE 2 INCHES WIDE. ONE END OF THE CEILING GRID SHALL BE ATTACHED TO THE WALL MOLDING, THE OTHER END SHALL HAVE A 3/4 INCH CLEARANCE FROM THE WALL AND FREE TO SLIDE. SOURCE: ASCE 7-16 SECTION 9.6.2.6.2.2. ITEM b.
- WHERE SUBSTANTIATING DOCUMENTATION HAS BEEN PROVIDED TO THE LOCAL JURISDICTION, PERIMETER CLIPS MAY BE USED TO SATISFY THE REQUIREMENTS OF THE 2-INCH CLOSURE ANGLE.
- THE GRID SHALL BE ATTACHED AT TWO ADJACENT WALLS (POP RIVETS OR APPROVED METHOD). SOFFITS EXTENDING TO A POINT AT LEAST LEVEL WITH THE BOTTOM PLANE OF THE GRID ARE INDEPENDENTLY SUPPORTED AND LATERALLY BRACED TO THE STRUCTURE ABOVE ARE DEEMED TO BE EQUIVALENT TO WALLS.
- THERE SHALL BE A MINIMUM 3/4 INCH CLEARANCE FROM THE END OF THE GRID SYSTEM AT UN-ATTACHED WALLS. SOURCE: ASCE 7-16 SECTION 9.6.2.6.2.2. ITEM b.

SPREADER BARS (FIGURES 4b)

- SPREADER (SPACER) BARS SHALL BE USED TO PREVENT THE ENDS OF THE MAIN BEAMS AND CROSS TEES AT PERIMETER WALLS FROM SPREADING OPENING DURING A SEISMIC EVENT. PERIMETER WIRES SHALL NOT BE IN LIEU OF SPREADER BARS. SOURCE: CISCA SEISMIC ZONES 3-4.
- SPREADER BARS ARE NOT REQUIRED AT PERIMETERS WHERE RUNNERS ARE ATTACHED DIRECTLY TO CLOSURE ANGLES.
- WIRE TYING IS AN ACCEPTABLE ALTERNATIVE TO SPREADER BARS.
- SPREADER BARDS ARE NOT REQUIRED IF A 90° INTERSECTING CROSS OR MAIN IS WITHIN 8 INCHES OF THE PERIMETER WALL.
- WHERE SUBSTANTIATING DOCUMENTATION HAS BEEN PROVIDED TO THE LOCAL JURISDICTION, PERIMETER CLIPS MAY BE USED TO SATISFY THE REQUIREMENTS FOR SPREADER BARS.





HANGER (SUSPENSION) WIRES (FIGURES 5a AND 5b)

- HANGER AND PERIMETER WIRES MUST BE PLUMB WITHIN 1 IN 6 UNLESS (FIGURE 5a) SLOPING WIRES ARE PROVIDED (FIGURE 5b). SOURCE: ASTM C 636 SECTION 2.1.4.
- HANGER WIRES SHALL BE 12 GAUGE AND SPACED 4 FEET ON CENTER OR 10 GAUGE SPACED 5 FEET ON CENTER. SOURCE: CISCA ZONES 3-4.
- ANY CONNECTION DEVICE AT THE SUPPORTING CONSTRUCTION SHALL BE CAPABLE OF CARRYING NOT LESS THAN 100 POUNDS. SOURCES: CISCA ZONES 3-4.
- POWDER DRIVEN SHOT-IN-ANCHORS ARE AN APPROVED METHOD OF ATTACHMENT FOR HANGER WIRES.
- TERMINALS ENDS OF EACH MAIN BEAM AND CROSS TEE MUST BE SUPPORTED WITHIN 8 INCHES OF EACH WALL WITH A PERIMETER WIRE (SEE FIGURE 4 & 5b0. SOURCE: CISCA ZONES 3-4.
- WIRES SHALL NOT ATTACH TO OR BEND AROUND INTERFERING MATERIAL OR EQUIPMENT. A TRAPEZE OR EQUIVALENT DEVICE SHALL BE USED WHERE OBSTRUCTIONS PRECLUDE DIRECT SUSPENSION. TRAPEZE SUSPENSIONS SHALL BE A MINIMUM OF BACK-TO-BACK 1-1/4" COLD-ROLLED CHANNELS FOR SPANS EXCEEDING 48 INCHES. SOURCE: CISCA ZONES 3-4

ELECTRICAL FIXTURES

- LIGHT FIXTURES WEIGHING LESS THAN 10 POUNDS SHALL HAVE ONE 12 GAUGE HANGAR WIRE CONNECTED FROM THE FIXTURE TO THE STRUCTURE ABOVE. THIS WIRE MAY BE SLACK. SOURCE: CISCA SEISMIC ZONES 3-4.
- LIGHT FIXTURES WEIGHING MORE THAN 10 POUNDS AND LESS THAN 56 POUNDS SHALL HAVE TWO 12 GAUGE WIRES ATTACHED AT OPPOSING CORNERS OF THE LIGHT FIXTURE TO THE STRUCTURE ABOVE. THESE SIRES MAY BE SLACK. SOURCE: CISCA SEISMIC ZONES 3-4/
- LIGHT FIXTURES WEIGHING MORE THAN 56 POUNDS SHALL BE SUPPORTED DIRECTLY FROM THE STRUCTURE ABOVE. THESE WIRES MUST BE TAUT. SOURCE: CISCA SEISMIC ZONES 3-4.
- PENDANT MOUNTED FIXTURES SHALL BE DIRECTLY SUPPORTED FROM STRUCTURE ABOVE USING A 9 GAUGE WIRE OR AN APPROVED ALTERNATE SUPPORT WITHOUT USING THE CEILING SUSPENSION SYSTEM FOR DIRECT SUPPORT. SOURCE: CISCA SEISMIC ZONES 3-4.
- TANDEM FIXTURE MAY UTILIZE COMMON WIRES.

MECHANICAL SERVICES

- TERMINALS OR SERVICES WEIGHING 20 POUNDS BUT NOT MORE THAN 56 POUNDS MUST HAVE TWO 12 GAUGE WIRES CONNECTING THEM TO THE CEILING SYSTEM HANGERS OR THE STRUCTURE ABOVE. THESE WIRES MAY BE SLACK. SOURCE: CISCA SEISMIC ZONES 3-4.
- TERMINALS OR SERVICES WEIGHING MORE THAN 56 POUNDS MUST BE INDEPENDENTLY SUPPORTED DIRECTLY FROM THE STRUCTURE ABOVE. THESE WIRES MUST BE TAUT. SOURCE: CISCA SEISMIC ZONES 3-4.

SEISMIC SEPARATION JOINTS (FIGURE 7)

- FOR CEILING AREAS EXCEEDING 2,500 SQUARE FEET, A SEISMIC SEPARATION JOINT OR FULL HEIGHT WALL PARTITION THAT BREAKS THE CEILING SHALL BE PROVIDED UNLESS ANALYSES ARE PERFORMED OF THE CEILINGS BRACING SYSTEM, CLOSURE ANGLES AND PENETRATIONS TO PROVIDE SUFFICIENT CLEARANCE. SOURCE: ASCE 7-16 ITEM 9.6.2.6.2.2. ITEM d.
- THE LAYOUT AND LOCATION OF THE SEISMIC SEPARATION JOINT SHALL BE PER THE DESIGNER OF RECORD AND NOTED ON THE PLANS. IF A SEISMIC SEPARATION JOINT IS REQUIRED BY THE DESIGNER, THE DESIGNER MAY USE THE GENERIC JOINT DETAILED IN THIS DOCUMENT OR A PROPRIETARY JOINT. THE AMOUNT OF FREE MOVEMENT (GAP DESIGN) SHALL BE A MINIMUM OF 3/4 INCH.
- IN LIEU OF SEISMIC SEPARATION JOINTS, THE CEILING MAY BE DIVIDED INTO AREAS LESS THAN 2500 SQUARE FEET BY THE USE OF PARTITIONS OR SOFFITS AS FOLLOWS: PARTITIONS SHALL EXTEND A MINIMUM OF 6 INCHES ABOVE THE LEVEL OF THE PLANE OF THE GRID AND SHALL BE INDEPENDENTLY BRACED TO THE STRUCTURE ABOVE. SOFFITS SHALL EXTEND TO A POINT AT LEAST LEVEL WITH THE BOTTOM PLANE OF THE GRID AND SHALL BE INDEPENDENTLY SUPPORTED AND LATERALLY BRACED TO THE STRUCTURE ABOVE.
- OTHER THAN PARTITIONS AND SOFFITS, SEISMIC JOINTS MAY NOT BE USED AS PART OF A FIRE RATED CEILING ASSEMBLY UNLESS SUBSTANTIATING DOCUMENTATION IS PROVIDED.

SPRINKLERS

- FOR CEILING WITHOUT RIGID BRACING, SPRINKLER HEAD PENETRATIONS SHALL HAVE A 2 INCH OVERSIZE RING SLEEVE OR ADAPTER THROUGH THE CEILING TO ALLOW FREE MOVEMENT OF AT LEAST 1 INCH IN ALL HORIZONTAL DIRECTIONS. FLEXIBLE HEAD DESIGN CAN ACCOMMODATE 1 INCH FREE MOVEMENT SHALL BE PERMITTED AS AN ALTERNATE. SOURCE: ASCE 07-16 9.6.2.6.2.2. ITEM e.

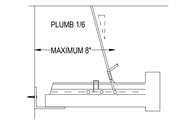


FIGURE 5a

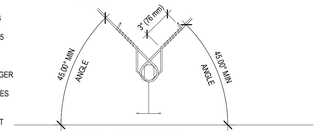


FIGURE 5b • COUNTER SLOPING

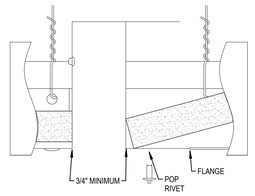


FIGURE 7

GLOSSARY FOR THIS DOCUMENT (REGIONAL TERMINOLOGY MAY VARY)

CROSS TEES
THE CROSS MEMBERS THAT INTERLOCK WITHIN THE MAIN BEAMS, ALSO KNOWN AS CROSS RUNNERS OR CROSS T-BARS.

DIFFUSER
A CIRCULAR OR RECTANGULAR METAL GRILL USED FOR THE PASSAGE OF AIR FROM A DUCTED SYSTEM.

ESSENTIAL SERVICE BUILDINGS
ANY BUILDING DESIGNED TO BE USED BY PUBLIC AGENCIES AS A FIRE STATION, POLICE STATION, EMERGENCY OPERATIONS CENTER, STATE PATROL OFFICE, SHERIFF'S OFFICE, OR EMERGENCY COMMUNICATION DISPATCH CENTER.

GRID
THE MAIN BEAMS AND CROSS TEES OF THE SUSPENSION SYSTEM.

HANGER WIRE
10 OR 12 GAUGE SOF ANNEALED WIRE USED AS PRIMARY SUPPORT FOR THE GRID SYSTEM. ALSO CALLED SUSPENSION WIRES.

LATERAL FORCE BRACING
THE BRACING METHOD USED TO PREVENT CEILING UPLIFT OR RESTRICT LATERAL MOVEMENT DURING A SEISMIC EVEN. LATERAL FORCE BRACING CONSIST OF VERTICAL STRUTS AND SPLAY WIRES.

MAIN BEAM
THE PRIMARY SUSPENSION MEMBER SUPPORTED BY HANGER WIRES, ALSO KNOWN AS THE MAIN RUNNER, CARRYING TEE, CARRYING RUNNER OR MAINS.

MOLDING/CLOSURE ANGLE
A LIGHT GAUGE METAL ANGLE OR CHANNEL FASTENED TO THE PERIMETER WALL OR PARTITION TO SUPPORT THE PERIMETER ENDS OF AN ACOUSTICAL CEILING GRID.

PERIMETER CLIPS
PROPRIETARY ANGLE BRACKET ATTACHED DIRECTLY TO THE WALL MOLDING/CLOSURE ANGLE WHICH ALLOWS FOR 3/4" MOVEMENT IN THE EVENT OF SEISMIC ACTIVITY AND INTERLOCKS PROPERLY WITH ENDS OF GRID SYSTEM.

PERIMETER WIRES
HANGER WIRES PLACED WITHIN EIGHT INCHES OF THE SURROUNDING WALLS.

PLENUM
THE SPACE ABOVE A SUSPENDED CEILING.

SLACK WIRE
A 12 GAUGE WIRE THAT IS NOT TIGHT OR TAUT.

SPREADER OR SPACER BAR
A BAR WITH NOTCHES TO PREVENT THE SUSPENSION SYSTEM FROM SEPARATING, ALSO CALLED A STABILIZER BAR.

SPLAY WIRES
WIRES INSTALLED AT AN ANGLE RATHER THAN PERPENDICULAR TO THE GRID

VERTICAL STRUTS
THE RIGID VERTICAL MEMBER USED IN LATERAL FORCE BRACING OF THE SUSPENSION SYSTEM. ALSO KNOWN AS A COMPRESSION POSTS, SEISMIC PODS, SEISMIC STRUTS. COMMON MATERIALS ARE ELECTRICAL CONDUIT (EMT), METAL STUDS OR PROPRIETARY PRODUCTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

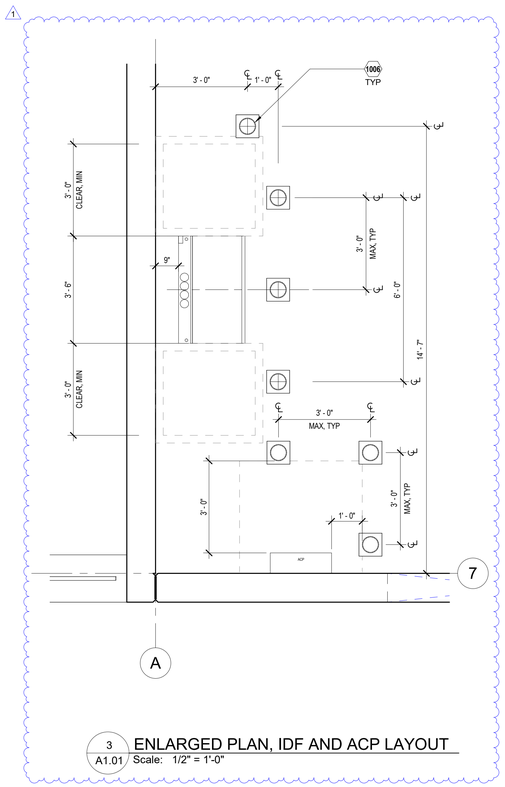
Sheet Title:
SEISMIC DESIGN CATEGORIES D, E & F CEILING GRID DETAILS

1

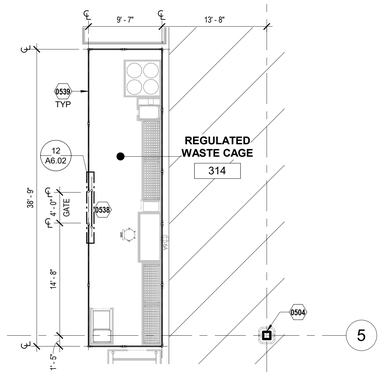
A0.04

EQUIPMENT SCHEDULE

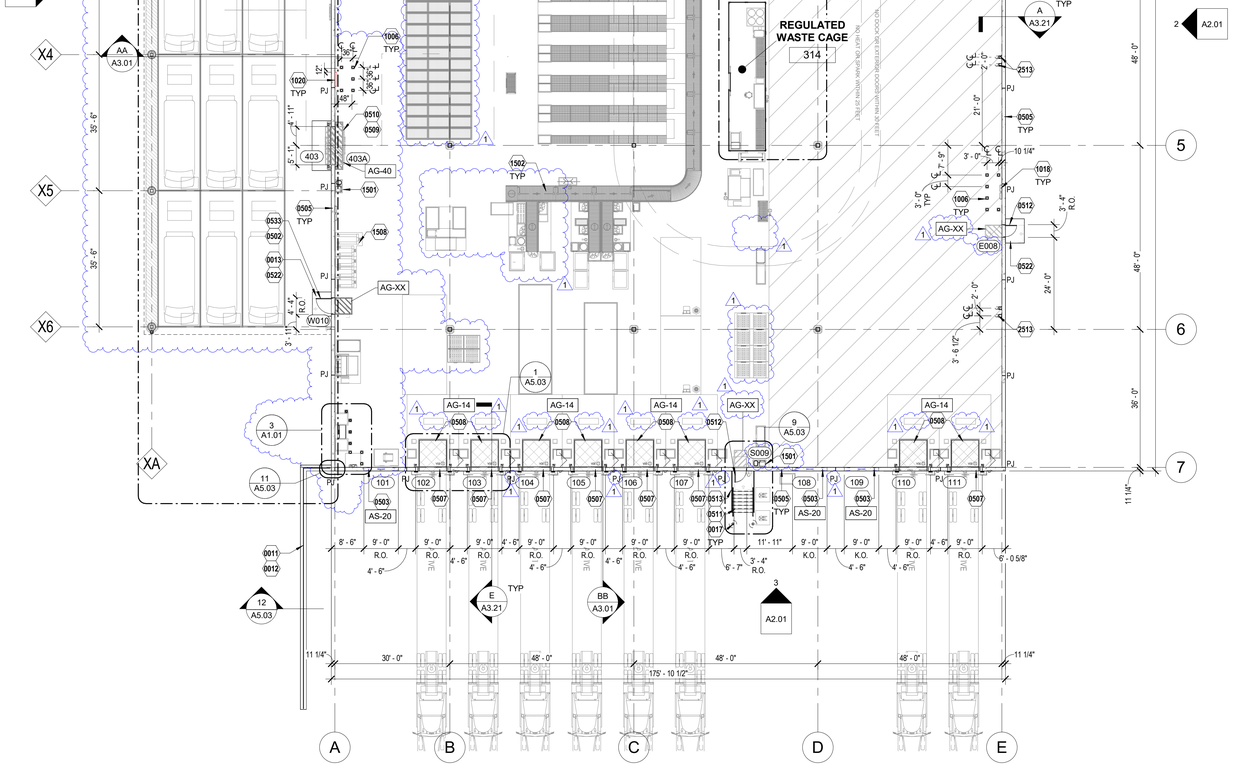
CODE	QTY	SUPPLIED BY	ITEM	COMMENTS
E-1C	4	TEN	TRASH CAN - WATER COOLER	PROVIDE AT WATER COOLER
E-14	4	TEN	WATER COOLER	ADD VALVE



3 A1.01 ENLARGED PLAN, IDF AND ACP LAYOUT
Scale: 1/2" = 1'-0"



2 A1.01 ENLARGED REGULATED WASTE AREA PLAN
Scale: 1/8" = 1'-0"



1 A1.01 OVERALL FLOOR PLAN
Scale: 1/16" = 1'-0"

SHEET NOTES - FLOOR PLAN

A. REFERENCE PARTITION DETAIL SHEETS FOR ADDITIONAL CONSTRUCTION INFORMATION.
B. REFERENCE FURNITURE PLAN SHEET FOR EQUIPMENT SCHEDULES.
C. REFERENCE STRUCTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION.
D. REFERENCE GENERAL SHEET AND SIGNAGE AND GRAPHICS SHEETS FOR ADDITIONAL SIGNAGE INFORMATION.
E. REFERENCE FINISH PLAN AND SCHEDULE FOR INTERIOR FINISHES.
F. REFERENCE DOOR TYPES AND SCHEDULES SHEET FOR ADDITIONAL INFORMATION.
G. FOR ACCESSIBLE CLEARANCES NOT INDICATED, REFER TO NOTES AND DETAILS ON GENERAL SHEETS.
H. LOCATE DOORS 4" OFF ADJACENT WALL BEHIND HINGE, UNO.
I. DIMENSION SHOWN ON NEW WALLS TO/FROM FACE OF STUD/MASONRY/CONCRETE OR CENTERLINE OF GRID UNO.
J. ALL GYP SURFACES, WALLS AND CEILING SHALL BE TAPED AND SANDED TO A LEVEL 4 FINISH PRIOR TO RECEIVING FINISHES, UNO.
K. GC TO PROVIDE BLOCKING AS REQUIRED AT SINKS, EQUIPMENT, GRAB BARS, AND FIXTURES PER MANUFACTURER'S RECOMMENDATIONS.
L. MOUNT ACCESSORIES IN COMPLIANCE WITH ACCESSIBILITY CODE REQUIREMENTS. REFER TO GENERAL INFORMATION AND SIGNAGE SHEETS.
M. SEAL ALL PENETRATIONS AT EXTERIOR WALLS AND ROOF, REFERENCE SPECIFICATIONS.
N. WALL HEIGHT IS NOTED ON PLAN. IF NO HEIGHT IS LISTED PARTITION SHALL BE 6" HIGHER THAN THE CEILING HEIGHT OF THE ROOMS THE PARTITIONS ABUT.
O. INSTALL GYPSUM WALLBOARD CONTROL JOINTS EVERY 30'-0" PER PARTITION SHEET.
P. REFERENCE STRUCTURAL PLANS FOR CONCRETE SLAB CONTROL JOINT INFORMATION.
Q. REFERENCE EXTERIOR ELEVATION SHEET FOR EXTERIOR CONTROL JOINTS.
R. REFERENCE SHEET **A5.01** FOR EXHAUST FAN DETAIL.
S. REFER TO ENERGY CODE BASIS OF DESIGN ON CODE ANALYSIS SHEET FOR ANY REQUIRED INSULATION VALUES.
T. REFERENCE SHEET **G0.02** PROJECT GENERAL NOTES AND SHEET **G1.00** CODE ANALYSIS AND LIFE SAFETY PLAN FOR KNOX BOX LOCATION(S).
U. REFERENCE SHEET **G0.02** PROJECT GENERAL NOTES FOR MAILBOX LOCATION AND INSTALLATION GUIDELINES.

LEGEND

XX	COLUMN GRID ID	XX-###	SIGNAGE TAG
XX	CANOPY COLUMN GRID ID		INTERIOR PARTITION, REFER TO SHEET A0.01
101	DOOR MARK TAG		1-HR RATED PARTITION
X	WINDOW/STOREFRONT TYPE TAG		CONCRETE WALL PANEL
? TYP	KEY NOTE		

KEYNOTES

0011 CONCRETE RETAINING WALL; REFER TO CIVIL FOR MORE INFORMATION.
0012 PROVIDE SAFETY RAIL AT RETAINING WALL; PAINT SAFETY YELLOW.
0013 ALL EXIT DOORS TO OPEN ONTO A LEVEL CONCRETE LANDING. REFER TO STRUCTURAL DRAWINGS AND CIVIL DRAWINGS FOR MORE INFORMATION.
0017 EXTERIOR BOLLARD. PAINT SAFETY YELLOW. REFER TO DETAIL 8/A5.03.
0502 DRIVER (DSP) ENTRY DOOR. FOR SIGNAGE REFER TO DETAIL 4/G1.10. AS-28 SIGN TO READ "DRIVER'S ENTRANCE".
0503 KNOCK-OUT PANEL. MATCH DOCK DOOR SIZE.
0504 COLUMN PER STRUCTURAL. PAINT PER DETAIL 7/G1.10.
0505 CONCRETE PANEL. PAINT PER ELEVATIONS.
0506 REINFORCED CONCRETE SLAB WITH VAPOR BARRIER. TYP. REFER TO STRUCTURAL. UNDER-SLAB DRAINAGE (PERIMETER & CROSS DRAINS) REQUIRED PER GEOTECHNICAL REPORT.
0507 STEEL SECTIONAL OVERHEAD TRUCK DOCK DOOR (INSULATED) WITH BUMPERS AND DOCK SEAL; PRE-PRIMED, PAINT PER LEGEND, TYP. FOR SIGNAGE REFER TO 8/G1.10.
0508 HYDRAULIC LEVELER. REFER TO SPECIFICATIONS.
0509 HIGH-SPEED FABRIC DOOR (EXTERIOR MOUNT) AND STEEL SECTIONAL OVERHEAD DOOR (INTERIOR MOUNT, INSULATED) WITH PAINTED CLEAR ZONE ON GROUND. VERIFY REQUIRED CLEARANCES WITH DOOR MANUFACTURER. DOORS MAY REQUIRE LEFT HAND DRIVE MECHANISMS. REFER TO DOOR SCHEDULE FOR MORE INFORMATION. FOR SIGNAGE REFER TO 8/G1.10.
0510 ADD VISUAL AND AUDIO ALARMS AT EXTERIOR HIGH-SPEED ROLL UP DOORS THAT HAVE PEDESTRIAN TRAFFIC. REFER TO TELECOM AND SECURITY DRAWINGS, BY OTHERS.
0511 PRE-FAB METAL STAIR AT TRUCK COURT, GALVANIZED (NO PAINT).
0512 TYPICAL EGRESS DOOR. FOR SIGNAGE REFER TO DETAIL 4/G1.10.
0513 FABRIC AWNING OVERHEAD. REFER TO ROOF PLAN. 1
0522 PROVIDE DOOR STOOP. REFER TO STRUCTURAL DRAWINGS FOR MORE INFORMATION.
0529 ADA PUSH BUTTON. PEDESTAL LOCATION TO BE OUTSIDE DOOR SWING WITH 30" X 52" CLEAR SPACE. REFER TO DOOR HARDWARE AND SCHEDULE.
0533 TRASH DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10; AS-28 SIGN TO READ "TRASH DOOR"
0534 ELECTRICAL ROOM DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10; AS-28 SIGN TO READ "ELECTRICAL ROOM"
0535 FIRE RISER DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10; AS-28 SIGN TO READ "FIRE RISER"
0536 MAIN ENTRANCE DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10
0538 SLIDING CHAINLINK FENCE GATE WITH LATCH THAT WILL ACCEPT PAD LOCK 1
0539 8'-0" TALL CHAIN LINK FENCE.
1006 INTERIOR BOLLARD. PAINT SAFETY YELLOW. REFER TO DETAIL 7/A5.03.
1018 IDF OR ACP LOCATION. REFERENCE TELECOM AND ELECTRICAL DRAWINGS.
1020 ELECTRICAL EQUIPMENT WALL MOUNTED. REFER TO ELECTRICAL.
1501 WATER COOLER LOCATION. REFER TO PLUMBING AND ELECTRICAL DRAWINGS FOR MORE INFORMATION.
1502 THIRD-PARTY VENDOR SUPPLIED CONVEYANCE. (30" A.F.F.)
1508 PALLET JACK PARKING.
2513 PRIMARY AND OVERFLOW ROOF DRAIN LEADERS (8" "COORDINATE WITH PLUMBING") - REFER TO PLUMBING DRAWINGS. PROVIDE BENT PLATE PROTECTORS - SEE DETAIL 5/A5.03. 1

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

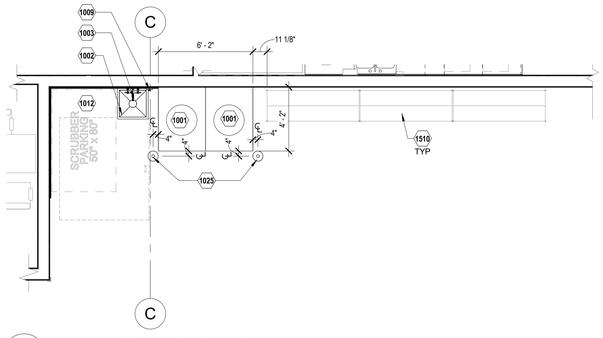
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

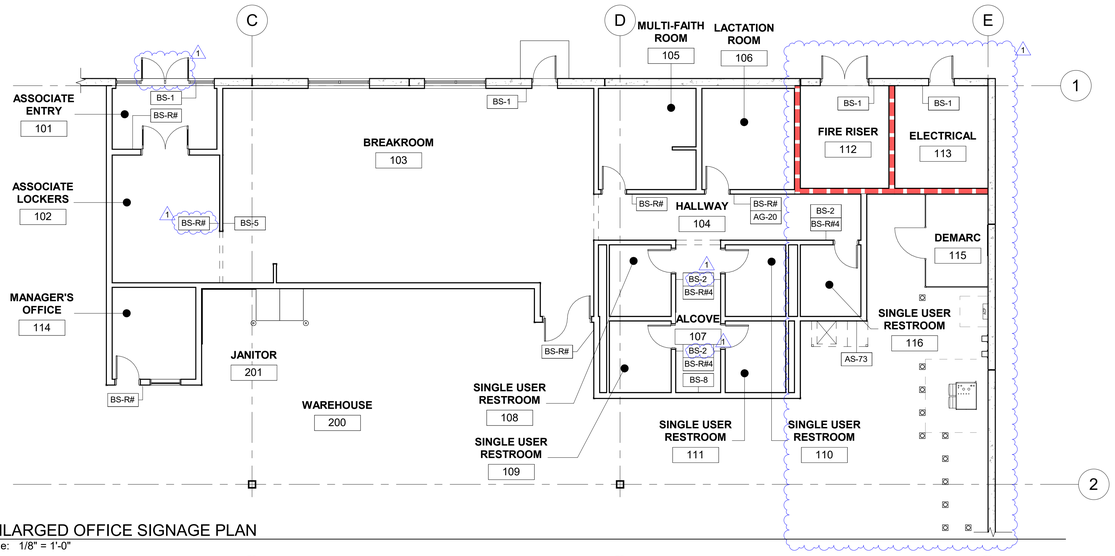
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OVERALL FLOOR PLAN

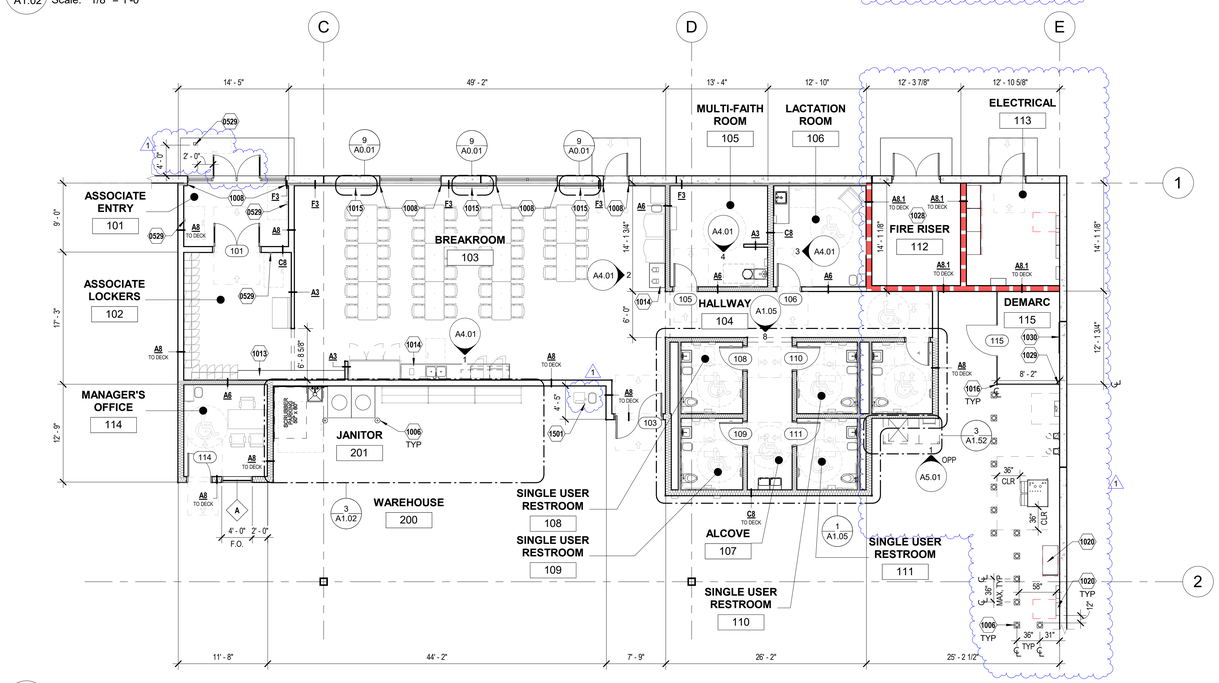
A1.01



3 A1.02 ENLARGED JANITOR AREA
Scale: 1/4" = 1'-0"



2 A1.02 ENLARGED OFFICE SIGNAGE PLAN
Scale: 1/8" = 1'-0"



1 A1.02 ENLARGED OFFICE PLAN
Scale: 1/8" = 1'-0"

SHEET NOTES - FLOOR PLAN

A. REFERENCE PARTITION DETAIL SHEETS FOR ADDITIONAL CONSTRUCTION INFORMATION.
B. REFERENCE FURNITURE PLAN SHEET FOR EQUIPMENT SCHEDULES.
C. REFERENCE STRUCTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION.
D. REFERENCE GENERAL SHEET AND SIGNAGE AND GRAPHICS SHEETS FOR ADDITIONAL SIGNAGE INFORMATION.
E. REFERENCE FINISH PLAN AND SCHEDULE FOR INTERIOR FINISHES
F. REFERENCE DOOR TYPES AND SCHEDULES SHEET FOR ADDITIONAL INFORMATION.
G. FOR ACCESSIBLE CLEARANCES NOT INDICATED, REFER TO NOTES AND DETAILS ON GENERAL SHEETS.
H. LOCATE DOORS 4" OFF ADJACENT WALL BEHIND HINGE, UNO.
I. DIMENSION SHOWN ON NEW WALLS TO/FROM FACE OF STUD/MASONRY/CONCRETE OR CENTERLINE OF GRID UNO.
J. ALL GYP SURFACES, WALLS AND CEILING SHALL BE TAPED AND SANDED TO A LEVEL 4 FINISH PRIOR TO RECEIVING FINISHES, UNO.
K. GC TO PROVIDE BLOCKING AS REQUIRED AT SINKS, EQUIPMENT, GRAB BARS, AND FIXTURES PER MANUFACTURER'S RECOMMENDATIONS.
L. MOUNT ACCESSORIES IN COMPLIANCE WITH ACCESSIBILITY CODE REQUIREMENTS. REFER TO GENERAL INFORMATION AND SIGNAGE SHEETS.
M. SEAL ALL PENETRATIONS AT EXTERIOR WALLS AND ROOF. REFERENCE SPECIFICATIONS.
N. WALL HEIGHT IS NOTED ON PLAN, IF NO HEIGHT IS LISTED PARTITION SHALL BE 8" HIGHER THAN THE CEILING HEIGHT OF THE ROOMS THE PARTITIONS ABUT.
O. INSTALL GYPSUM WALLBOARD CONTROL JOINTS EVERY 30'-0" PER PARTITION SHEET.
P. REFERENCE STRUCTURAL PLANS FOR CONCRETE SLAB CONTROL JOINT INFORMATION.
Q. REFERENCE EXTERIOR ELEVATION SHEET FOR EXTERIOR CONTROL JOINTS.
R. REFERENCE SHEET **A5.01** FOR EXHAUST FAN DETAIL.
S. REFER TO ENERGY CODE BASIS OF DESIGN ON CODE ANALYSIS SHEET FOR ANY REQUIRED INSULATION VALUES.
T. REFERENCE SHEET **G0.02** PROJECT GENERAL NOTES AND SHEET **G1.00** CODE ANALYSIS AND LIFE SAFETY PLAN FOR KNOX BOX LOCATION(S).
U. REFERENCE SHEET **G0.02** PROJECT GENERAL NOTES FOR MAILBOX LOCATION AND INSTALLATION GUIDELINES.

FLOOR PLAN CONSTRUCTION EXPECTATIONS

A. GENERAL CONTRACTOR TO PROVIDE COMPLIANT FIRE EXTINGUISHERS IN OCCUPANCIES AND LOCATIONS AS REQUIRED PER THE INTERNATIONAL FIRE CODE. MOUNTING HEIGHTS TO MEET THE PROVISIONS OF ACCESSIBILITY CODE REQUIREMENTS. CABINET SHALL PROTRUDE NO MORE THAN 4" INTO WALKWAYS, CORRIDORS, PASSAGEWAYS, OR AISLES.
B. ALL WORK SHALL BE ERECTED AND INSTALLED PLUMB, LEVEL, SQUARE AND TRUE AND IN PROPER ALIGNMENT, UNLESS NOTED OTHERWISE.
C. ALL EXPOSED GYPSUM BOARD EDGES TO HAVE VINYL OR METAL EDGE TRIM.
D. ALL GYPSUM BOARD PARTITIONS SHALL BE TAPED AND SANDED SMOOTH WITH NO VISIBLE JOINTS. PROVIDED LEVEL 4 FINISH U.N.O.
E. ALL DIMENSIONS ARE TO FACE OF FRAMING, UNLESS NOTED OTHERWISE
   a. DIMENSIONS NOTED "HOLD" MUST BE ACCURATELY MAINTAINED, AND SHALL NOT VARY MORE THAN +/- 1/8" WITHOUT WRITTEN INSTRUCTION FROM ARCHITECT.
   b. "ALIGN" MEANS TO ACCURATELY LOCATE FINISH FACES IN THE SAME PLANE.
   c. DIMENSIONS NOTED "CLEAR" ARE MINIMUM DIMENSIONS WHICH MUCH BE MAINTAINED WITHOUT EXCEPTION.
   d. DIMENSIONS MARKED +/- MEAN A VARIANCE NOT GREATER THAN 1 INCH. VERIFY DIMENSIONS EXCEEDING TOLERANCES WITH THE ARCHITECT
   e. ALL DIMENSIONS TO THE EXTERIOR WINDOW WALL ARE TO THE FINISH FACE OF WALL BELOW SILL, U.N.O.
F. MOISTURE-RESISTANT GYPSUM WALL BOARD TO BE INSTALLED ON PARTITIONS WITH ENCLOSED PLUMBING, BOTH SIDES. WALLS RECEIVING PORCELAIN OR CERAMIC TILE OR FRP, ENTIRE WALL SHALL RECEIVE MOISTURE-RESISTANT GYPSUM WALL BOARD.
G. METAL STUDS AT PARTITIONS TO RECEIVE TILE ARE TO BE PER TILE MFR AND ACCESSIBILITY CODE TILE GUIDELINES. REFER TO FINISH PLANS FOR TILE LOCATIONS.
H. THE CONTRACTOR SHALL ESTABLISH A SINGLE FLOOR ELEVATION THAT IS TO BE USED TO SET THE TOP OF ALL DOORS SUCH THAT THE TOP OF ALL DOORS OF THE SAME HEIGHT WILL ALIGN REGARDLESS OF VARIATIONS IN THE FLOOR SLAB OR FINISHED FLOOR THICKNESS.
I. THERE SHALL BE NO EXPOSED PIPE, CONDUIT, DUCTS, VENTS ETC. ALL SUCH LINES SHALL BE CONCEALED OR FURRED AND FINISHED, UNLESS OTHERWISE NOTED AS EXPOSED CONSTRUCTION ON THE DRAWINGS.
J. GENERAL CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL BLOCKING FOR ALL WALL AND CEILING MOUNTED ITEMS, INCLUDING HARDWARE, LIGHT FIXTURES, GRAB BARS, CASEWORK, AND ALL TENANT PROVIDED ITEMS. PROVIDE SHEET METAL REINFORCING PER MFR STANDARDS OR 8" HORIZONTALLY MOUNTED STRIP OF 20 GA. GALVANIZED SHEET METAL CONCEALED IN PARTITIONS WHERE WALL OR CEILING MOUNTED ITEM IS INDICATED ON DRAWINGS. ALL CONCEALED LUMBER AND BLOCKING IS TO BE FIRE RETARDENT TREATED.

LEGEND

- XX — COLUMN GRID ID
- 101 — DOOR MARK TAG
- X — WINDOW/STOREFRONT TYPE TAG
- ? TYP — KEY NOTE
- XX-## — SIGNAGE TAG
- WALL TYPE ID / CORE THICKNESS (INCHES)* / FIRE RATING (HOURS) — A1.1 — 4" — WALL TYPE TAG, CODED
  HEIGHT (WHERE HEIGHT IS NOT SPECIFICALLY CALLED OUT ON PLANS, PARTITIONS SHALL BE 8" HIGHER THAN THE CEILING HEIGHT OF THE ROOMS THE PARTITIONS ABUT) (LOW WALLS, EXPOSED/CAPPED TOP)
  * NOMINAL WIDTH FOR WOOD STUDS & MASONRY, NON FRACTIONAL INCHES FOR METAL STUDS.
- INTERIOR PARTITION, REFER TO SHEET A0.01
- 1-HR RATED PARTITION
- CONCRETE WALL PANEL
- INSULATION REFER SPECS

KEYNOTES

1	0529	ADA PUSH BUTTON. PEDESTAL LOCATION TO BE OUTSIDE DOOR SWING WITH 30" X 52" CLEAR SPACE. REFER TO DOOR HARDWARE AND SCHEDULE.
	1001	ELECTRIC WATER HEATER. PROVIDE CONCRETE PAD FOR WATER HEATER AS REQUIRED. REFER TO PLUMBING FOR MORE INFORMATION.
	1002	2' X 2' MOP SINK WITH FRP BEHIND UP TO 4'-0" A.F.F.
	1003	PROVIDE 4' HOSE AT MOP SINK. THREADED FAUCET MOUNTED AT 42" A.F.F. IS REQUIRED FOR HOSE CONNECTION. REFER TO PLUMBING FOR FIXTURE INFORMATION.
	1006	INTERIOR BOLLARD. PAINT SAFETY YELLOW. REFER TO DETAIL 7/A5.03.
	1008	RETURN GYP. BD FINISH TO DOOR/STOREFRONT FRAMING.
	1009	HOSE CLAMP MOUNTED TO WALL ADJACENT TO MOP SINK. MATCH MOP SINK FAUCET HEIGHT.
	1012	50" X 80" AREA FOR SCRUBBER PARKING.
	1013	FULLY BLOCK THIS WALL AT 40-72" A.F.F. TO RECEIVE COAT RACK. REFER TO DETAIL 8/A5.51.
	1014	MILLWORK BY G.C. REFER TO ELEVATIONS & DETAILS FOR ADDITIONAL INFORMATION.
	1015	55" WALL MOUNTED TV. REFER TO ELECTRICAL.
	1016	12'-0" HIGH CAGE & GATE BY GC. (NO CEILING) PROVIDE WIRECRAFTERS, STYLE 840 WOVEN WIRE PARTITIONS AND ENCLOSURES, FENCING AND DOOR; REF DOOR HARDWARE.
1	1020	ELECTRICAL EQUIPMENT WALL MOUNTED. REFER TO ELECTRICAL.
	1025	36" TALL FLEXIBLE DELINEATOR POST, SAFETY YELLOW.
	1028	PROVIDE 6" CONCRETE PAD FOR FIRE PUMP AS NEEDED. GC TO CONFIRM SIZING REQUIREMENTS PER THE FINAL FIRE PUMP SELECTION. GC TO COORDINATE ON SITE WITH FIRE SUB FOR LOCATION.
1	1029	FENCING PARTITION TO BE FASTENED TO CONCRETE WALL PER MANUFACTURER'S INSTRUCTIONS.
	1030	FIRE RETARDANT TREATED PLYWOOD BLOCKING BEHIND WALL-MOUNTED ELECTRICAL EQUIPMENT.
	1501	WATER COOLER LOCATION, REFER TO PLUMBING AND ELECTRICAL DRAWINGS FOR MORE INFORMATION.
	1510	SHELVING. REFER TO OFFICE FURNITURE PLAN.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2366 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

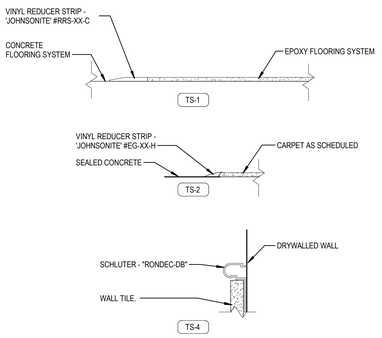
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

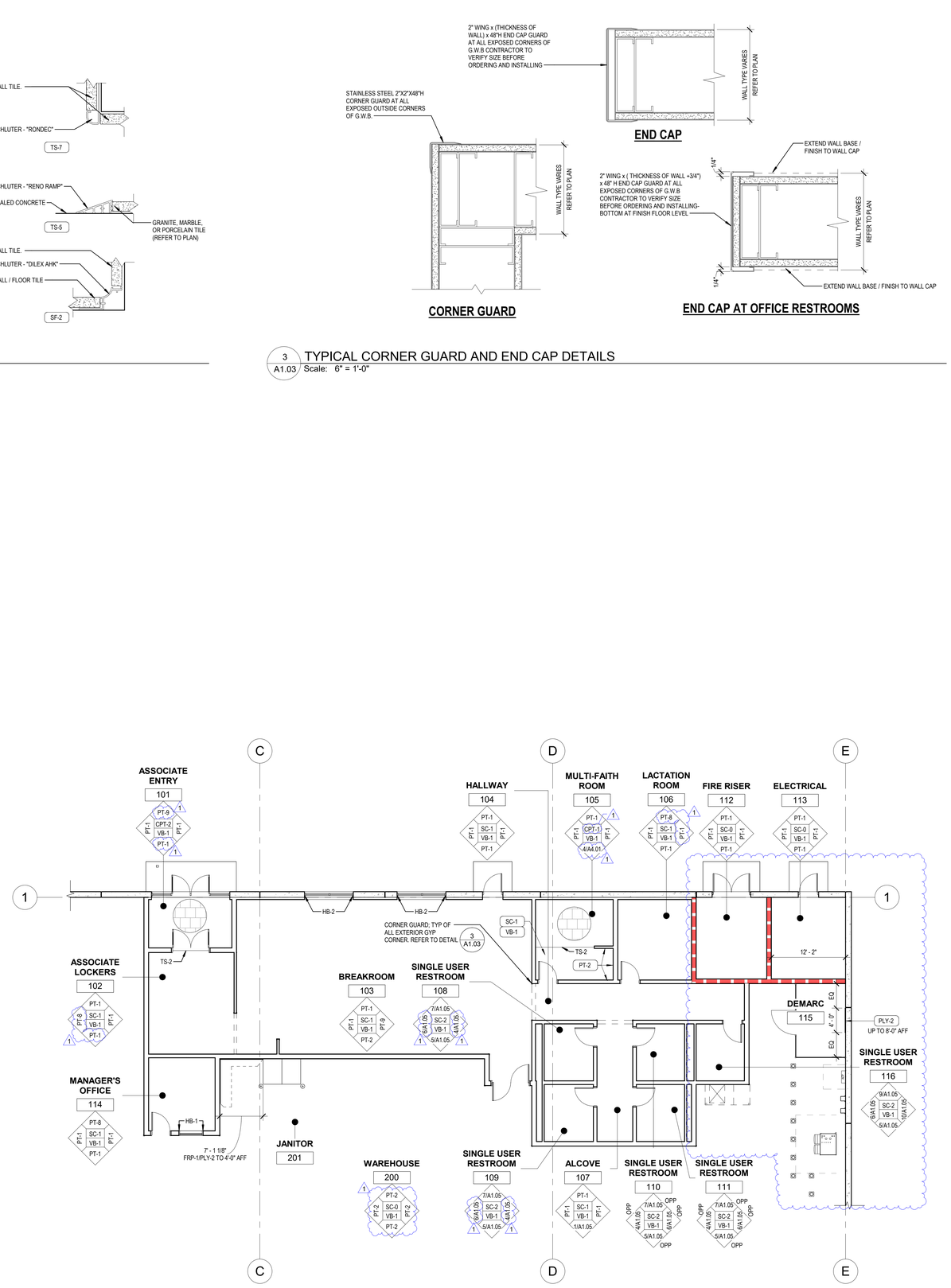
Sheet Title:
ENLARGED OFFICE AND INTERIOR SIGNAGE PLANS

A1.02



4 A1.03 TYPICAL TRANSITION STRIP DETAILS
Scale: 6" = 1'-0"

3 A1.03 TYPICAL CORNER GUARD AND END CAP DETAILS
Scale: 6" = 1'-0"



1 A1.03 OFFICE FINISH PLAN
Scale: 1/8" = 1'-0"

SHEET NOTES

A. REFERENCE FINISH MATERIAL KEY FOR ADDITIONAL INFORMATION
B. PROVIDE CONTINUOUS SEALANT BETWEEN MATERIAL TRANSITIONS. REFERENCE MANUFACTURER FOR TRANSITION STRIPS AS APPLICABLE.
C. PAINT ACCESS PANELS TO MATCH ADJACENT FINISHES. ONCE DRY CONFIRM THAT PAINT DOES NOT INHIBIT THE PROPER OPERATION OF ACCESS PANELS.
D. AT TILE FINISHES, COORDINATE BASE AND GROUT SPACING TO ELIMINATE CUT TILES.
E. PROVIDE CONTINUOUS ALUMINUM TRIM PIECE AT ALL UNFINISHED TILE EDGES AND CORNERS, REFERENCE MANUFACTURER SPECS.
F. PROVIDE WINDOW SHADES (HB-2) AT ALL EXTERIOR ALUMINUM STOREFRONT OPENINGS, U.N.O.
G. PROVIDE WF-1 AT ALL STOREFRONT AND/OR WINDOWS UP TO 12' A.F.F.
H. FLOOR MATERIAL TRANSITIONS AT DOOR OPENINGS ARE TO BE CENTERED BELOW THE DOOR IN THE CLOSED POSITION, U.N.O.
I. PROVIDE 2 1/2" X 2 1/2" X 48" HIGH STAINLESS STEEL CORNER GUARDS AT ALL EXPOSED GYPSUM BOARD CORNERS, TYP. ALL CORNER GUARDS TO BE SET DIRECTLY ABOVE THE FLOOR BASE. PLACEMENTS IDENTIFIED ON PLAN.
J. AT GYPSUM BOARD WALLS FACING THE WAREHOUSE OR STORAGE AREAS PROVIDE LEVEL 4 DRYWALL FINISH WITH PT-2 PAINT TO 12'-0" A.F.F., PROVIDE LEVEL 3 DRYWALL FINISH UNPAINTED ABOVE 12'-0" U.N.O.
K. ALL PLYWOOD TO BE FIRE RETARDANT TREATED.

MATERIAL FINISH KEY NOTES

A	SHALL BE LOCATED ON DEMISING WALLS ONLY
B	WAREHOUSE COLUMNS, SPRINKLER STAND PIPES, INTERIOR SIDE OF WAREHOUSE EXIT DOORS & FRAMES.
C	WAINSCOT IN TOILET ROOM VESTIBULE BEHIND DRINKING FOUNTAIN; REF OTHER SHEET FOR RESTROOM ENTRY ELEVATION
D	WAREHOUSE COLUMNS, BOLLARDS, GUARDS, RAILS, TOE PLATES, FIRE RISER PROTECTION.
E	WATER RESISTANT AT AREAS WITH IN-WALL PLUMBING AND/OR EXPOSED TO MOISTURE.
F	INSULATION, EXPOSED STRUCTURE, FIRE SPRINKLER PIPES AND MECHANICAL EQUIPMENT TO REMAIN UNPAINTED.
G	WINDOW TREATMENTS TO MATCH FRAME COLOR.
H	AT SCRUBBER PARKING, FRP-1 OVER PLY-2 FROM 0'-0" TO 4'-0" A.F.F.
J	ALL GYP. BD WALLS TO HAVE VINYL BASE U.N.O., INCLUDING IN THE WAREHOUSE. NO BASE AT EXPOSED CONCRETE WALLS.
K	REFERENCE TRANSITION DETAILS 4/A1.03
L	PROVIDE ON INTERIOR SIDE OF ALL EXTERIOR GLAZING BELOW 12'-0" A.F.F. THROUGHOUT WAREHOUSE & OFFICE AREA
M	IN WAREHOUSE, PAINT EXPOSED EXTERIOR CONCRETE WALLS AND UNDERSIDE OF METAL DECK PT-2
N	REFERENCE SECTION 033060 - SPECIAL CONCRETE FLOOR FINISHES.
O	REFERENCE SECTION 033061 - SEALED CONCRETE FLOOR FINISHES.
P	PROVIDE WATERPROOF AND CRACK ISOLATION MEMBRANES AT FLOOR AND WALL INSTALLATIONS

MATERIAL FINISH KEY

CODE	BASIS OF DESIGN	DESCRIPTION	FINISH NOTES
ACOUSTICAL CEILING TILE - ACT			
ACT-1	ARMSTRONG	SUSPENDED CEILING SYSTEM, 24" X 48"; CORTEGA MINABOARD #769. WHITE GRID AND TILE	
CARPET - CPT			
CPT-1	BENTLEY	18X36, STYLE: DRUMLINE #4DMT4, COLOR: FIGHT SONG #404322 WITH AFIRMA II HARDBACK BACKING, PATTERN: BRICK	
CPT-2	MATWORKS	19.5X19.5, STYLE: DIAMOND TILE, COLOR: CHARCOAL, PATTERN: RUNNING BOND	
CERAMIC TILE - CT			
CT-1	EMSER	4" X 10" WALL TILE FLEX, WHITE #F50FLEXWH0410M, GROUT: MAPEI #47 CHARCOAL, MATTE FINISH, TILE PATTERN: RUNNING BOND	REFER TO ELEVATIONS
CT-3	EMSER	12" X 24" FLOOR TILE, STYLE: CITIZEN, COLOR: PUBLIC #F26CITIPU1224M, GROUT: MAPEI #47, FINISH: MATTE, PATTERN: RUNNING BOND	
CT-4	EMSER	6" X 12" COVE BASE TILE, CITIZEN, PUBLIC #SNRCITIPU0612CBM, MATTE	
EPOXY FLOOR COATING - EPX			
EPX-1	DUR-A-FLEX	DUR-A-QUARTZ SYSTEM, TOP COAT: 100% SOLIDS DUR-A-GLAZE TOP COAT #4 ARMOR TOP GLOSS W/ GRIT, COLOR: Q28-22	
EXTERIOR PAINT - EPT			
EPT-1	BENJAMIN MOORE	#2121-70 'CHANTILLY LACE';	REFER TO EXTERIOR ELEVATION SHEET
EPT-2	SHERWIN WILLIAMS	#SW7650 'ELLIE GRAY';	REFER TO EXTERIOR ELEVATION SHEET
EPT-3		TENANT BLUE TO MATCH PANTONE 2727C	REFER TO EXTERIOR ELEVATION SHEET
FRP WALL PANEL - FRP			
FRP-1	CRANE	GLASBORD, #85 'WHITE', SMOOTH, INCLUDING ALL MOLDINGS & TRIM, CLASS A	C, H
GYPSUM BOARD - GYP			
GYP-1		5/8" GYPSUM BOARD, PAINTED PT-1	
INTERIOR PAINT - PT			
PT-1	BENJAMIN MOORE	#2121-70 'CHANTILLY LACE'; FINISH: EGGSHELL	GENERAL PARTITION WALL COLOR
PT-2	BENJAMIN MOORE	#2121-70 'CHANTILLY LACE'; TYPE: EPOXY, FINISH: SEMI-GLOSS	
PT-3	BENJAMIN MOORE	SAFETY YELLOW; TYPE: EPOXY, FINISH: SEMI-GLOSS	D
PT-4	BENJAMIN MOORE	SAFETY RED; TYPE: EPOXY, FINISH: SEMI-GLOSS	B
PT-5	SHERWIN WILLIAMS	SW 7757 HIGH REFLECTIVE WHITE; TYPE: EPOXY, FINISH: SEMI-GLOSS	D
PT-7	SHERWIN WILLIAMS	#SW7650 'ELLIE GRAY'; TYPE: EPOXY, FINISH: SEMI-GLOSS	
PT-8	SHERWIN WILLIAMS	#SW7650 'ELLIE GRAY'; FINISH: EGGSHELL	
PT-9	BENJAMIN MOORE / SHERWIN WILLIAMS	RGB 0, 168, 255 "TENANT BLUE"; FINISH: EGGSHELL	
PLASTIC LAMINATE - PL			
PL-1	WILSONART	#7981K-12 'LANDMARK WOOD', FINISH: SOFT GRAIN	
PL-2	FORMICA	#912-58 'STORM', FINISH: MATTE	
PL-3	FORMICA	#7022-58 'NATURAL CANVAS', FINISH: MATTE	
PLYWOOD - PLY			
PLY-1		1/4" PLYWOOD	E
PLY-2		1/2" PLYWOOD	E, H
PLY-3		3/4" PLYWOOD	E
SEALED CONCRETE - SC			
SC-0		NON-SEALED CONCRETE	1
SC-1		SEALED CONCRETE - DENSIFIER	N
SC-2		SEALED CONCRETE - SEALER	O
SOLID SURFACE COUNTERTOP - SS			
SS-1	CORIAN	COLOR - 'SILVER BIRCH'	
SS-2	CORIAN	COLOR - 'VENARO WHITE'	
SPECIAL FINISHES - SF			
SF-1		6" X 1/4" MDF, PAINTED PT-1. PATTERN: HORIZONTAL SHIPLAP	
SF-2	SCHLUTER	SCHLUTER-DILEX-AHK, SATIN ANODIZED	K
TRANSITION STRIPS - TS			
TS-1	JOHNSONITE	RRS-XX-C, #20 'CHARCOAL' (REDUCERS); TRANSITION 1/8" THICK MATERIAL TO CONCRETE	K
TS-2	JOHNSONITE	EG-XX-H, #20 'CHARCOAL' (EDGE GUARDS); SATIN ANODIZED ALUMINUM (AE), TRANSITION BETWEEN 5/16" MATERIAL TO CONCRETE	K
TS-4	SCHLUTER	RONDEC-DB; TRANSITION BETWEEN WALL TILE AND GYP WALL IN SATIN ANODIZED ALUMINUM (AE). INCLUDE DILEX-EHK IN SAME COLOR AS REQUIRED FOR ALL CORNERS	K
TS-5	SCHLUTER	RENO-RAMP; TRANSITION BETWEEN CONCRETE AND FLOOR CERAMIC TILE IN SATIN ANODIZED ALUMINUM (AE)	K
TS-7	SCHLUTER	RONDEC; TRANSITION BETWEEN WALL TILES AT OUTSIDE CORNERS; IN SATIN ANODIZED ALUMINUM (AE).	K
VINYL BASE - VB			
VB-1	JOHNSONITE	4" COVE BASE #32 'PEBBLE', 1/8" THICKNESS	J
WINDOW FILM - WF			
WF-1	SOLYX	SOLYX SXR 8785, SAFETY SANDBLAST	L
WINDOW TREATMENT - HB			
HB-1	HUNTER DOUGLAS ARCHITECTURAL	CUSTOM VERTICAL BLIND; INSIDE MOUNT; COLOR - GRAY/BLACK, WAND COLOR - WHITE; VALANCE STYLE - DESIGNLINE; VANE STYLE - FABRIC; CORDLESS WAND OPERATION; ROOM DARKENING LIGHT CONTROL; CONTACT: HUNTERDOUGLASARCHITECTURAL.COM 800-727-8953	G; OCCURS WHERE NOTED ON PLANS
HB-2	HUNTER DOUGLAS ARCHITECTURAL	RB BASICS SOLAR SHADES – WITH FASCIA, INSIDE MOUNT, LIFT CONTROL – CORD LOOP. FABRIC – LV CLASSICS 1% COLOR: CHARCOAL/GRAY HUNTERDOUGLASARCHITECTURAL.COM 800-727-8953	

LEGEND

WALL / FLOOR BASE / TYP. — ROOM FINISH TAG

FLOORING INSTALL DIRECTION

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FINISH PLAN AND SCHEDULE

A1.03

SHEET NOTES

A. REFERENCE EQUIPMENT SCHEDULES FOR ADDITIONAL INFORMATION.
B. REFERENCE EQUIPMENT DETAILS AND INTERIOR ELEVATION SHEETS FOR EQUIPMENT MOUNTING HEIGHTS AND GENERAL SHEETS FOR ACCESSIBILITY NOTES.

FURNITURE LEGEND

XX — FURNITURE, FIXTURE, EQUIPMENT TAG

PLUMBING FIXTURE SCHEDULE

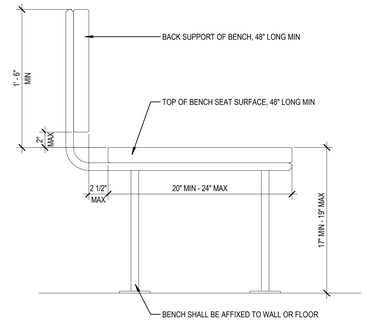
CODE	QTY	DESCRIPTION
	NOTE: GC TO FURNISH AND INSTALL ALL FIXTURES. REF MEP FOR FIXTURE INFORMATION	
P-1	1 (5)	WALL MOUNTED TOILET
P-3B	1	DRINKING FOUNTAIN (HI-LO PAIR)
P-4B	1 (5)	SINK (SINGLE USER RESTROOM)
P-5A	1	SINK (1 BASIN)
P-5B	1	SINK (2 BASIN)
P-6	1	SERVICE HOSE AND HOSE HOLDER; E.L. MUSTEE, MODEL 65.700
P-8	1	WUDUMATE COMPACT
P-11	1	MOP BASIN

EQUIPMENT SCHEDULE

CODE	QTY	SUPPLIED BY	ITEM	COMMENTS
E-4A	3	TEN	WALL MOUNTED TV - 55"	REF BLOCKING ELEVATION
E-5	4	TEN	MICROWAVE	
E-6	1	TEN	ICE MACHINE	HOSHIZAKI DCM-500B_H
E-8	2	TEN	COFFEE MAKER	NEWCO LCD2
E-9	1	TEN	SODA STREAM	
E-13	2	TEN	SNACK MACHINE - LARGE	
E-16	1	TEN	2.6 CUBIC FEET REFRIGERATOR	DANBY 2.6 CU FT, 18"W X 21"D X 27"H
E-18	1	TEN	WARDROBE LOCKER	BLACK WARDROBE LOCKER, 12"W X 18"D X 76"H
E-19	3	TEN	BAKERS RACK	
E-20	2	TEN	TIME CLOCK	(2) AT 56" AFF TO CENTER OF BOX (1) AT 42" AFF TO THE TOP OF BOX
E-21	4	TEN	TRASH CAN	PROVIDE IN M-IT AND WHERE NOTED
E-22	3	GC	PAPER TOWEL DISPENSER	GRAINGER 2X6H5, ENMOTION
E-23	3	GC	SOAP DISPENSER	GRAINGER IPKP8
E-26	1	TEN	REFRIGERATOR	
E-27	1	GC	ACCESSIBLE GRAB BAR - 18"	
E-28	2	TEN	WALL CLOCK	INFINITY INSTRUMENTS METRO WALL CLOCK (9" DIAMETER)

FURNITURE SCHEDULE

CODE	QTY	SUPPLIED BY	DESCRIPTION	COMMENTS
F-1A	44	TEN	CHAIR - BREAK ROOM	
F-1B	3	TEN	CHAIR - TASK CHAIR	
F-2F	11	TEN	TABLE - BREAKROOM (30" x 60")	
F-3B	1	TEN	DESK - OFFICE	
F-4B	7	TEN	LOCKERS 3 WIDE X 6 TALL (12X12X12")	
F-6	1	TEN	CHAIR - LACTATION ROOM	
F-7	1	TEN	TABLE - LACTATION ROOM	
F-10	1	TEN	29" H FILE CABINET	
F-12	1	TEN	ABLUTION SHOE RACK	
F-16	1	TEN	FULL LENGTH MIRROR	
F-17	1	TEN	ACCESSIBLE BENCH; REF DETAIL THIS SHEET	



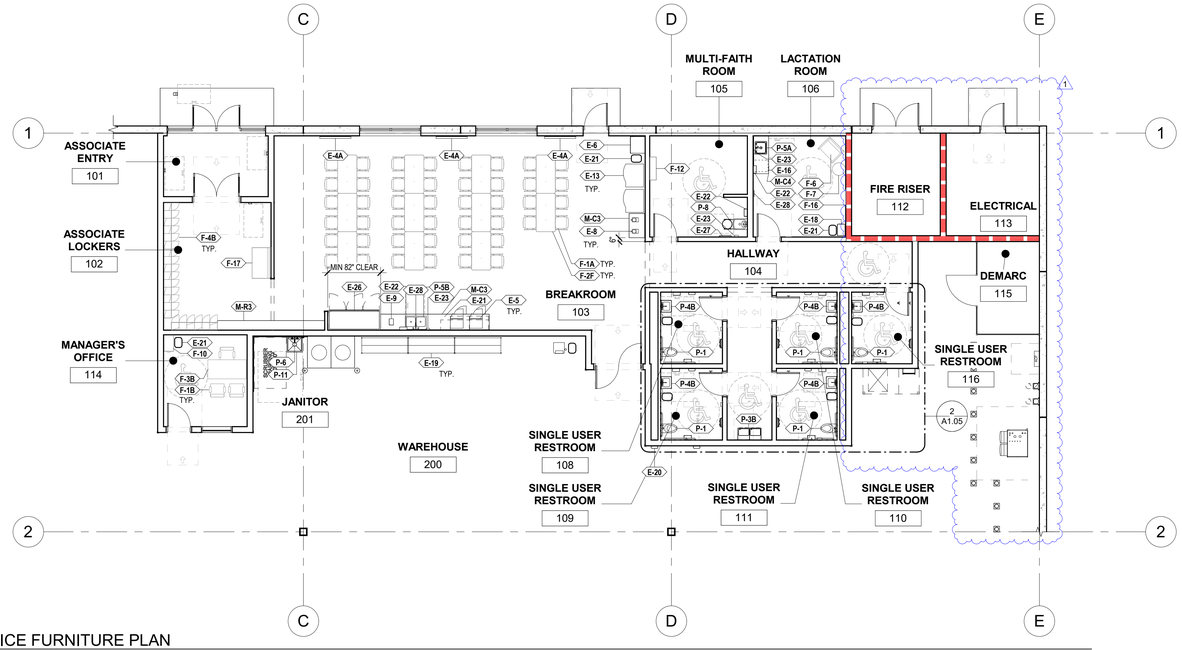
2 / A1.04 ACCESSIBLE BENCH SECTION
Scale: 1 1/2" = 1'-0"

MILLWORK SCHEDULE

CODE	QTY	ITEM	COMMENTS
M-B4	1	PLASTIC LAMINATE PLUMBING GUARD (PL-1)	
M-B5	1	LACTATION ROOM BASE CABINET - ACCESSIBLE SINK	
M-B8	1	BASE CABINET	
M-B9	1	BASE CABINET - DRAWER	
M-BM	2	BASE CABINET - MICROWAVE	
M-C3	2	COUNTERTOP - BREAKROOM	WIDTH VARIES, REF PLANS
M-C4	1	COUNTERTOP - LACTATION ROOM	
M-IB	1	BASE CABINET - DRAWER	
M-IT	1	BASE CABINET - TRASH	
M-O2	1	OVERHEAD CABINET	
M-OM	2	OVERHEAD - MICROWAVE CABINET	
M-R3	1	COAT RACK	

MILLWORK NOTES

A. BASE CABINETS DEFAULT DEPTH TO BE 2'-0", UNO.
B. OVERHEAD CABINETS DEFAULT DEPTH TO BE 1'-4", UNO.
C. REFERENCE DETAILS ON SHEET A5.51



1 / A1.04 OFFICE FURNITURE PLAN
Scale: 1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OFFICE FURNITURE PLAN

A1.04

TOILET ACCESSORY SCHEDULE

CODE	QTY	DESCRIPTION	MODEL
TA 01	5	SOAP DISPENSER	GRAINGER 1PKP8
TA 02	6	CLOTHES HOOK W/ BUMBER	BOBRICK B-212
TA 03	6	TOILET SEAT COVER DISPENSER	GRAINGER 22LC68
TA 04	5	SANITARY NAPKIN RECEPTACLE	GRAINGER 1ECK9
TA 05	5	SEMI-RECESSED SANITARY PRODUCT DISPENSER	BOBRICK B-4706AC
TA 06	5	ACCESSIBLE GRAB BAR - 48"	B-6806.99X48
TA 07	5	ACCESSIBLE GRAB BAR - 36"	B-6806.99X36
TA 09	5	MIRROR	BOBRICK B-290-18X36
TA 12	5	PAPER TOWEL DISPENSER	GRAINGER 2XLH5 ENMOTION
TA 13	5	ACCESSIBLE VERT. GRAB BAR - 18"	BOBRICK B-6806.99X18
TA 14	5	TOILET PAPER DISPENSER	GRAINGER 1FC63
TA 16	5	TRASH CAN	GRAINGER 1971258, GRAY, PLASTIC
TA 17	5	SANITIZER DISPENSER	GRAINGER 1PKP8
TA 18	5	SHARPS CONTAINER	STERICYCLE SKU MBBRKTLC

LEGEND

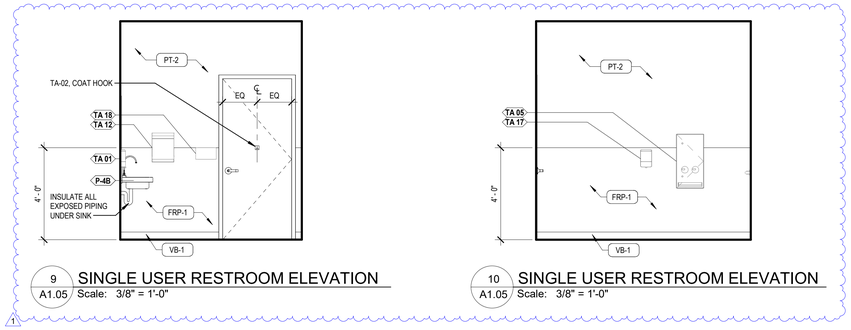
- 2'x4' LENSED RECESSED LED TROFFER W/ SHALLOW HOUSING. DIAGONAL HATCH REPRESENTS EMERGENCY LIGHTING
- LED DOWNLIGHT
- EMERGENCY EXIT SIGN (CENTERED ABOVE DOOR)
- 2'x2' CEILING RETURN AIR GRILLE
- 101 — DOOR MARK TAG
- XX — FURNITURE, FIXTURE, EQUIPMENT TAG
- XX.## — FINISH TAG
- 2'x4' ACOUSTIC CEILING (REFER TO RCP FOR HEIGHT)
- 5/8" GYPSUM BOARD CEILING OR SOFFIT (REFER TO RCP FOR HEIGHT)
- PROVIDE 6 1/4" "SONOBAT" INSULATION AT LOCATIONS SHOWN ON RCP
- 2'x2' SUPPLY AIR DIFFUSER
- 2'x2' CEILING EXHAUST GRILLE
- WALL TYPE ID
  CORE THICKNESS (INCHES)*
  FIRE RATING (HOURS)
  A3.1 — WALL TYPE TAG, CODED
  4"
  HEIGHT (WHERE HEIGHT IS NOT SPECIFICALLY CALLED OUT ON PLANS, PARTITIONS SHALL BE 9" HIGHER THAN THE CEILING HEIGHT OF THE ROOMS THE PARTITIONS ABUT) (LOW WALLS, EXPOSED/CAPPED TOP)
  * NOMINAL WIDTH FOR WOOD STUDS & MASONRY, NON FRACTIONAL INCHES FOR METAL STUDS.

RESTROOM SHEET NOTES

A. REFERENCE PARTITION DETAIL SHEETS FOR ADDITIONAL CONSTRUCTION INFORMATION.
B. REFERENCE FURNITURE PLAN SHEET FOR MILLWORK & PLUMBING SCHEDULES.
C. REFERENCE STRUCTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION.
D. REFERENCE GENERAL SHEET AND SIGNAGE AND GRAPHICS SHEETS FOR ADDITIONAL SIGNAGE INFORMATION.
E. REFERENCE FINISH PLAN AND SCHEDULE FOR INTERIOR FINISHES
F. REFERENCE DOOR TYPES AND SCHEDULES SHEET FOR ADDITIONAL INFORMATION.
G. FOR ACCESSIBLE CLEARANCES NOT INDICATED, REFER TO NOTES AND DETAILS ON GENERAL SHEETS.
H. GC TO PROVIDE BLOCKING AS REQUIRED AT SINKS, EQUIPMENT, GRAB BARS, AND FIXTURES PER MANUFACTURER'S RECOMMENDATIONS.
I. MOUNT ACCESSORIES IN COMPLIANCE WITH LOCALLY ADOPTED ACCESSIBILITY CODE REQUIREMENTS. REFER TO GENERAL INFORMATION AND SIGNAGE SHEETS.
J. INSTALL GYPSUM WALLBOARD CONTROL JOINTS EVERY 30'-0" PER PARTITION SHEET.
K. REFERENCE STRUCTURAL PLANS FOR CONCRETE SLAB CONTROL JOINT INFORMATION.
L. REFERENCE EXTERIOR ELEVATION SHEET FOR EXTERIOR CONTROL JOINTS.
M. REFERENCE SHEET **G1.02** FOR ACCESSIBILITY CODE CLEARANCES.
N. DIMENSIONS TO PLUMBING FIXTURES ARE FROM FINISH FACE OF WALL.

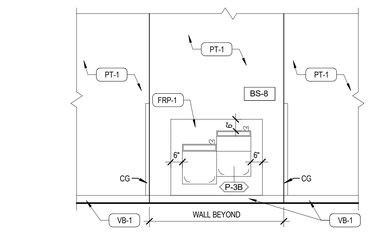
RESTROOM GENERAL NOTES

A. REFERENCE THIS SHEET FOR ACCESSORY SCHEDULE.
B. REFERENCE GENERAL SHEETS AND RESTROOM DETAIL SHEET FOR TYPICAL MOUNTING DETAILS AND CLEARANCES THAT MAY NOT BE SHOWN.
C. PROVIDE 5/8" WATER RESISTANT GYPSUM BOARD ON INSIDE FACE OF NEW RESTROOM WALLS AT PLUMBING FIXTURE LOCATIONS.
D. RESTROOM SIGNS BY GC SHALL COMPLY WITH ADOPTED ACCESSIBILITY CODE AS REFERENCED ON CODE ANALYSIS SHEET; REFER ALSO TO GENERAL INFORMATION SHEETS.
E. ALL RESTROOM ACCESSORIES AND PLUMBING FIXTURES SHALL BE MOUNTED IN ACCORDANCE WITH ADOPTED ACCESSIBILITY CODE; REFER ALSO TO GENERAL INFORMATION SHEETS.
F. PROVIDE PROTECTIVE INSULATION WHICH SHALL COMPLY WITH ADOPTED ACCESSIBILITY CODE AT ALL ACCESSIBLE LAVATORIES WITH EXPOSED PIPING
G. WATER CLOSETS AND URINAL FLUSH CONTROLS SHALL COMPLY WITH ADOPTED ACCESSIBILITY CODE. CONTROLS FOR FLUSH VALVES SHALL BE MOUNTED ON THE WIDE SIDE OF THE TOILET AREAS AT HEIGHT INDICATED BY LOCALLY ADOPTED ACCESSIBILITY CODE.
H. ACCESSIBLE URINALS SHALL BE WALL HUNG WITH AN ELONGATED RIM AT HEIGHT NOTED ON **G1.02** DETAILS AND SHALL COMPLY WITH ADOPTED ACCESSIBILITY CODE .
I. ACCESSIBLE TOILET STALL DOORS SHALL PROVIDE 32" CLEAR, UNOBSTRUCTED OPENING, SHALL BE SELF-CLOSING AND SHALL BE EQUIPPED WITH GRASPABLE PULL ON BOTH SIDES. STALLS SHALL COMPLY WITH ADOPTED ACCESSIBILITY CODE.
J. G.C. TO COORDINATE WITH TENANT BEFORE PURCHASING ANY RESTROOM ACCESSORIES.
K. RESTROOM PLUMBING FIXTURES NOTED WITH THE INTERNATIONAL SYMBOL OF ACCESSIBILITY SHALL BE ACCESSIBLE. REFER TO SHEET **G1.02** AND PLUMBING FIXTURE SCHEDULE FOR ADDITIONAL INFORMATION.

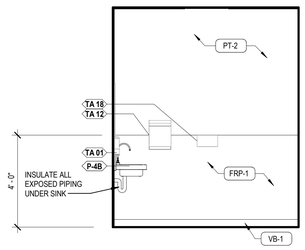


9 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"

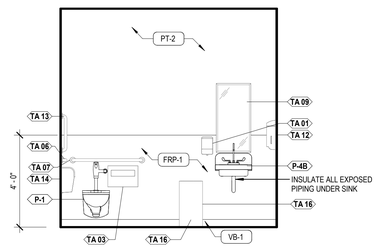
10 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"



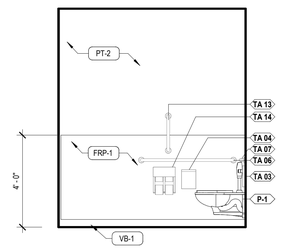
8 A1.05 RESTROOM ALCOVE ENTRY ELEVATION (TYP)
Scale: 3/8" = 1'-0"



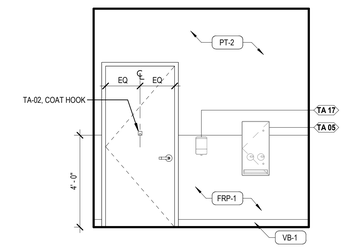
7 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"



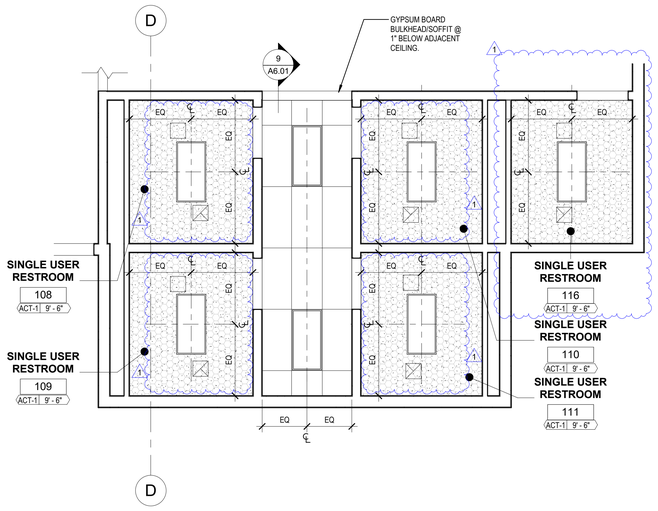
6 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"



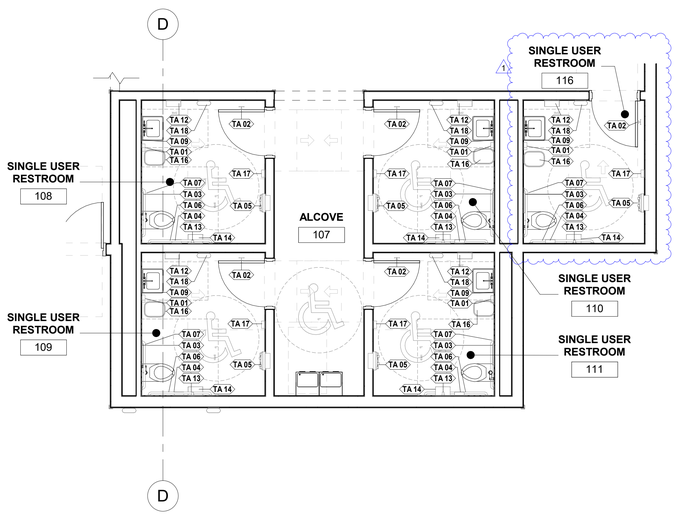
5 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"



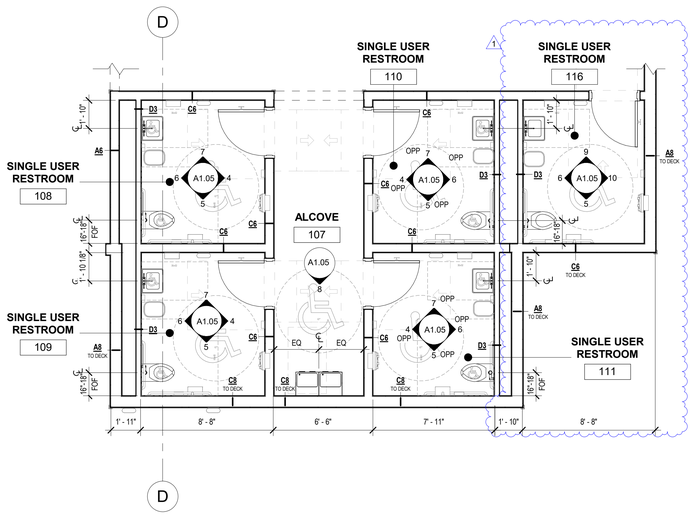
4 A1.05 SINGLE USER RESTROOM ELEVATION
Scale: 3/8" = 1'-0"



3 A1.05 ENLARGED RESTROOM REFLECTED CEILING PLAN
Scale: 1/4" = 1'-0"



2 A1.05 ENLARGED RESTROOM ACCESSORIES PLAN
Scale: 1/4" = 1'-0"



1 A1.05 ENLARGED USER RESTROOM PLAN
Scale: 1/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

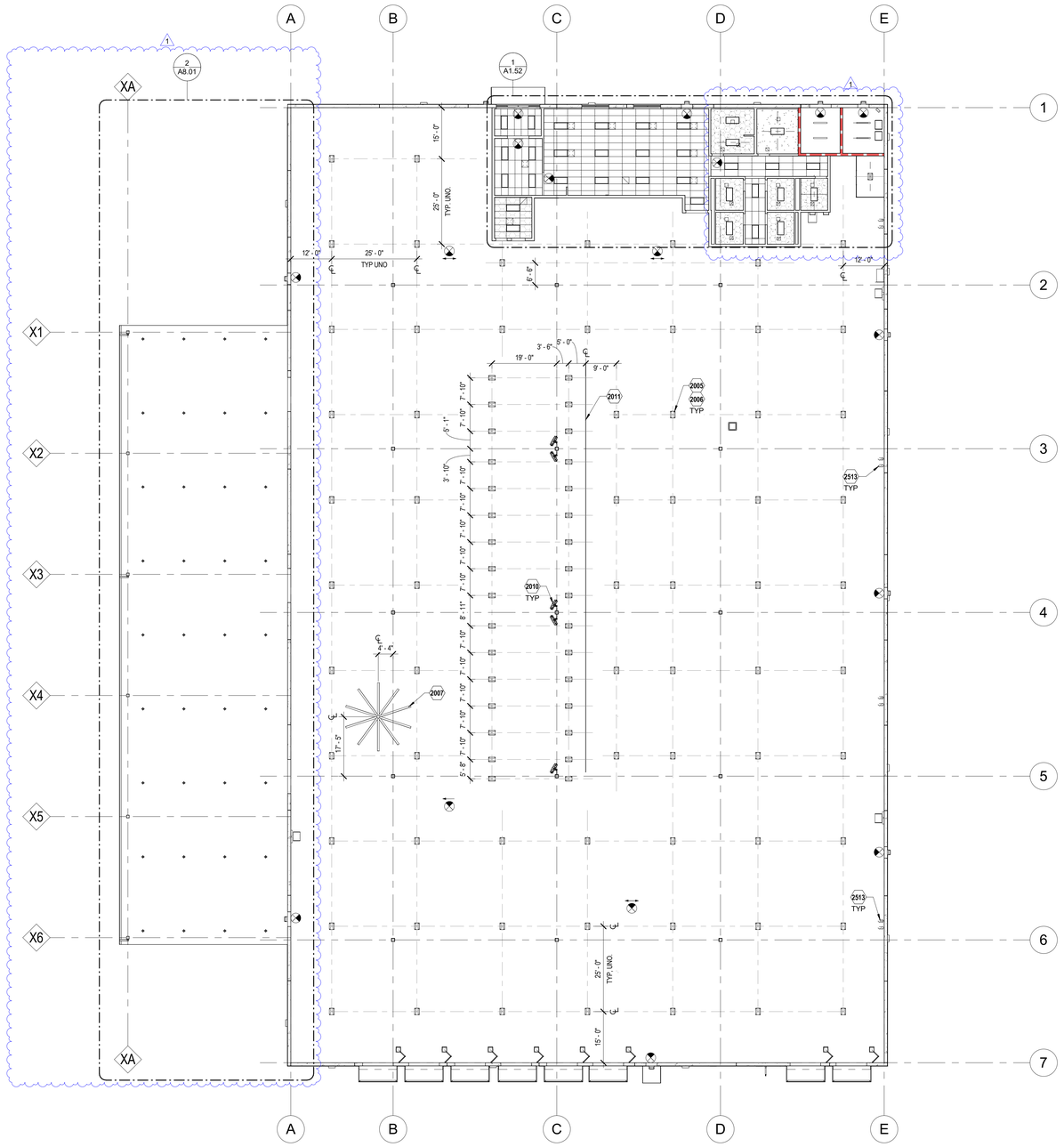
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ENLARGED RESTROOM PLANS AND RESTROOM ELEVATIONS

A1.05



1 A1.51 OVERALL REFLECTED CEILING PLAN
Scale: 1/16" = 1'-0"

SHEET NOTES

A. ARCHITECTURAL REFLECTED CEILING PLAN IS FOR CEILING CONSTRUCTION AND LIGHTING LAYOUT ONLY. REFERENCE MEP AND SPECS FOR HVAC AND FIXTURE TYPES.
B. GC, WITH FIRE MARSHALS DIRECTION, WILL DETERMINE IF ANY ADDITIONAL LIGHTED EMERGENCY EXIT SIGNAGE IS NEEDED. GC TO INSTALL IF ADDITIONAL SIGNAGE IS REQUIRED.
C. GC TO COORDINATE WITH ALL OTHER TRADES TO MINIMIZE UTILITY CONFLICTS AND TO ENSURE COMPLIANCE WITH ALL FIRE MARSHAL REQUIREMENTS AND LIGHTING LEVEL REQUIREMENTS.
D. REFER TO FLOOR PLANS FOR WALL CONSTRUCTION, DIMENSIONS, AND LOCATIONS.
E. REFER TO CEILING DETAILS ON SHEET **A0.03**
F. ALL CEILING OPEN TO STRUCTURE TO REMAIN UNPAINTED, U.N.O.
G. ALL UNDIMENSIONED ACT CEILING GRIDS SHOULD BE CENTERED IN ROOM, U.N.O.
H. DIMENSIONS SHOWN TO/FROM FINISH FACE OF WALLS OR CENTERLINE OF GRID U.N.O.
I. ALL DIMENSIONS ARE TO CENTER OF LIGHT FIXTURE, U.N.O.
J. FOR FRAMED CEILINGS, REFER TO JOIST PLANS FOR ADDITIONAL INFORMATION.
K. PROVIDE ACCESS PANELS IN GYP CEILINGS AS REQUIRED TO ACCESS EQUIPMENT ABOVE, REFERENCE SPECS. PAINT ACCESS PANELS TO MATCH ADJACENT FINISHES. ONCE DRY, CONFIRM THAT PAINT DOES NOT INHIBIT THE PROPER OPERATION OF ACCESS PANELS.
L. REFER TO PARTITION SHEET AND DETAILS FOR ADDITIONAL INFORMATION.
M. DRYWALL TO EXTEND 6" ABOVE A.C.T. CEILING U.N.O.
N. NO PERMANENT SUSPENDED LOADS ARE TO BE SUPPORTED BY METAL DECK, UNLESS NOTED OTHERWISE. INCLUDING BUT NOT LIMITED TO EQUIPMENT, FIXTURES, ETC.
O. REFER TO ARCHITECTURAL CEILING PLANS FOR LAYOUTS OF CEILING INSTALLED EQUIPMENT, LIGHTS, AND GRILLES. COORDINATE ITEMS WITH MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION.
P. COORDINATE CEILING FRAMING WITH WALL FRAMING AND WALL HEIGHTS. REFER TO SHEET A0.03 FOR CEILING FRAMING DETAILS AND CEILING BRACING.
Q. GYPSUM BOARD CEILING FRAMING TO BE 800S162-43 GA CEILING JOISTS @ 16" O.C. AT 9'-6" AFF. TYP. UNLESS NOTED OTHERWISE. SUPPORT JOIST WITH 16 GA U-CHANNEL BRIDGING AT TOP AND BOTTOM FLANGE AT 5'-0" O.C. (TOP FLANGE ONLY WHERE BOTTOM FLANGE IS FULLY SHEATHED). FASTEN AT END WALLS TO STUD WITH (3) #10 TEK SCREWS AND AT EACH JOIST WITH (1) #10 TEK SCREW. PROVIDE BLOCKING STUDS AT ENDS AND 10'-0" O.C.

LEGEND

- 2'x4' LENSED RECESSED LED TROFFER W/ SHALLOW HOUSING. DIAGONAL HATCH REPRESENTS EMERGENCY LIGHTING
- HIGH BAY LIGHTING FIXTURES. REFER TO ELECTRICAL DRAWINGS.
- LED DOWNLIGHT
- 4' LINEAR LED FLANGED EXTRUSION FIXTURE
- EMERGENCY EXIT SIGN (CENTERED ABOVE DOOR)
- 2'x4' ACOUSTIC CEILING (REFER TO RCP FOR HEIGHT)
- 5/8" GYPSUM BOARD CEILING OR SOFFIT (REFER TO RCP FOR HEIGHT)
- PROVIDE 6 1/4" "SONOBAT" INSULATION AT LOCATIONS SHOWN ON RCP
- 2'x2' SUPPLY AIR DIFFUSER
- 2'x2' CEILING EXHAUST GRILLE
- 2'x2' CEILING RETURN AIR GRILLE

STEEL FINISH NOTES

A. STEEL JOISTS ARE TO BE SHOP PRIMED MFR STANDARD GRAY. DO NOT GALVANIZE.
B. UNDERSIDE OF METAL DECK TO BE SHOP PRIMED MFR STANDARD GRAY. DO NOT GALVANIZE.
C. COLUMNS TO BE PAINTED PER DETAIL **7 / xG1.10**

KEYNOTES

2005 HIGH BAY LIGHTING FIXTURES. REFER TO ELECTRICAL DRAWINGS.
2006 MOUNTING HEIGHT OF WAREHOUSE LIGHTS AT 23'-0" A.F.F. TYP.
2007 (HVLS) HIGH VOLUME LOW SPEED FAN. FANS TO BE SUPPLIED AND MOUNTED BY FAN INSTALLER/VENDOR. REFER TO MECHANICAL, ELECTRICAL, AND STRUCTURAL DRAWINGS FOR ADDITIONAL INFORMATION. COORDIANTE FAN AND LIGHT PLACEMENT SO THAT NO LIGHTING OR OTHER OBJECTS ARE WITHIN 2'-0" OF FAN BLADE CIRCUMFERENCE.
1 2010 COLUMN-MOUNTED FAN. REFER TO MECHANICAL AND ELECTRICAL DRAWINGS.
2011 UNISTRUT AT 12'-0" AFF IN LOCATION AND LENGTH SHOWN FOR STOW-BY-LIGHT SYSTEM. REF ELECTRICAL DRAWINGS FOR MORE INFORMATION.
2513 PRIMARY AND OVERFLOW ROOF DRAIN LEADERS (8" "COORDINATE WITH PLUMBING") - REFER TO PLUMBING DRAWINGS. PROVIDE BENT PLATE PROTECTORS - SEE DETAIL 5/A5.03.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OVERALL REFLECTED CEILING PLAN

A1.51

SHEET NOTES

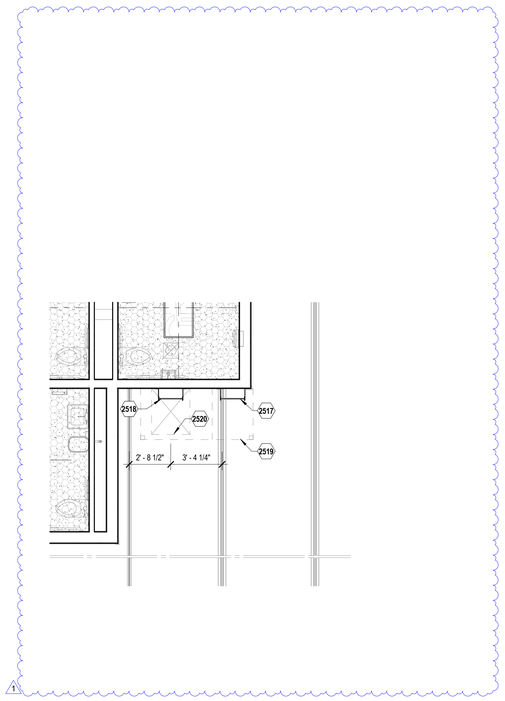
A. ARCHITECTURAL REFLECTED CEILING PLAN IS FOR CEILING CONSTRUCTION AND LIGHTING LAYOUT ONLY. REFERENCE MEP AND SPECS FOR HVAC AND FIXTURE TYPES.
B. GC, WITH FIRE MARSHAL'S DIRECTION, WILL DETERMINE IF ANY ADDITIONAL LIGHTED EMERGENCY EXIT SIGNAGE IS NEEDED. GC TO INSTALL IF ADDITIONAL SIGNAGE IS REQUIRED.
C. GC TO COORDINATE WITH ALL OTHER TRADES TO MINIMIZE UTILITY CONFLICTS AND TO ENSURE COMPLIANCE WITH ALL FIRE MARSHAL REQUIREMENTS AND LIGHTING LEVEL REQUIREMENTS.
D. REFER TO FLOOR PLANS FOR WALL CONSTRUCTION, DIMENSIONS, AND LOCATIONS.
E. REFER TO CEILING DETAILS ON SHEET **A0.03**
F. ALL CEILING OPEN TO STRUCTURE TO REMAIN UNPAINTED, U.N.O.
G. ALL UNDIMENSIONED ACT CEILING GRIDS SHOULD BE CENTERED IN ROOM, U.N.O.
H. DIMENSIONS SHOWN TO/FROM FINISH FACE OF WALLS OR CENTERLINE OF GRID U.N.O.
I. ALL DIMENSIONS ARE TO CENTER OF LIGHT FIXTURE, U.N.O.
J. FOR FRAMED CEILINGS, REFER TO JOIST PLANS FOR ADDITIONAL INFORMATION.
K. PROVIDE ACCESS PANELS IN GYP CEILINGS AS REQUIRED TO ACCESS EQUIPMENT ABOVE, REFERENCE SPECS. PAINT ACCESS PANELS TO MATCH ADJACENT FINISHES. ONCE DRY, CONFIRM THAT PAINT DOES NOT INHIBIT THE PROPER OPERATION OF ACCESS PANELS.
L. REFER TO PARTITION SHEET AND DETAILS FOR ADDITIONAL INFORMATION.
M. DRYWALL TO EXTEND 6" ABOVE A.C.T. CEILING U.N.O.
N. NO PERMANENT SUSPENDED LOADS ARE TO BE SUPPORTED BY METAL DECK, UNLESS NOTED OTHERWISE. INCLUDING BUT NOT LIMITED TO EQUIPMENT, FIXTURES, ETC.
O. REFER TO ARCHITECTURAL CEILING PLANS FOR LAYOUTS OF CEILING INSTALLED EQUIPMENT, LIGHTS, AND GRILLES. COORDINATE ITEMS WITH MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION.
P. COORDINATE CEILING FRAMING WITH WALL FRAMING AND WALL HEIGHTS. REFER TO SHEET A0.03 FOR CEILING FRAMING DETAILS AND CEILING BRACING.
Q. GYPSUM BOARD CEILING FRAMING TO BE 800S162-43 GA CEILING JOISTS @ 16" O.C. AT 9'-6" AFF. TYP. UNLESS NOTED OTHERWISE. SUPPORT JOIST WITH 16 GA U-CHANNEL BRIDGING AT TOP AND BOTTOM FLANGE AT 5'-0" O.C. (TOP FLANGE ONLY WHERE BOTTOM FLANGE IS FULLY SHEATHED). FASTEN AT END WALLS TO STUD WITH (3) #10 TEK SCREWS AND AT EACH JOIST WITH (1) #10 TEK SCREW. PROVIDE BLOCKING STUDS AT ENDS AND 10'-0" O.C.

LEGEND

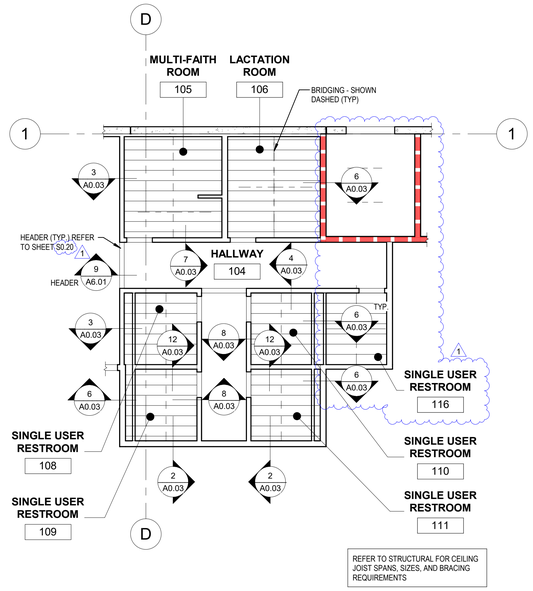
- 2'x4' LENSED RECESSED LED TROFFER W/ SHALLOW HOUSING. DIAGONAL HATCH REPRESENTS EMERGENCY LIGHTING
- HIGH BAY LIGHTING FIXTURES. REFER TO ELECTRICAL DRAWINGS.
- LED DOWNLIGHT
- 4' LINEAR LED FLANGED EXTRUSION FIXTURE
- EMERGENCY EXIT SIGN (CENTERED ABOVE DOOR)
- 2'x4' ACOUSTIC CEILING (REFER TO RCP FOR HEIGHT)
- 5/8" GYPSUM BOARD CEILING OR SOFFIT (REFER TO RCP FOR HEIGHT)
- PROVIDE 6 1/4" 'SONOBAT' INSULATION AT LOCATIONS SHOWN ON RCP
- 2'x2' SUPPLY AIR DIFFUSER
- 2'x2' CEILING EXHAUST GRILLE
- 2'x2' CEILING RETURN AIR GRILLE

KEYNOTES

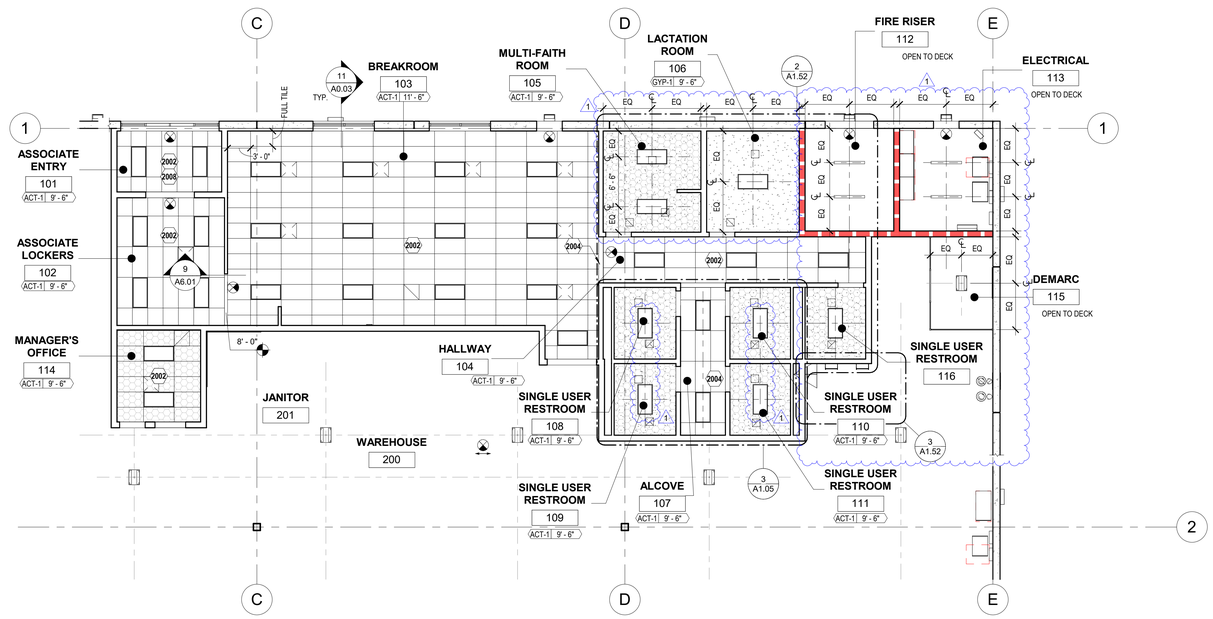
2002	CEILING GRID & LIGHTING TO BE CENTERED IN NEW SPACE AS SHOWN.
2004	GYPSUM BOARD BULKHEAD/SOFFIT @ 1" BELOW ADJACENT CEILING.
2008	ADD ACT UPLIFT CLIPS.
2517	LOWER LADDER. REFER TO DETAIL 1/A5.01.
2518	UPPER LADDER. REFER TO DETAIL 1/A5.01.
2519	LADDER PLATFORM. REFER TO DETAIL 1/A5.01.
2520	ROOF HATCH. REFER TO DETAIL 2/A5.01 & ROOF PLAN.



3 / A1.52 ENLARGED REFLECTED CEILING PLAN, LADDER
Scale: 1/4" = 1'-0"



2 / A1.52 CEILING JOIST PLAN
Scale: 1/8" = 1'-0"



1 / A1.52 OFFICE REFLECTED CEILING PLAN
Scale: 1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

JACOB S BUSH
No. 912522
REGISTERED ARCHITECT
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OFFICE REFLECTED CEILING PLAN

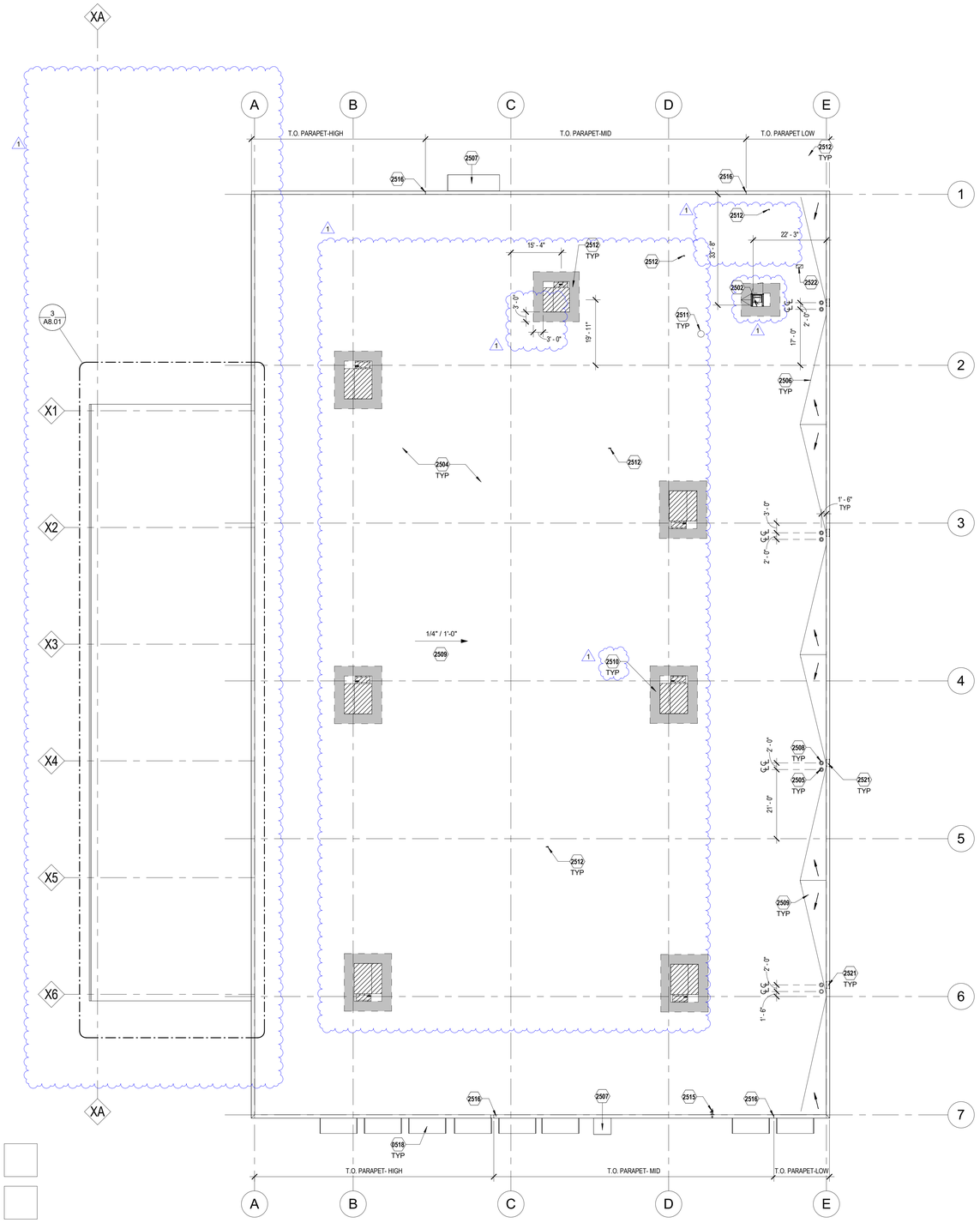
A1.52

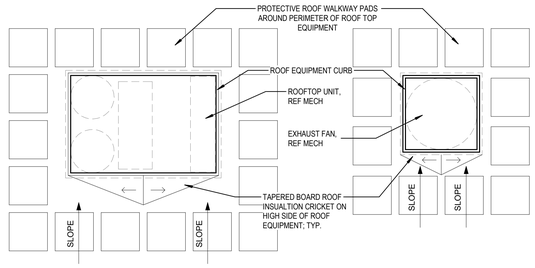
SHEET NOTES

A. REFERENCE EXTERIOR DETAIL SHEET A5.01 FOR ROOFING DETAILS.
B. REFERENCE STRUCTURAL FOR REINFORCEMENT AT EQUIPMENT.
C. REFERENCE MEP FOR NEW EQUIPMENT AND PENETRATIONS.
D. GC TO FIELD COORDINATE POSITIONING OF ROOF EQUIPMENT, OPENINGS, AND EQUIPMENT PLATFORMS WITH JOIST LOCATIONS AND MECHANICAL DRAWINGS.
E. GC TO PROVIDE FLASHING/MOISTURE PENETRATION PROTECTION AT ALL ROOF PENETRATIONS.
F. GC TO PROVIDE WALKWAY PADS AT EQUIPMENT. DO NOT INSTALL WALKWAY PADS UNTIL ROOF FLASHINGS ARE COMPLETE. WHERE PENETRATIONS CONFLICT WITH WALKWAY PADS, TRIM 4" FROM EDGE OF PENETRATION PRIOR TO PAD INSTALLATION.
G. GC TO PROVIDE CRICKETS AS REQUIRED TO FORM POSITIVE DRAINAGE AWAY FROM CORNERS AND AROUND EQUIPMENT. MINIMUM FINISH SLOPE OF CRICKETS TO BE 1/2" PER 12".
H. GC TO INSTALL ALL EQUIPMENT PLATFORMS, CURBS, AND RELATED OPENINGS FOR ALL EQUIPMENT AS REQUIRED BY MEPF AND OTHER TRADES. VERIFY EXACT SIZES AND LOCATIONS WITH ALL SUB CONTRACTORS. ALL EQUIPMENT SHALL BE CONSTRUCTED TO BE LEVEL AND PLUMB, NO SLOPING WITH THE SLOPE OF THE ROOF.

KEYNOTES

0518	DOCK SHELTER; INSTALL PER MANUFACTURER'S INSTRUCTIONS; REFER TO SPECS.
2502	ROOF HATCH WITH FALL PROTECTION - PROVIDE GUARDING ON ALL EXPOSED SIDES OF HATCH. REFER TO DETAIL 2/A5.01
2504	TPO MEMBRANE ROOF SYSTEM OVER RIGID INSULATION ON A METAL DECK. REFER TO ENERGY CODE BASIS OF DESIGN ON SHEET G1.00 FOR INSULATION INFORMATION.
2505	ROOF DRAIN WITH INTERIOR DRAINAGE. CONNECT TO UNDERGROUND STORMWATER SYSTEM, REFER TO CIVIL, PLUMBING AND DETAIL 11/A5.01.
2506	TAPERED INSULATION ROOF CRICKET - SLOPE MIN 1/2"/FT.
2507	FABRIC AWNING. AWNING TO EXTEND 1'-0" BEYOND THE ROUGH OPENENING ON EITHER SIDE. REFER TO SPEC SECTION 107313 FOR PRODUCT INFORMATION. REFER TO WALL SECTION FOR ADDITIONAL INFOMRATION.
2508	OVERFLOW ROOF DRAIN, TO WALL NOZZLE (18" AFF) AND DAYLIGHT. REFER TO PLUMBING AND DETAIL 11/A5.01.
2509	SLOPE DIRECTION TYP.
2510	WALKING PADS. REFER TO DETAIL 2/A1.61.
2511	EXHAUST FAN AND ROOF PENETRATION. REFER TO MEP DRAWINGS AND DETAIL 5/A5.01. PROVIDE FLASHING PER MANUFACTURER'S INSTRUCTIONS. ELECTRICAL AND MECHANICAL UTILITIES ARE THROUGH EQUIPMENT BASE WITH NO SEPARATE PENETRATIONS. REFER TO STRUCTURAL DRAWINGS FOR SUPPORT FRAMING.
2512	ROOF PENETRATION. REFER TO MEP DRAWINGS AND DETAILS 3 AND 4/A5.01. PROVIDE FLASHING PER MANUFACTURER'S INSTRUCTIONS.
2515	PARAPET-MOUNTED DAVIT CRANE. REFER TO SPECIFICATIONS FOR PRODUCT BASIS OF DESIGN. REFER TO STRUCTURAL DRAWINGS FOR FINAL MOUNT LOCATION.
2516	PARAPET STEP - REFERENCE DETAIL 7/A5.01.
2521	THROUGH-WALL OVERFLOW SCUPPER. REFER TO ELEVATIONS & DETAIL 14/A5.01.
2522	HEAT PUMP CONDENSING UNIT. REFER TO MECHANICAL DRAWINGS





2 / A1.61 TYPICAL ROOF EQUIPMENT PLAN
Scale: 1/4" = 1'-0"

1 / A1.61 OVERALL ROOF PLAN
Scale: 1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

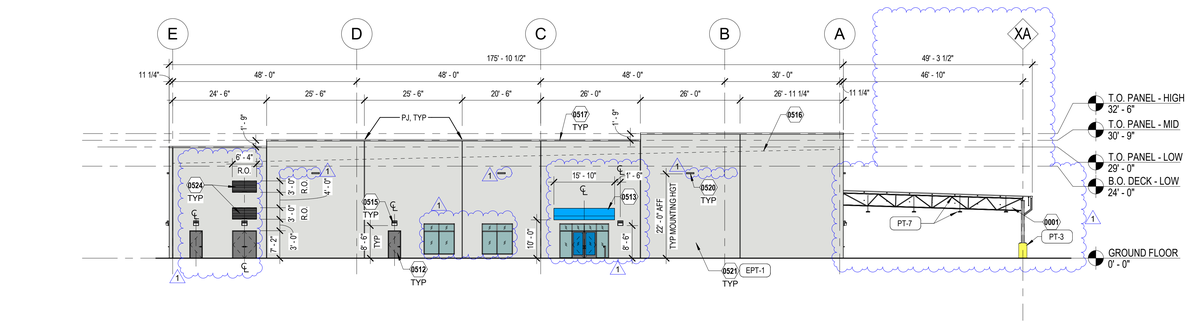
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

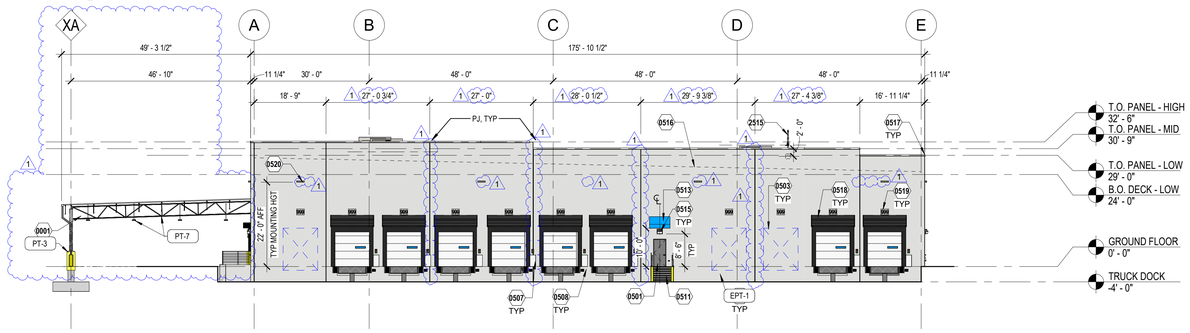
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OVERALL ROOF PLAN

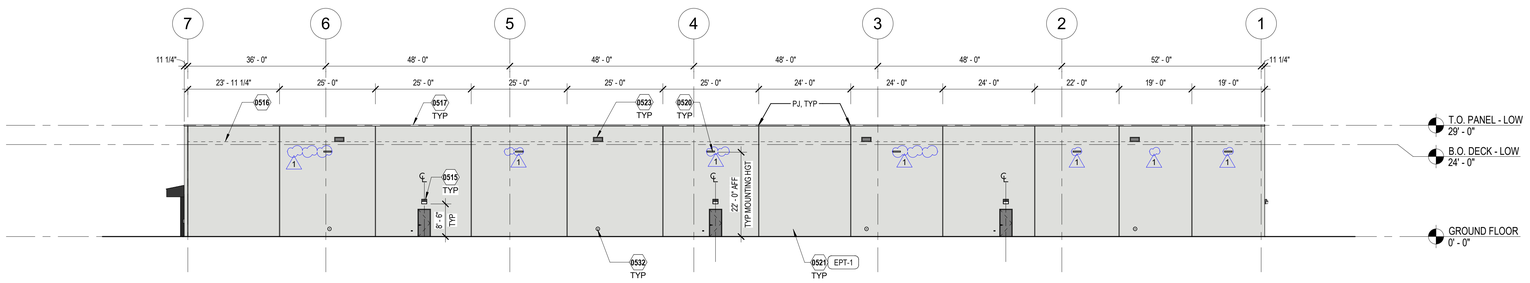
A1.61



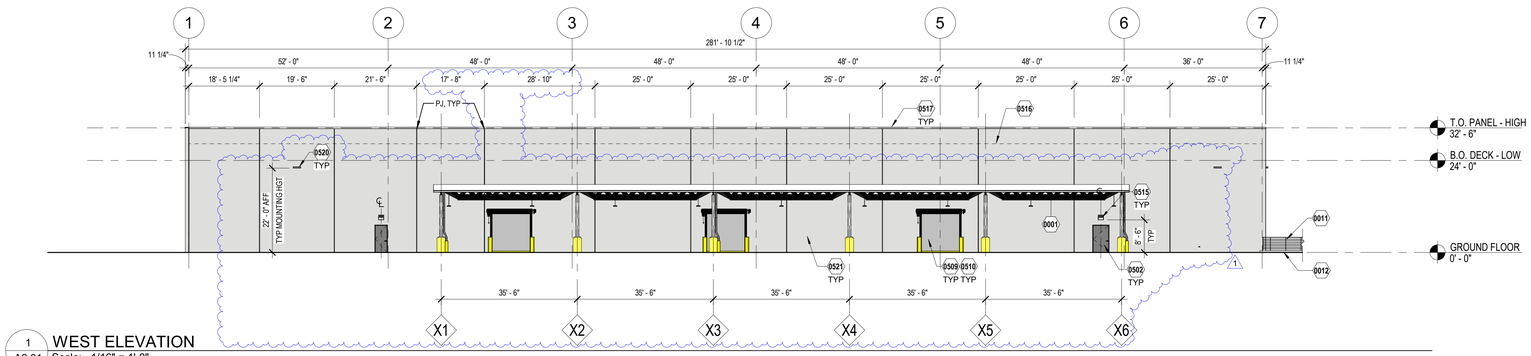
4 A2.01 NORTH ELEVATION
Scale: 1/16" = 1'-0"



3 A2.01 SOUTH ELEVATION
Scale: 1/16" = 1'-0"



2 A2.01 EAST ELEVATION
Scale: 1/16" = 1'-0"



1 A2.01 WEST ELEVATION
Scale: 1/16" = 1'-0"

SHEET NOTES

A. PROVIDE FLASHING/MOISTURE PENETRATION PROTECTION AT ALL PENETRATIONS.
B. BRANDED BUILDING SIGNAGE IS NOT INCLUDED IN THE BUILDING PERMIT AND SHALL REQUIRE A SEPARATE PERMIT PRIOR TO INSTALLATION, U.N.O.
C. ALL EMERGENCY LIGHTING AT DOORS TO BE CENTERED ABOVE DOOR U.N.O., REFERENCE ELECTRICAL DRAWINGS.
D. REFER TO ELECTRICAL DRAWINGS FOR ALL LIGHTING LOCATIONS.
E. REFER TO STRUCTURAL AND MECHANICAL FOR ADDITIONAL INFORMATION RELATED TO BUILDING OPENINGS.
F. INSTALL JOINT SEALANT OVER EXPANSION JOINT FILLER AT ALL EXTERIOR WALL JOINTS AND AT ALL CUTS AND HOLES THROUGH WALLS. REFER TO SPECIFICATIONS.
G. PARAPET MEMBRANE FLASHING SHALL BE OF THE SAME MATERIAL AS SINGLE-PLY ROOFING MEMBRANE.
H. REFER TO BUILDING SECTIONS AND DETAILS FOR ADDITIONAL INFORMATION.
I. TIE ALL DOWNSPOUTS AT GRADE TO STORM DRAINS. REFER TO CANOPY PLAN, SECTIONS, AND CIVIL DRAWINGS.
J. PAINT ALL BOLLARDS SAFETY YELLOW.
K. REFER TO SPECIFICATIONS FOR SPECIFIC PAINT PRODUCTS REQUIRED.

CANOPY FINISH NOTES

A. STEEL AND METAL DECK ARE TO BE SHOP PRIMED. DO NOT GALVANIZE. (REFER TO SPEC 053100)
B. TWO COATS PAINT TO FIELD APPLIED OVER ALL EXPOSED SHOP-PRIMED STRUCTURE AND METAL DECK, ALONG WITH ANY EXPOSED CONDUITS, PIPING, ETC. (REF SPEC 099000).
C. CONCRETE SURROUND TO BE PAINTED SAFETY YELLOW. REFER TO SPEC 099000 FOR PRIMER & TOP COAT REQUIREMENTS.

EXTERIOR COLOR LEGEND

(TEXTURED FINISH AT CONCRETE WALL PANELS)

REFER TO FINISH SCHEDULE SHEET **A1.03**; REFER TO CANOPY FINISH NOTES FOR PAINT AT CANOPY

EPT-1	2121-70 - CHANTILLY LACE
EPT-2	SW7650 - ELLIE GRAY
EPT-3	TENANT BLUE TO MATCH PANTONE 2727C

KEYNOTES

0001	LAUNCH PAD CANOPY (ABOVE). REFER TO SHEET A8.01.
0011	CONCRETE RETAINING WALL; REFER TO CIVIL FOR MORE INFORMATION.
0012	PROVIDE SAFETY RAIL AT RETAINING WALL; PAINT SAFETY YELLOW.
0501	TRUCKER (TDR) ENTRY DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10. AS-28 SIGN TO READ "TRUCKER'S ENTRANCE".
0502	DRIVER (DSP) ENTRY DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10. AS-28 SIGN TO READ "DRIVER'S ENTRANCE".
0503	KNOCK-OUT PANEL. MATCH DOCK DOOR SIZE.
0507	STEEL SECTIONAL OVERHEAD TRUCK DOCK DOOR (INSULATED) WITH BUMPERS AND DOCK SEAL, PRE-PRIMED, PAINT PER LEGEND, TYP. FOR SIGNAGE REFER TO 8/G1.10.
0508	HYDRAULIC LEVELER. REFER TO SPECIFICATIONS.
0509	HIGH-SPEED FABRIC DOOR (EXTERIOR MOUNT) AND STEEL SECTIONAL OVERHEAD DOOR (INTERIOR MOUNT, INSULATED) WITH PAINTED CLEAR ZONE ON GROUND. VERIFY REQUIRED CLEARANCES WITH DOOR MANUFACTURER. DOORS MAY REQUIRE LEFT HAND DRIVE MECHANISMS. REFER TO DOOR SCHEDULE FOR MORE INFORMATION. FOR SIGNAGE REFER TO 8/G1.10.
0510	ADD VISUAL AND AUDIO ALARMS AT EXTERIOR HIGH-SPEED ROLL UP DOORS THAT HAVE PEDESTRIAN TRAFFIC. REFER TO TELECOM AND SECURITY DRAWINGS, BY OTHERS.
0511	PRE-FAB METAL STAIR AT TRUCK COURT, GALVANIZED (NO PAINT).
0512	TYPICAL EGRESS DOOR; FOR SIGNAGE REFER TO DETAIL 4/G1.10.
0513	FABRIC AWNING OVERHEAD. REFER TO ROOF PLAN.
0515	EXTERIOR EGRESS LIGHT ABOVE EXTERIOR DOOR; REFER TO MEP.
0516	ROOF LINE BEYOND. GC TO MAINTAIN MIN 42" PARAPET FOR ROOF SAFETY.
0517	PREFINISHED METAL COPING OVER CONTINUOUS WOOD BLOCKING.
0518	DOCK SHELTER; INSTALL PER MANUFACTURER'S INSTRUCTIONS; REFER TO SPECS.
0519	DOCK NUMBER SIGNAGE AT ALL DOCK DOORS, U.N.O.; CENTER SIGNAGE ON DOCK DOOR, REFER TO G1.10 FOR MORE INFORMATION.
0520	WALL MOUNTED LIGHT FIXTURE, REFER TO ELECTRICAL DRAWINGS. CENTER LIGHT FIXTURE HORIZONTALLY IN PANEL, U.N.O.
0521	CONCRETE PANEL, PAINT; REFERENCE EXTERIOR COLOR LEGEND.
0523	THROUGH-WALL OVERFLOW SCUPPER. PAINT TO MATCH EXTERIOR WALL BEYOND. REFER TO DETAIL 14/A5.01.
0524	ALUMINUM LOUVER, PRIMED, FIELD FINISHED TO MATCH PANEL OR SUBMIT MANUFACTURER'S STANDARD COLOR OPTIONS TO ARCHITECT FOR REVIEW.
0532	OVERFLOW ROOF DRAIN NOZZLE (DSN); HEIGHT TO BE 18", UNO; REF TO PLUMBING DRAWINGS.
2515	PARAPET-MOUNTED DAVIT CRANE. REFER TO SPECIFICATIONS FOR PRODUCT BASIS OF DESIGN. REFER TO STRUCTURAL DRAWINGS FOR FINAL MOUNT LOCATION.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912527
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

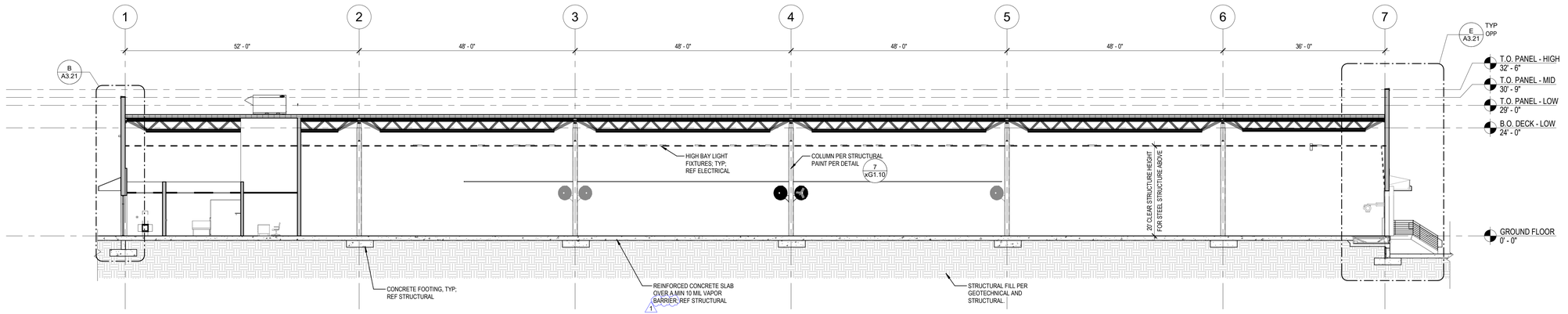
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

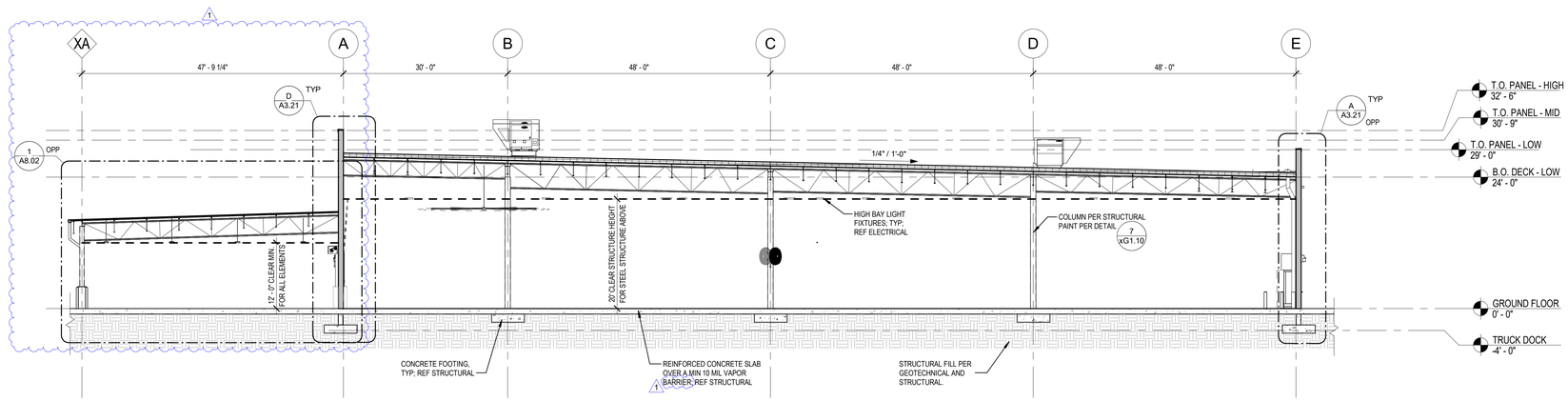
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL / RM
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
EXTERIOR ELEVATIONS

A2.01



BB A3.01 LONGITUDINAL BUILDING SECTION
Scale: 3/32" = 1'-0"



AA A3.01 TRANSVERSE BUILDING SECTION
Scale: 3/32" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

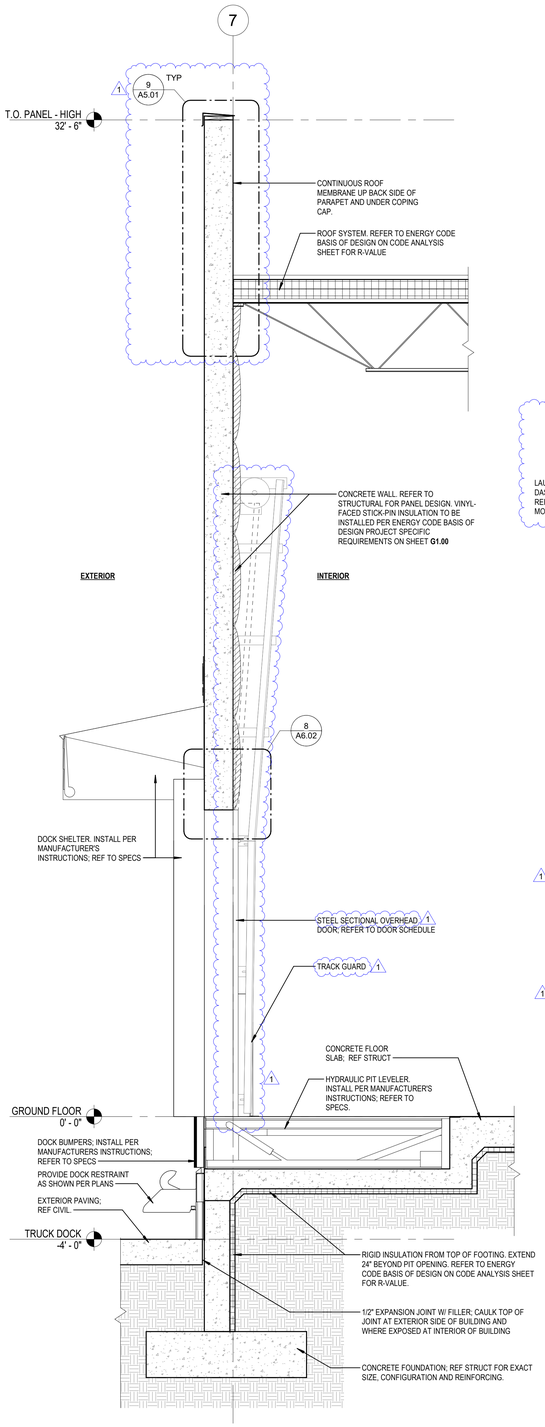
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

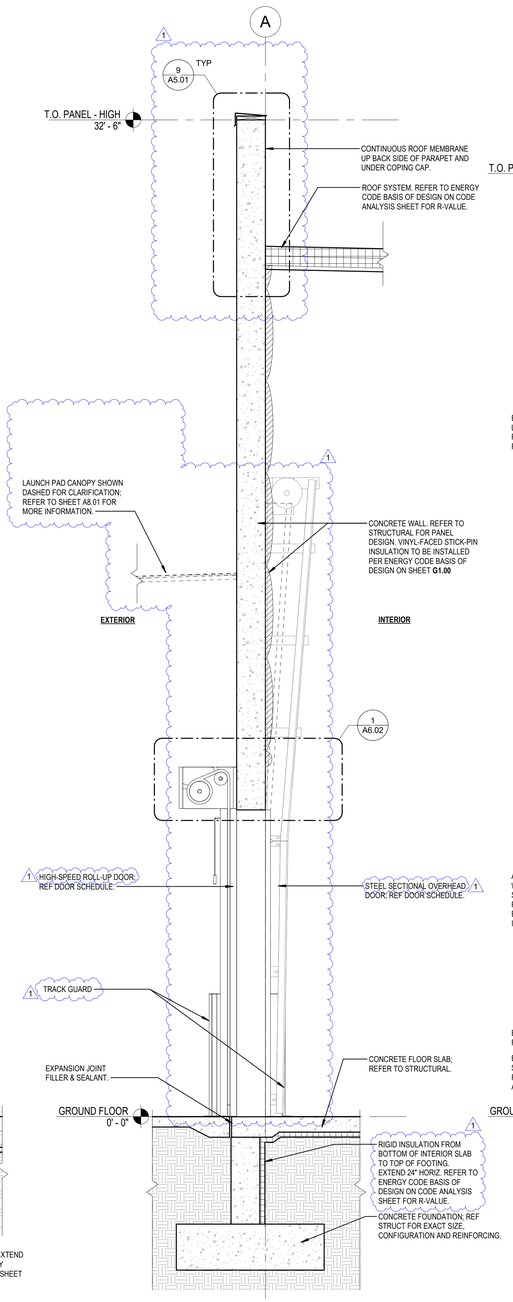
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
BUILDING SECTIONS

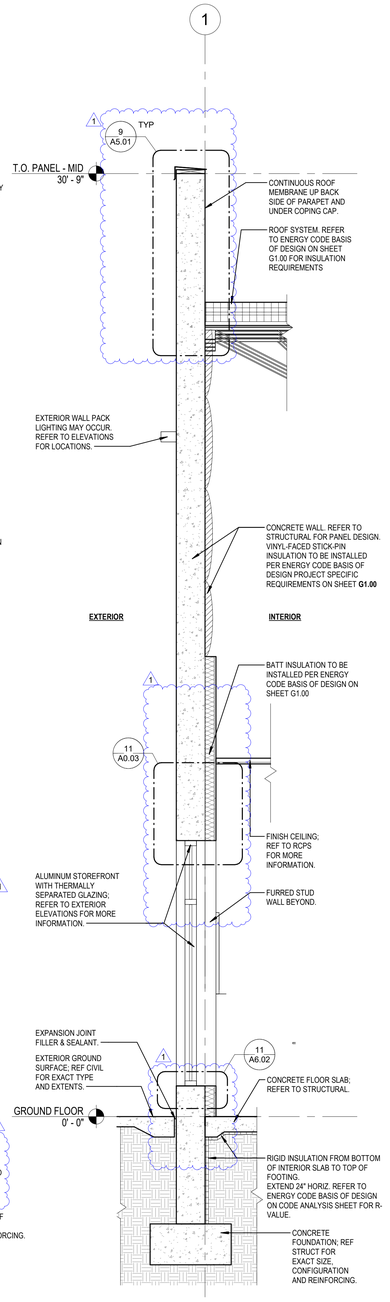
A3.01



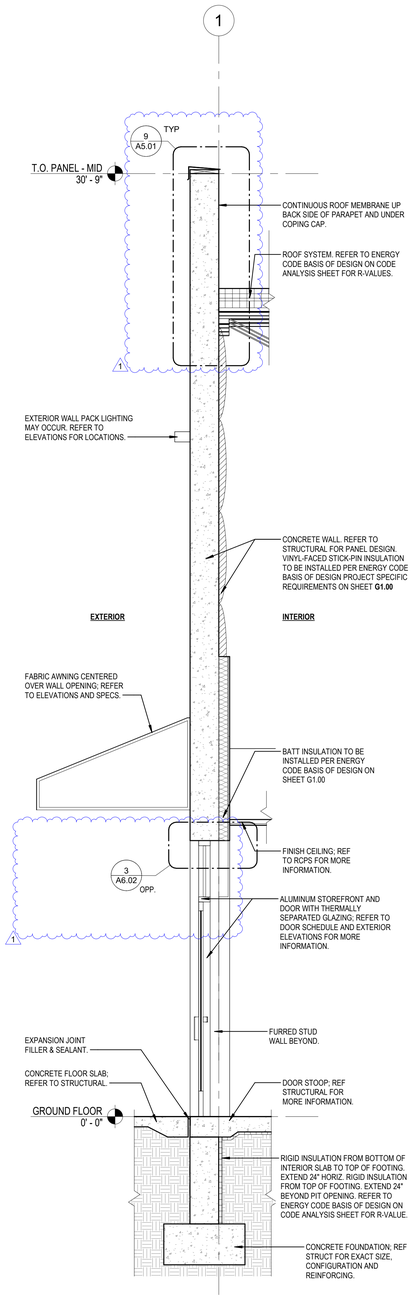
E A3.21 SECTION AT DOCK DOORS
Scale: 1/2" = 1'-0"



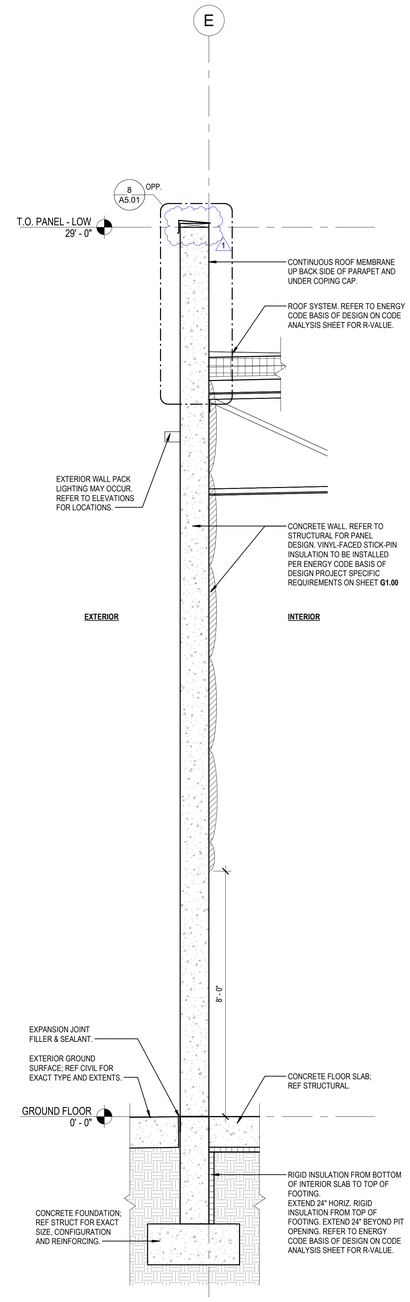
D A3.21 SECTION AT LAUNCH PAD DOORS
Scale: 1/2" = 1'-0"



C A3.21 SECTON AT STOREFRONT
Scale: 1/2" = 1'-0"



B A3.21 SECTION AT ENTRY DOORS
Scale: 1/2" = 1'-0"



A A3.21 SECTION AT CONCRETE WALL
Scale: 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
WALL SECTIONS

A3.21

SHEET NOTES

1. REFERENCE FINISH PLANS AND SCHEDULES FOR FINISH INFORMATION.
2. REFERENCE PARTITION DETAIL SHEETS FOR PARTITION INFORMATION.
3. PROVIDE CONTROL JOINTS IN GYPSUM BOARD FRAMED ASSEMBLIES AT 30'-0" OC MAX.
4. REFERENCE MEP SHEETS FOR INFORMATION ON BUILDING SYSTEMS AND UTILITIES.
5. ELEVATIONS DO NOT SHOW ALL ELEMENTS OF CONSTRUCTION, REFER TO OTHER CONSTRUCTION DOCUMENTS FOR ADDITIONAL INFORMATION.
6. REFERENCES EQUIPMENT PLANS AND SCHEDULES FOR EQUIPMENT AND FURNITURE INFORMATION.

MILLWORK SCHEDULE

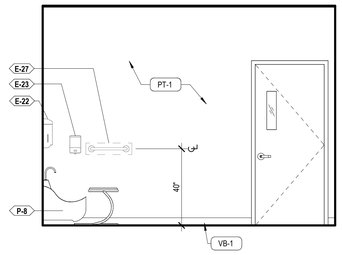
CODE	QTY	ITEM	COMMENTS
M-B4	1	PLASTIC LAMINATE PLUMBING GUARD (PL-1)	
M-B5	1	LACTATION ROOM BASE CABINET - ACCESSIBLE SINK	
M-B8	1	BASE CABINET	
M-B9	1	BASE CABINET - DRAWER	
M-BM	2	BASE CABINET - MICROWAVE	
M-C3	2	COUNTERTOP - BREAKROOM	WIDTH VARIES, REF PLANS
M-C4	1	COUNTERTOP - LACTATION ROOM	
M-IB	1	BASE CABINET - DRAWER	
M-IT	1	BASE CABINET - TRASH	
M-O2	1	OVERHEAD CABINET	
M-OM	2	OVERHEAD - MICROWAVE CABINET	
M-R3	1	COAT RACK	

MILLWORK NOTES

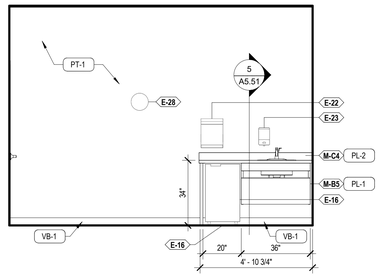
A. BASE CABINETS DEFAULT DEPTH TO BE 2'-0", UNO.
B. OVERHEAD CABINETS DEFAULT DEPTH TO BE 1'-4", UNO.
C. REFERENCE DETAILS ON SHEET **A5.51**

TYPICAL MICROWAVE NICHE FINISHES

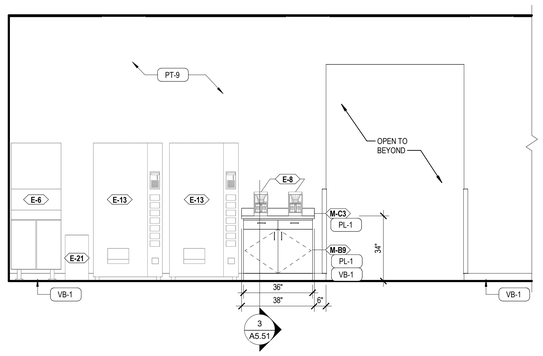




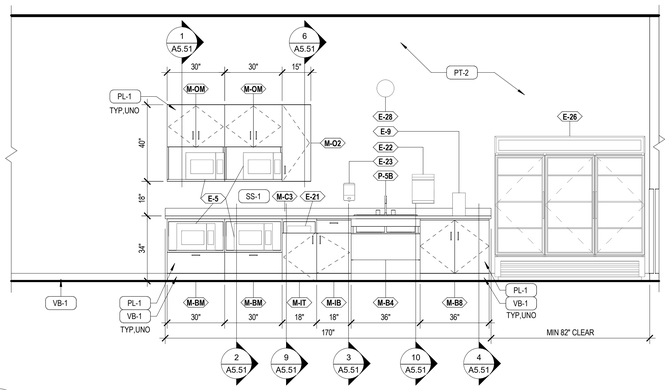
4 A4.01 MULTI-FAITH ROOM ELEVATION
Scale: 3/8" = 1'-0"



3 A4.01 LACTATION ROOM ELEVATION
Scale: 3/8" = 1'-0"



2 A4.01 BREAK ROOM ELEVATION 2
Scale: 3/8" = 1'-0"



1 A4.01 BREAK ROOM ELEVATION 1
Scale: 3/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

11.21.2025 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

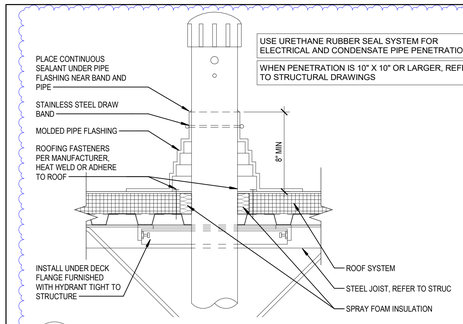
ID	Description	Date

© 2025 CESO, INC

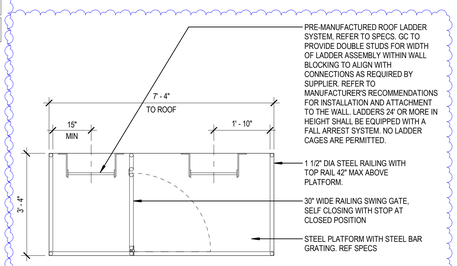
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
INTERIOR ELEVATIONS

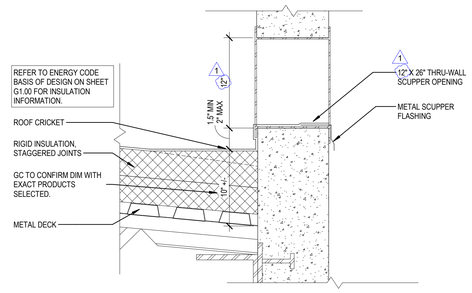
A4.01



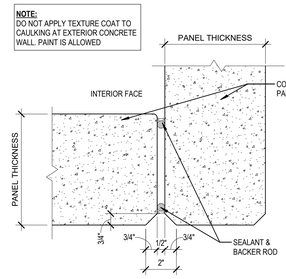
16 A5.01 ROOF PENETRATION
Scale: 1 1/2" = 1'-0"



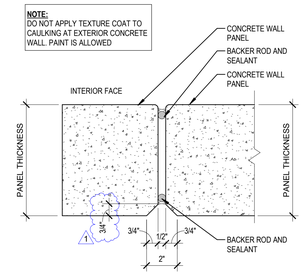
15 A5.01 ROOF LADDER
Scale: 1/2" = 1'-0"



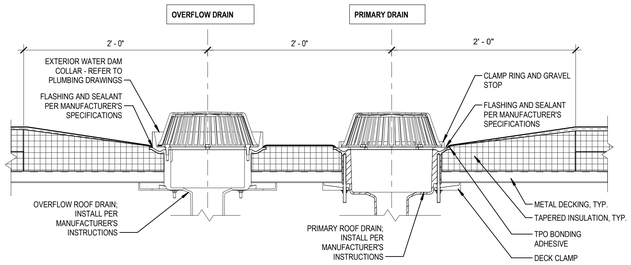
14 A5.01 TYP. ROOF OVERFLOW SCUPPER - SECT
Scale: 1 1/2" = 1'-0"



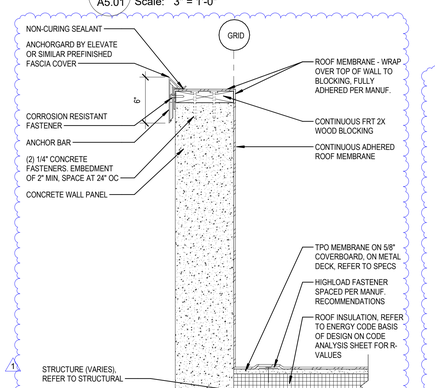
13 A5.01 TYP. PANEL OUTSIDE CORNER JOINT 2"
Scale: 3" = 1'-0"



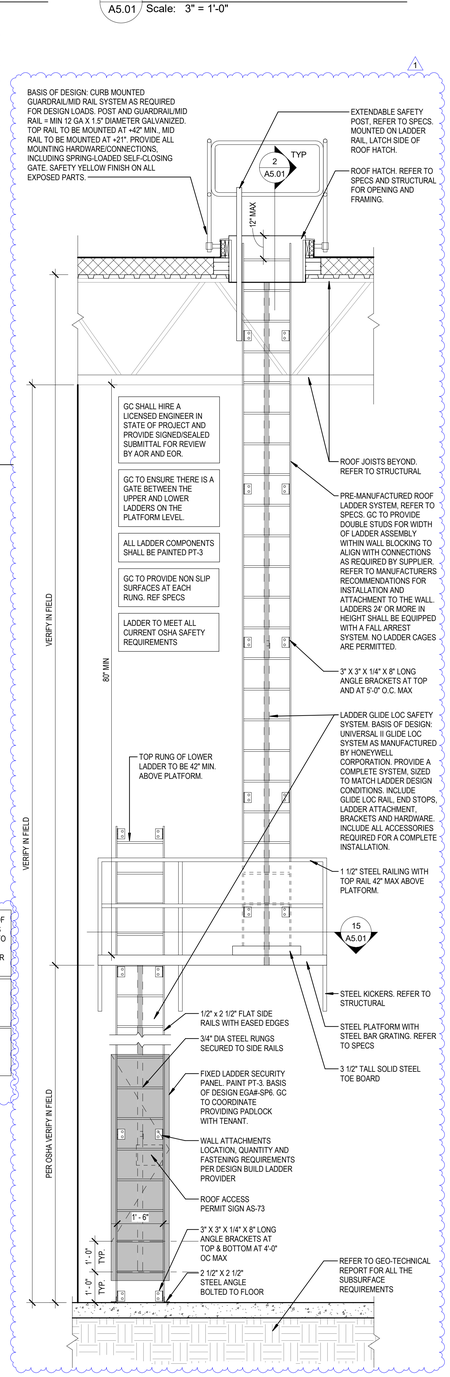
12 A5.01 TYPICAL 2" PANEL JOINT
Scale: 3" = 1'-0"



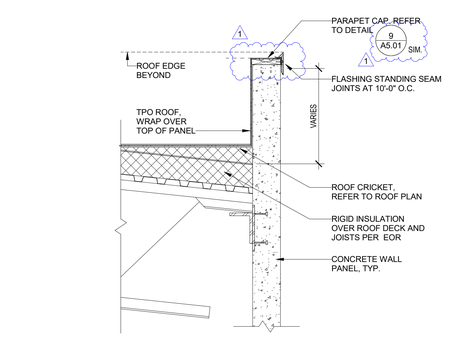
11 A5.01 SECTION - ROOF DRAIN DETAIL
Scale: 1 1/2" = 1'-0"



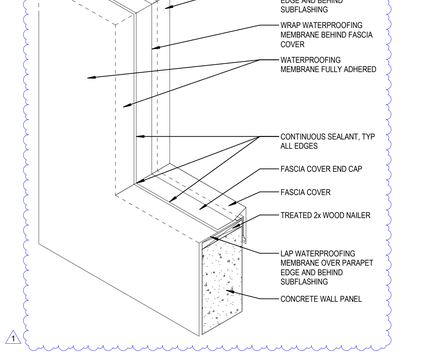
9 A5.01 TOP OF WALL AT CONCRETE PANEL
Scale: 1 1/2" = 1'-0"



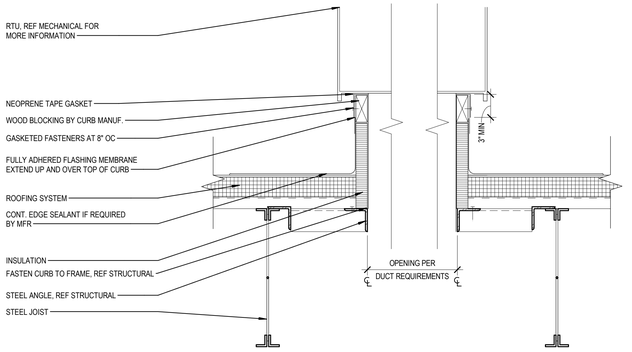
1 A5.01 ROOF LADDER
Scale: 1/2" = 1'-0"



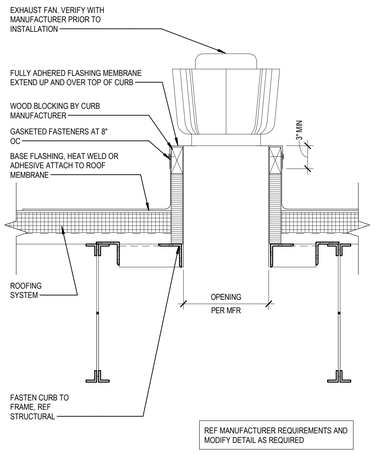
8 A5.01 TYP. ROOF PARAPET
Scale: 3/4" = 1'-0"



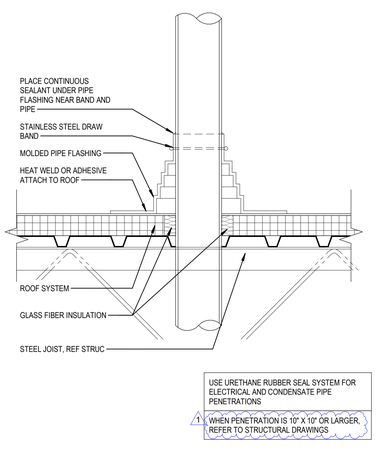
7 A5.01 PARAPET STEP
Scale: 1 1/2" = 1'-0"



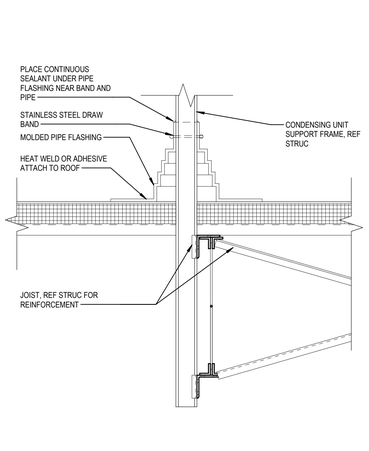
6 A5.01 RTU/ DHU DETAIL
Scale: 1 1/2" = 1'-0"



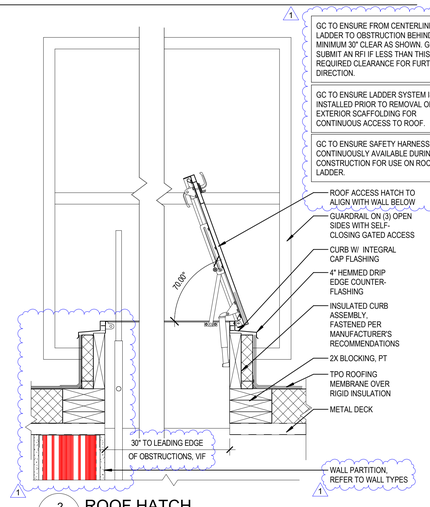
5 A5.01 EXHAUST FAN DETAIL
Scale: 1 1/2" = 1'-0"



4 A5.01 PLUMBING VENT
Scale: 1 1/2" = 1'-0"



3 A5.01 CONE FLASHING DETAIL
Scale: 1 1/2" = 1'-0"



2 A5.01 ROOF HATCH
Scale: 1 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912527
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

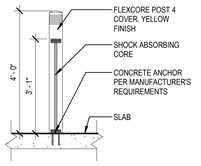
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

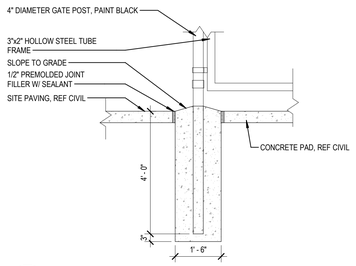
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL/RM
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
EXTERIOR DETAILS

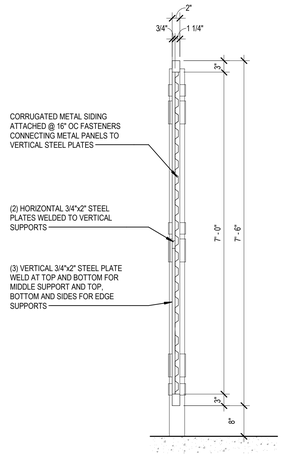
A5.01



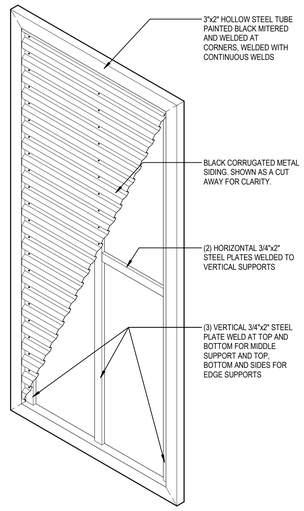
8 A5.02 FLEXCORE BOLLARD
Scale: 1/2" = 1'-0"



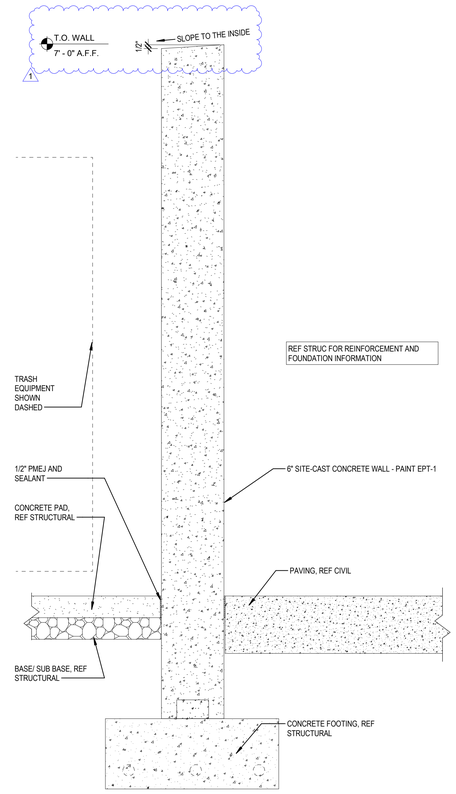
7 A5.02 GATE FOUNDATION
Scale: 1/2" = 1'-0"



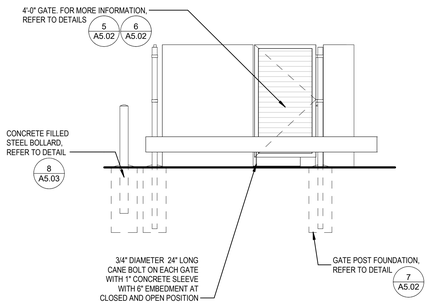
6 A5.02 TRASH GATE SECTION
Scale: 3/4" = 1'-0"



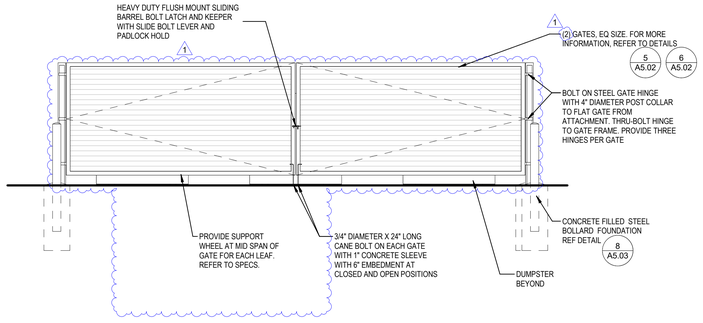
5 A5.02 GATE ISOMETRIC
Scale: 1" = 1'-0"



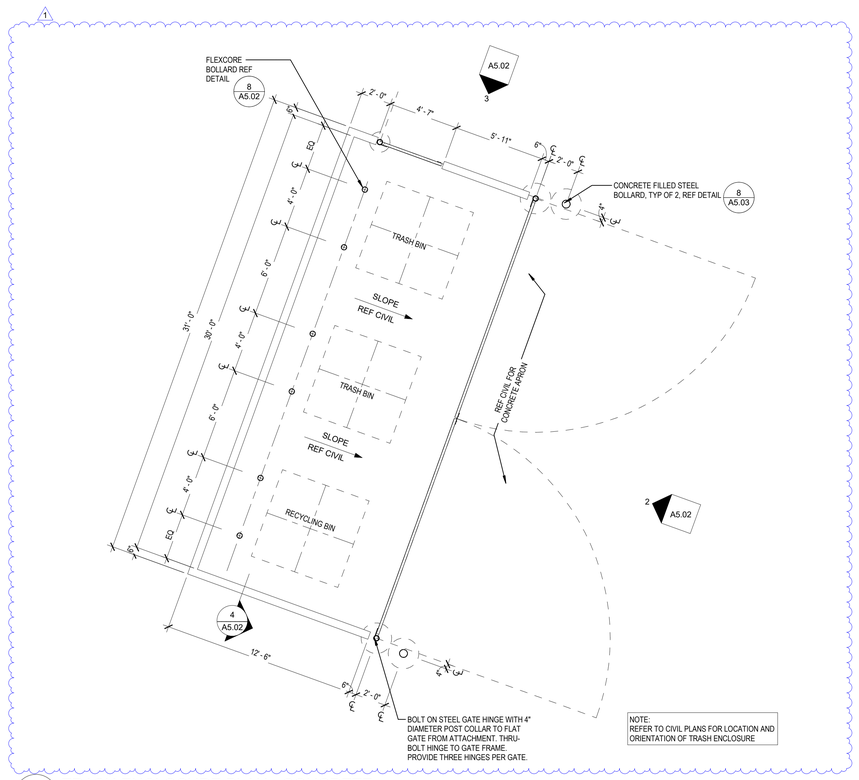
4 A5.02 SECTION AT TRASH ENCLOSURE
Scale: 1 1/2" = 1'-0"



3 A5.02 TRASH ENCLOSURE ELEVATION - SIDE
Scale: 1/4" = 1'-0"



2 A5.02 TRASH ENCLOSURE ELEVATION - FRONT
Scale: 1/4" = 1'-0"



1 A5.02 TRASH ENCLOSURE PLAN - CONCRETE
Scale: 1/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912527
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

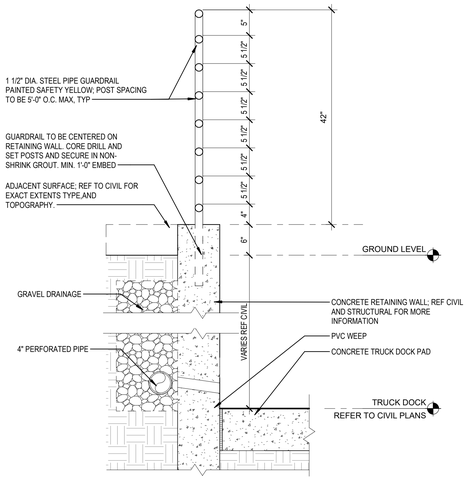
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

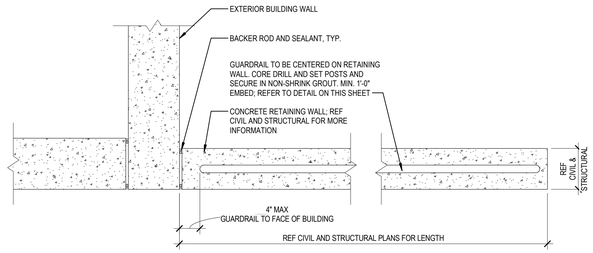
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL / RM
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
TRASH ENCLOSURE - CONCRETE

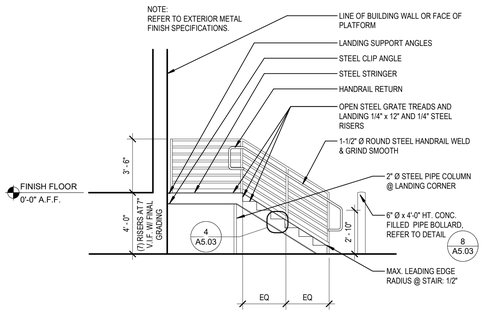
A5.02



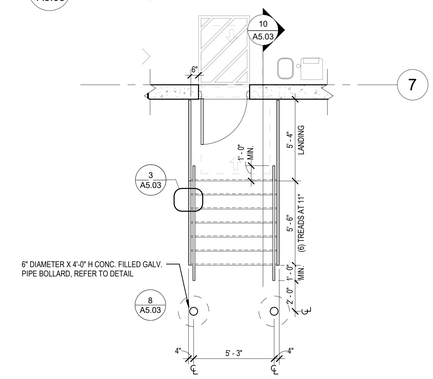
12 A5.03 RETAINING WALL GUARDRAIL
Scale: 1" = 1'-0"



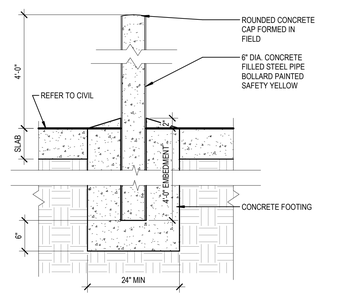
11 A5.03 RETAINING WALL PLAN, TYPICAL
Scale: 1" = 1'-0"



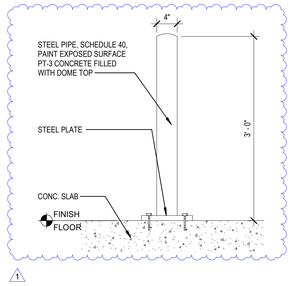
10 A5.03 PRE-ENG METAL STAIR
Scale: 1/4" = 1'-0"



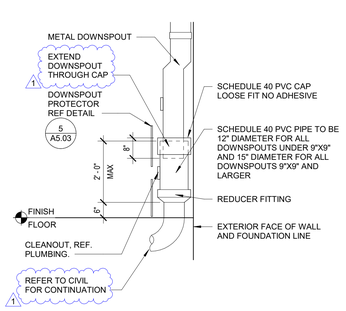
9 A5.03 PRE-ENG METAL STAIR PLAN
Scale: 1/4" = 1'-0"



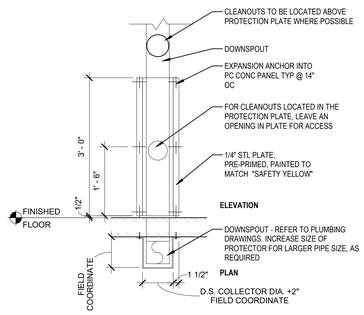
8 A5.03 EXTERIOR PIPE BOLLARD DETAIL
Scale: 1" = 1'-0"



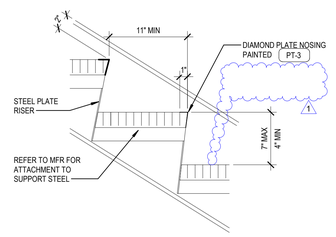
7 A5.03 SURFACE BOLLARD
Scale: 1" = 1'-0"



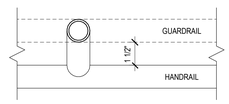
6 A5.03 DOWNSPOUT CONNECTION
Scale: 1/2" = 1'-0"



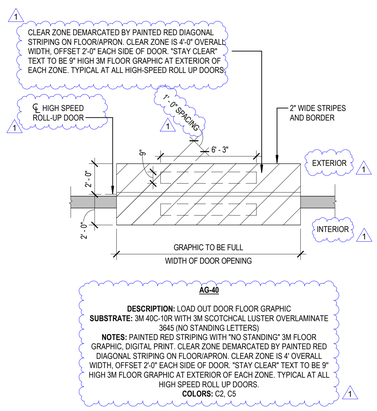
5 A5.03 DOWNSPOUT LEADER PROTECTOR
Scale: 3/4" = 1'-0"



4 A5.03 TREAD / RISER DETAIL
Scale: 1 1/2" = 1'-0"



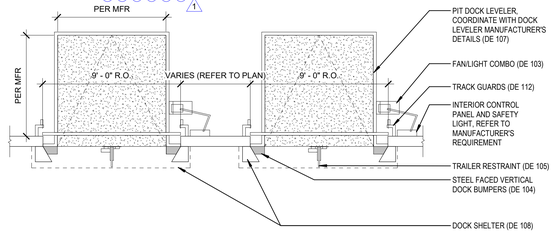
3 A5.03 HANDRAIL DETAIL
Scale: 3" = 1'-0"



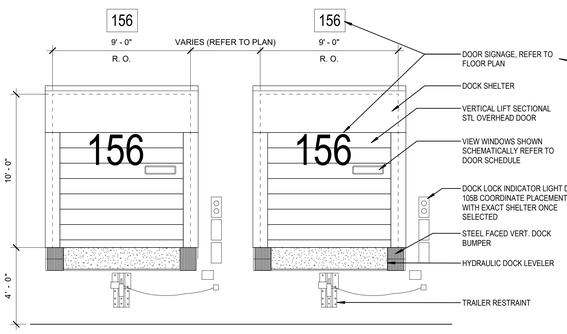
2 A5.03 CLEAR ZONE (AG-40)
Scale: 1/4" = 1'-0"

DOCK EQUIPMENT SCHEDULE

CODE	ITEM	COMMENTS
DE 103	DOCK FAN/ LIGHT COMBO	REF SPECS
DE 104	DOCK BUMPER	REF SPECS
DE 105	TRAILER RESTRAINT	REF SPECS
DE 105B	DOCK RESTRAINT LIGHT	REF SPECS
DE 107	DOCK LEVELER	REF SPECS
DE 108	DOCK SHELTER	REF SPECS
DE 110	40" H WARDEN RR GUARD	REF SPECS
DE 112	48" H WARDEN FT GUARD	REF SPECS

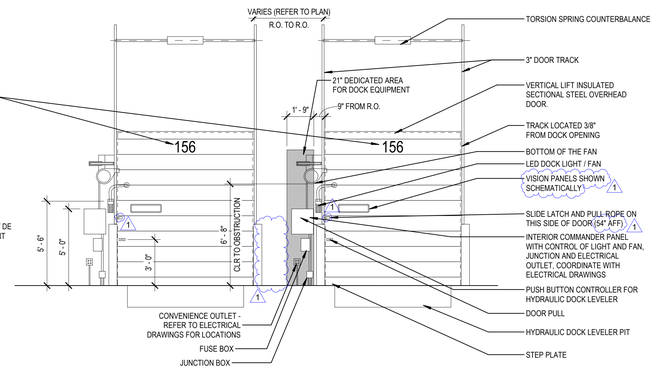


EQUIPMENT PLAN



EXTERIOR ELEVATION

NOTE: REFER TO SIGNAGE STANDARDS FOR SIGNAGE REQUIREMENTS



INTERIOR ELEVATION

1 A5.03 SECTIONAL DOOR AND RELATED EQUIPMENT
Scale: 1/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
EXTERIOR DETAILS

A5.03

SHEET NOTES

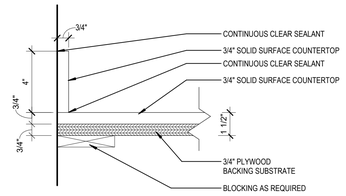
1. REFERENCE FINISH PLANS AND SCHEDULES FOR FINISH INFORMATION.
2. REFERENCE PARTITION DETAIL SHEETS FOR PARTITION INFORMATION.
3. PROVIDE CONTROL JOINTS IN GYPSUM BOARD FRAMED ASSEMBLIES AT 30'-0" OC MAX.
4. REFERENCE MEP SHEETS FOR INFORMATION ON BUILDING SYSTEMS AND UTILITIES.
5. ELEVATIONS DO NOT SHOW ALL ELEMENTS OF CONSTRUCTION, REFER TO OTHER CONSTRUCTION DOCUMENTS FOR ADDITIONAL INFORMATION.
6. REFERENCES EQUIPMENT PLANS AND SCHEDULES FOR EQUIPMENT AND FURNITURE INFORMATION.

MILLWORK SCHEDULE

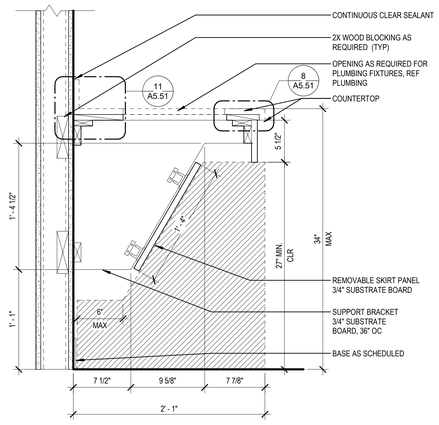
CODE	QTY	ITEM	COMMENTS
M-B4	1	PLASTIC LAMINATE PLUMBING GUARD (PL-1)	
M-B5	1	LACTATION ROOM BASE CABINET - ACCESSIBLE SINK	
M-B8	1	BASE CABINET	
M-B9	1	BASE CABINET - DRAWER	
M-BM	2	BASE CABINET - MICROWAVE	
M-C3	2	COUNTERTOP - BREAKROOM	WIDTH VARIES, REF PLANS
M-C4	1	COUNTERTOP - LACTATION ROOM	
M-IB	1	BASE CABINET - DRAWER	
M-IT	1	BASE CABINET - TRASH	
M-O2	1	OVERHEAD CABINET	
M-OM	2	OVERHEAD - MICROWAVE CABINET	
M-R3	1	COAT RACK	

MILLWORK NOTES

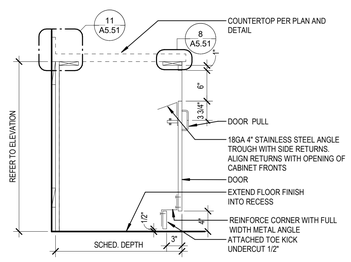
A. BASE CABINETS DEFAULT DEPTH TO BE 2'-0", UNO.
B. OVERHEAD CABINETS DEFAULT DEPTH TO BE 1'-4", UNO.



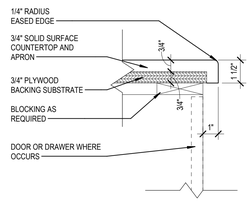
11 A5.51 BACKSPLASH DETAIL
Scale: 3" = 1'-0"



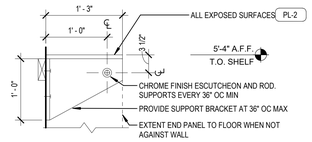
10 A5.51 M-B4 BASE CABINET - ACCESSIBLE SINK, BREAKROOM
Scale: 1 1/2" = 1'-0"



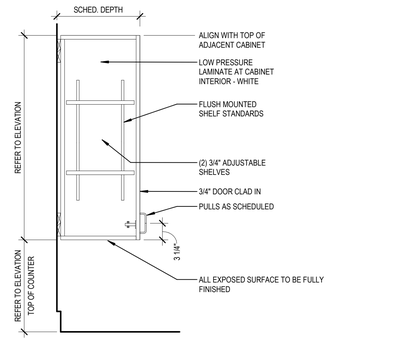
9 A5.51 M-IT BASE CABINET - TRASH
Scale: 1" = 1'-0"



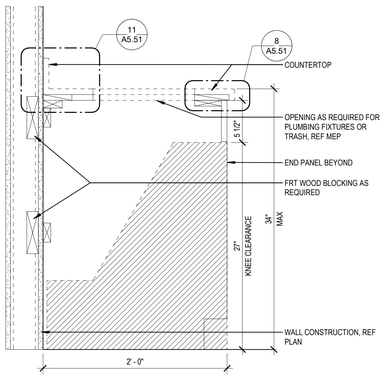
8 A5.51 COUNTER EDGE DETAIL
Scale: 3" = 1'-0"



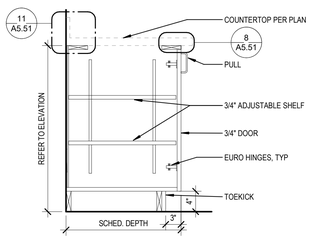
7 A5.51 M-R3 COAT RACK
Scale: 1" = 1'-0"



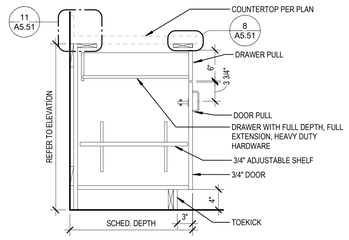
6 A5.51 M-02 OVERHEAD CABINET
Scale: 1" = 1'-0"



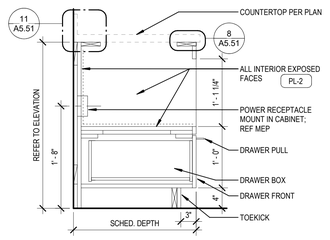
5 A5.51 M-B5 BASE CABINET - ACCESSIBLE SINK, LACTATION ROOM
Scale: 1 1/2" = 1'-0"



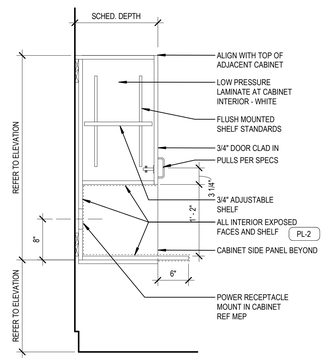
4 A5.51 M-B8 BASE CABINET SECTION
Scale: 1" = 1'-0"



3 A5.51 TYPICAL BASE CABINET - DRAWER
Scale: 1" = 1'-0"



2 A5.51 M-BM BASE CABINET - MICROWAVE
Scale: 1" = 1'-0"



1 A5.51 M-OM OVERHEAD - MICROWAVE CABINET
Scale: 1" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

11.21.2025 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

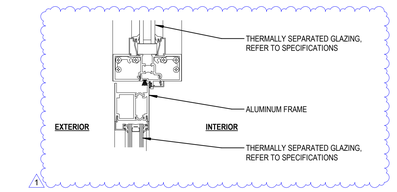
ID	Description	Date

© 2025 CESO, INC

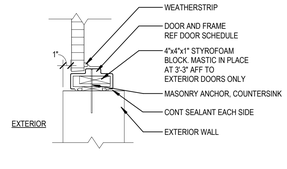
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
MILLWORK DETAILS

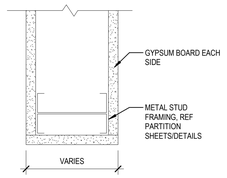
A5.51



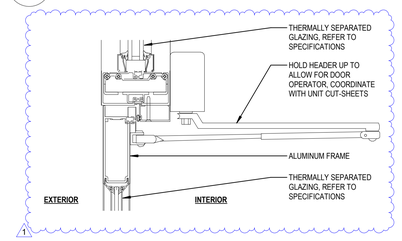
14 A6.01 JAMB EXTERIOR - DOOR TYPE A
Scale: 3" = 1'-0"



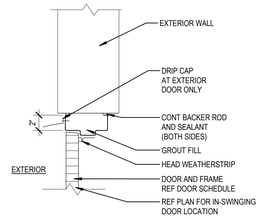
13 A6.01 F1 EXTERIOR JAMB
Scale: 1 1/2" = 1'-0"



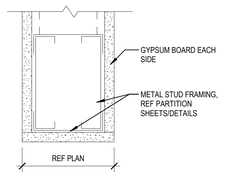
12 A6.01 JAMB @ OPENING
Scale: 3" = 1'-0"



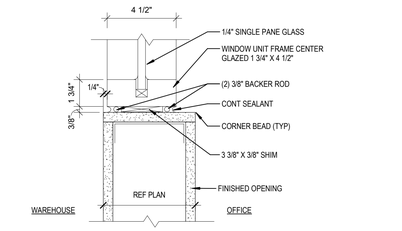
11 A6.01 HEAD EXTERIOR - DOOR TYPE A
Scale: 3" = 1'-0"



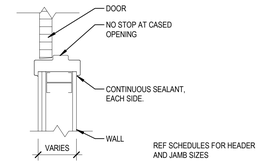
10 A6.01 F1 EXTERIOR HEAD
Scale: 1 1/2" = 1'-0"



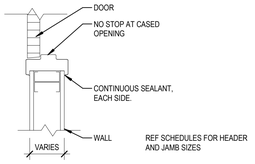
9 A6.01 HEAD @ OPENING
Scale: 3" = 1'-0"



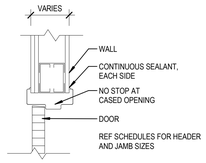
8 A6.01 SILL AT INTERIOR WINDOW
Scale: 3" = 1'-0"



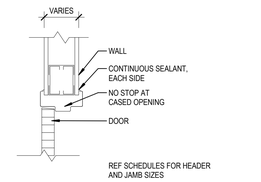
7 A6.01 F1 JAMB AT QUIET ROOM
Scale: 1 1/2" = 1'-0"



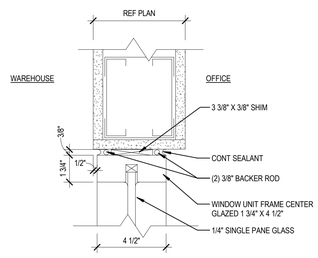
6 A6.01 F1, F2, & F4 JAMB
Scale: 1 1/2" = 1'-0"



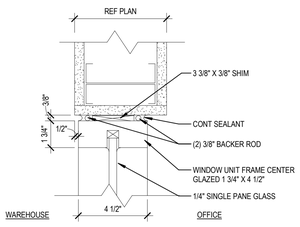
5 A6.01 F1 HEAD AT QUIET ROOM
Scale: 1 1/2" = 1'-0"



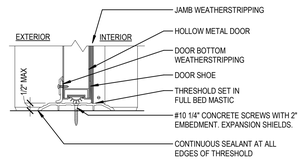
4 A6.01 F1, F2, & F4 HEAD
Scale: 1 1/2" = 1'-0"



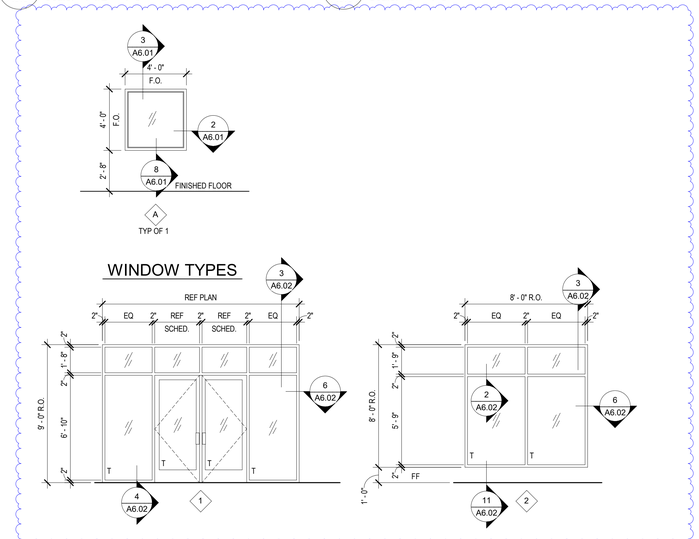
3 A6.01 HEAD AT INTERIOR WINDOW
Scale: 3" = 1'-0"



2 A6.01 JAMB AT INTERIOR WINDOW
Scale: 3" = 1'-0"



1 A6.01 THRESHOLD - HOLLOW METAL DOOR
Scale: 1 1/2" = 1'-0"



STOREFRONT TYPES

GENERAL DOOR NOTES

1. PROVIDE BEST 7 PIN FSIC - GREEN METAL CONSTRUCTION CORES. PLASTIC CORES ARE NOT ALLOWED.
2. DOOR NUMBERING MUST BE FOLLOWED EXACTLY PER PLANS. ANY CONFLICTS SHOULD BE BROUGHT TO ARCHITECT'S OR TENANT CM'S ATTENTION.
3. ALL WOOD BLOCKING REQUIRED AT EXTERIOR WALL/WINDOW DETAILS IS TO BE PRESSURE TREATED.
4. WITHIN TWO WEEKS OF CONTRACT AWARD, GC IS TO EVALUATE AND ORDER DOOR HARDWARE. COORDINATE WITH TENANT PROVIDED SECURITY PLAN AND CONSTRUCTION MANAGER FOR APPROVAL.
5. VERIFY ROUGH OPENING SIZES AND REQUIREMENTS WITH DOOR AND FRAME MANUFACTURER.
6. MAXIMUM PULL FORCES FOR EXTERIOR DOORS TO BE 15 LBS AND MAXIMUM PULL FORCES FOR INTERIOR DOORS TO BE 5LBS.
7. PROVIDE RUST INHIBITOR COATING AND STAINLESS STEEL SCREWS / FASTENERS ON ALL HARDWARE ITEMS AT EXTERIOR DOORS PER MANUFACTURER SPECS.
8. ALL ELECTRONIC HARDWARE SHALL BE COORDINATED WITH ELECTRICAL AND SECURITY CONTRACTORS.
9. ALL HOLLOW METAL DOORS TO BE 1-3/4" THICK. EXTERIOR HOLLOW METAL DOORS TO BE INSULATED. REFER TO ENERGY CODE BASIS OF DESIGN ON SHEET G1.00 FOR INSULATION INFORMATION.
10. ALL EXTERIOR DOOR HARDWARE TO BE APPROVED IN WRITING PRIOR TO INSTALLATION.
11. ALL INTERIOR DOORS OPEN TO WAREHOUSE FLOOR TO BE 16 GA METAL THICKNESS MINIMUM WITH IMPACT RESISTANT GLAZING (IF GLAZING PRESENT).
12. DOOR GLAZING TYPE NOTES:
    A. 1" INSULATING GLAZING UNLESS NOTED OTHERWISE AT EXTERIOR DOORS.
    B. ALL GLAZING IN DOORS AND FRAMES TO BE 1" INSULATED IF IN EXTERIOR INSULATED WALL.
    C. REFERENCE SPECIFICATIONS FOR NON-INSULATED INTERIOR LITES.
13. EXTERIOR HOLLOW METAL DOOR FRAMES TO BE 5 3/4" UNLESS NOTED OTHERWISE. INTERIOR HOLLOW METAL DOOR FRAMES SHALL BE SIZED BASED ON THE WALL TYPE IN WHICH THEY OCCUR.

DOOR SCHEDULE NOTES

A	DOOR TO BE 1" UNDERCUT AT BOTTOM - NO LOUVERS ALLOWED
B	PREPARE FOR INSTALLATION OF DOCK LIGHT/FAN EQUIPMENT BUT DO NOT INSTALL
C	16 GA MINIMUM THICKNESS METAL. LAMINATED GLAZING TO BE IMPACT RESISTANCE RATED (IF APPLICABLE)
D	DOOR HAS CARD READER FOR ACCESS CONTROL. REFER TO SECURITY DRAWINGS (BY OTHERS) FOR MORE INFORMATION.
E	PAINT INTERIOR SIDE OF DOOR AND FRAME PT-4 (SAFETY RED) AND OTHER SIDE OF DOOR/FRAME EPT-2
F	NOT USED.
G	DOOR TO BE 1HR RATED. DOORS WITH LITES TO HAVE RATED GLAZING AND MARKED PER CODE
H	NO HARDWARE ON EXTERIOR
I	HARDWARE PER MANUFACTURER.
J	PROVIDE AUDIBLE AND VISUAL ALARMS. REFER TO ELECTRICAL
K	WHERE A SIGN CONTAINING RAISED CHARACTERS AND BRAILLE IS PROVIDED AT DOUBLE DOORS WITH (1) ACTIVE LEAF, THE SIGN SHALL BE LOCATED ON THE INACTIVE LEAF
L	WHERE A SIGN CONTAINING RAISED CHARACTERS AND BRAILLE IS PROVIDED AT DOUBLE DOORS WITH (2) ACTIVE LEAVES, THE SIGN SHALL BE LOCATED TO THE RIGHT OF THE RIGHT HAND DOOR
M	ACCESSIBLE AUTOMATIC PUSH-BUTTON OPERATOR REQUIRED BOTH SIDES OF DOOR
N	DOOR HAS PANIC HARDWARE ON EGRESS SIDE
O	GATE TO BE SUPPLIED BY, AND HARDWARE COORDINATED WITH, THE CAGE MANUFACTURER

DOOR ABBREVIATIONS

AL	ALUMINUM
ANOD.	ANODIZED ALUMINUM
CL	CHAIN LINK
CLR	CLEAR
EPT	EXTERIOR PAINT
FA	FABRIC
FF	FACTORY FINISH
HM	HOLLOW METAL
PT	PAINT
SF	STOREFRONT
STL	STEEL
WM	WOVEN MESH

NOTE:
THE DOOR HARDWARE SETS IDENTIFIED HEREIN ARE LISTED IN SPECIFICATION SECTION 087100.

NOTE:
"1" INDICATES TEMPERED - CATEGORY II SAFETY GLASS ON BOTH PANES

EXTERIOR DOOR AND FRAME SCHEDULE

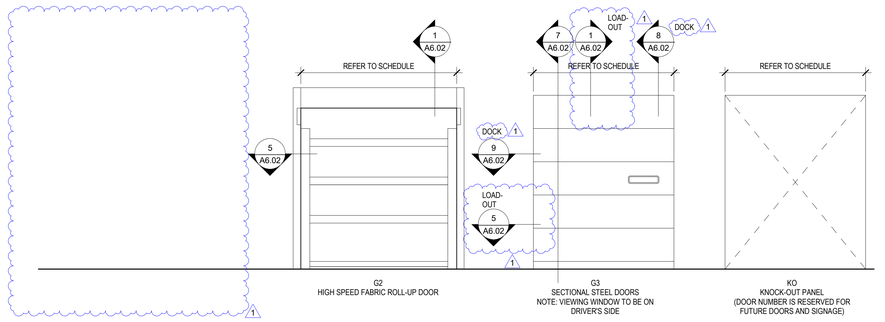
DOOR NO.	DOOR USE	DOOR WIDTH	DOOR HEIGHT	DOOR TYPE	DOOR MATERIAL	DOOR FINISH	FRAME TYPE	FRAME MATERIAL	FRAME FINISH	DETAILS HEAD	DETAILS JAMB	DETAILS SILL	FIRE RATING	HARDWARE SET	COMMENTS
N001	ASSOCIATE ENTRY	3' - 0"	7' - 0"	A	AL	ANOD.	F5	AL	ANOD.	11/A6.01	14/A6.01	1/A6.01 (SIM)	-	S-05C	NOTES: D, L, M, N
N002	ASSOCIATE ENTRY	3' - 0"	7' - 0"	A	AL	ANOD.	F5	AL	ANOD.	11/A6.01	14/A6.01	1/A6.01 (SIM)	-	S-05C (ALT)	NOTES: D, L, M, N
N003	BREAKROOM EXIT	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04	NOTES: E, H, N
N004	FIRE RISER	6' - 0"	7' - 0"	BB	HM	EPT-2	F2	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-07	NOTES: E, K
N005	ELECTRICAL ROOM	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04D	NOTES: E
E006	WAREHOUSE	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04	NOTES: E, H, N
E007	WAREHOUSE	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04	NOTES: E, H, N
E008	WAREHOUSE	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04	NOTES: E, H, N
S009	WAREHOUSE - TDR	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-05	TDR DOOR. NOTES: D, E, N
W010	WAREHOUSE - TRASH & DSP	4' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-05C	TRASH & DSP DOOR. NOTE: D, E, N
W011	WAREHOUSE	3' - 0"	7' - 0"	B	HM	EPT-2	F1	HM	EPT-2	10/A6.01	13/A6.01	1/A6.01	-	S-04	NOTES: E, H, N

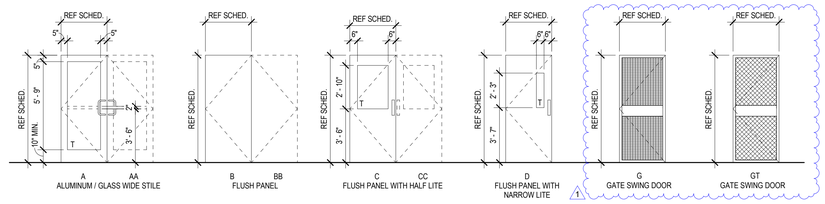
OVERHEAD DOOR AND FRAME SCHEDULE

DOOR NO.	DOOR USE	DOOR WIDTH	DOOR HEIGHT	DOOR TYPE	DOOR MATERIAL	DOOR FINISH	FRAME TYPE	FRAME MATERIAL	FRAME FINISH	DETAILS HEAD	DETAILS JAMB	DETAILS SILL	FIRE RATING	HARDWARE SET	COMMENTS
101	WAREHOUSE (KNOCKOUT)	9' - 0"	10' - 0"	KO	--	--	--	--	--	--	--	--		--	
102	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
103	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
104	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
105	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
106	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
107	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
108	WAREHOUSE (KNOCKOUT)	9' - 0"	10' - 0"	KO	--	--	--	--	--	--	--	--		--	
109	WAREHOUSE (KNOCKOUT)	9' - 0"	10' - 0"	KO	--	--	--	--	--	--	--	--		--	
110	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
111	WAREHOUSE (DOCK)	9' - 0"	10' - 0"	G3	STL	FF	--	STL	--	8/A6.02	9/A6.02	--		--	NOTE: I
401	WAREHOUSE (LOAD-OUT-S) 1	10' - 0"	10' - 0"	G3 1	STL	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J
401A	WAREHOUSE (LOAD-OUT-HS)	10' - 0"	10' - 0"	G2	FA	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J
402	WAREHOUSE (LOAD-OUT-S) 1	10' - 0"	10' - 0"	G3 1	STL	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J
402A	WAREHOUSE (LOAD-OUT-HS)	10' - 0"	10' - 0"	G2	FA	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J
403	WAREHOUSE (LOAD-OUT-S) 1	10' - 0"	10' - 0"	G3 1	STL	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J
403A	WAREHOUSE (LOAD-OUT-HS)	10' - 0"	10' - 0"	G2	FA	FF	--	STL	--	1/A6.02	5/A6.02	10/A6.02		--	NOTE: I, J

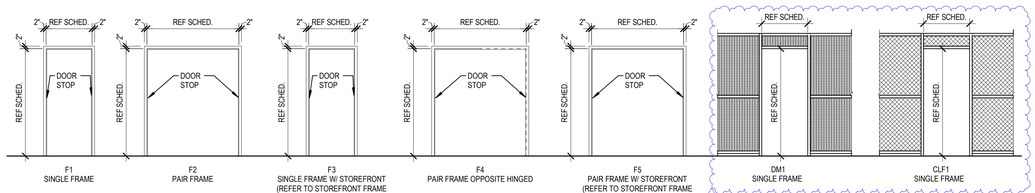
INTERIOR DOOR AND FRAME SCHEDULE

DOOR NO.	DOOR USE	DOOR WIDTH	DOOR HEIGHT	DOOR TYPE	DOOR MATERIAL	DOOR FINISH	FRAME TYPE	FRAME MATERIAL	FRAME FINISH	DETAILS HEAD	DETAILS JAMB	DETAILS SILL	FIRE RATING	HARDWARE SET	COMMENTS
101	ASSOCIATE ENTRY	6' - 0"	7' - 0"	CC	HM	PT-7	F2	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-01D (ALT)	NOTES: C, L, N, D
103	BREAKROOM	6' - 0"	7' - 0"	CC	HM	PT-7	F4	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-14	NOTES: C
105	MULTI-FAITH ROOM	3' - 0"	7' - 0"	D	HM	PT-7	F1	HM	PT-7	5/A6.01	7/A6.01	--	--	TI-18	
106	LACTATION ROOM	3' - 0"	7' - 0"	B	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-16A	
108	SINGLE USER RESTROOM	3' - 0"	7' - 0"	B	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-16	NOTE: A
109	SINGLE USER RESTROOM	3' - 0"	7' - 0"	B	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-16	NOTE: A
110	SINGLE USER RESTROOM	3' - 0"	7' - 0"	B	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-16	NOTE: A
111	SINGLE USER RESTROOM	3' - 0"	7' - 0"	B	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-16	NOTE: A
114	MANAGER'S OFFICE	3' - 0"	7' - 0"	D	HM	PT-7	F1	HM	PT-7	4/A6.01	6/A6.01	--	--	TI-07	NOTE: C
115	DEMARC CAGE	4' - 0"	8' - 0"	G	WM	--	1 (DM1)	WM	--	--	--	--	--	TI-26	BY GC





DOOR TYPES



FRAME TYPES

DOOR AND FRAME TYPES

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT JACOB S BUSH No. 912522 STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

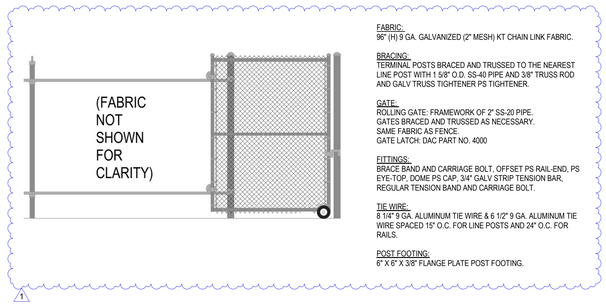
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

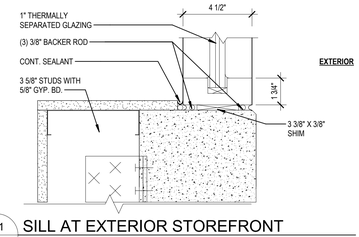
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
DOOR TYPES, SCHEDULES, AND DETAILS

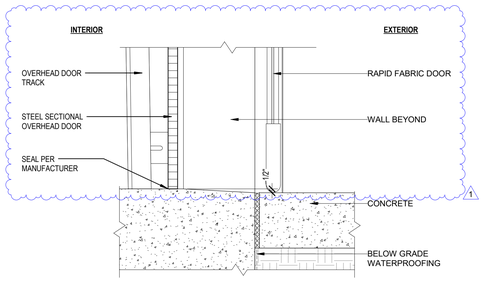
A6.01



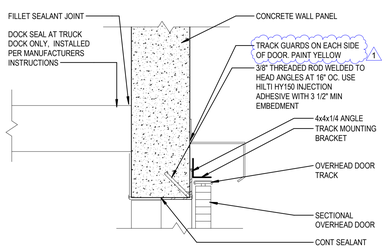
12 A6.02 ROLLING GATE ELEVATION
Scale: 3" = 1'-0"



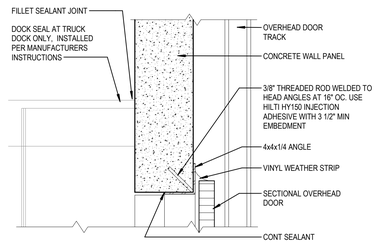
11 A6.02 SILL AT EXTERIOR STOREFRONT
Scale: 3" = 1'-0"



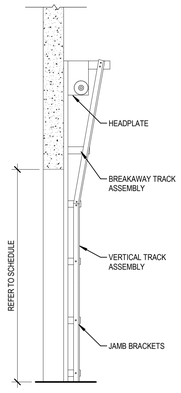
10 A6.02 G2-G3 DOOR - SILL 1
Scale: 1 1/2" = 1'-0"



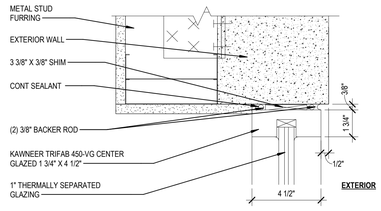
9 A6.02 G3 DOOR JAMB
Scale: 1 1/2" = 1'-0"



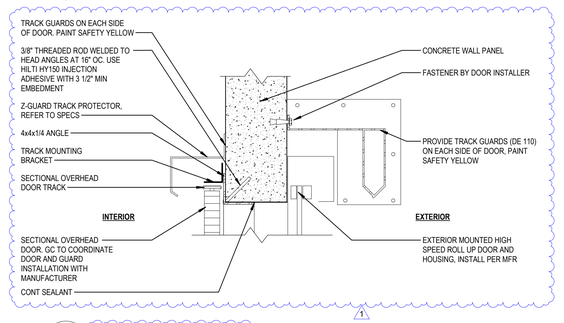
8 A6.02 G3 DOOR HEAD
Scale: 1 1/2" = 1'-0"



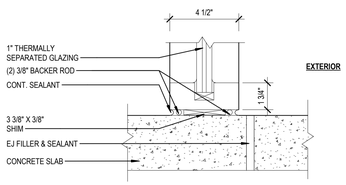
7 A6.02 G3 DOOR - FULL VERTICAL TRACK
Scale: 1/2" = 1'-0"



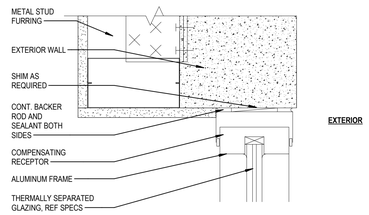
6 A6.02 JAMB AT EXTERIOR STOREFRONT
Scale: 3" = 1'-0"



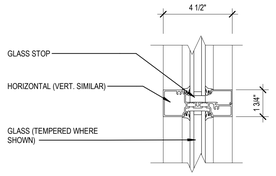
5 A6.02 G2-G3 DOOR - JAMB 1
Scale: 1 1/2" = 1'-0"



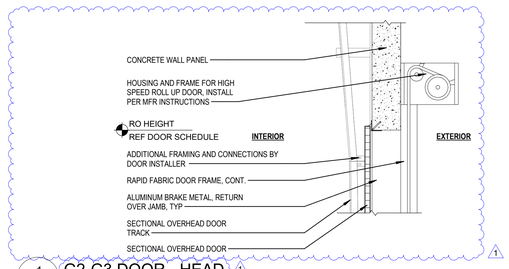
4 A6.02 SILL AT EXTERIOR STOREFRONT
Scale: 3" = 1'-0"



3 A6.02 STOREFRONT HEAD EXTERIOR
Scale: 3" = 1'-0"



2 A6.02 STOREFRONT MULLION
Scale: 3" = 1'-0"



1 A6.02 G2-G3 DOOR - HEAD 1
Scale: 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL/RM
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
DOOR DETAILS

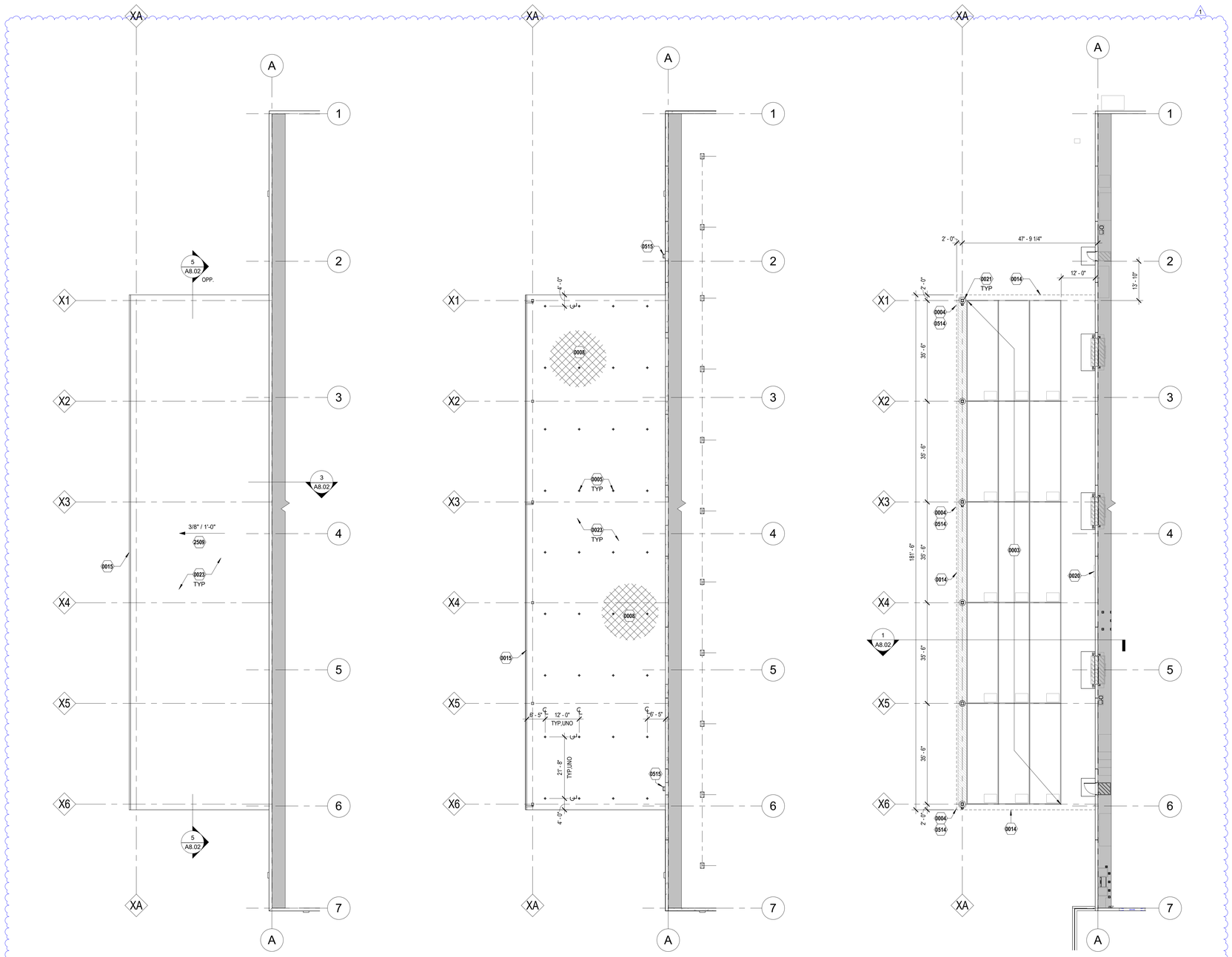
A6.02

SHEET NOTES

1. REFER TO STRUCTURAL PLANS FOR ADDITIONAL INFORMATION.
2. REFER TO MEP DRAWINGS FOR ADDITIONAL INFORMATION RELATED TO LIGHTING AND EQUIPMENT.
3. ALL DOWNSPOUTS TO BE CONNECTED TO UNDERGROUND STORM SEWERS. REFER TO CIVIL DRAWINGS.
4. REFER TO ELEVATIONS FOR CANOPY FINISHES.
5. GC TO PROVIDE BIRD NETTING ON THE UNDERSIDE OF THE CANOPY, REF SPECS

KEYNOTES

0003	VEHICLE LAUNCH PAD.
0004	CANOPY DOWNSPOUT; PREFINISHED; COLOR TO MATCH EPT-1. CONNECT TO UNDERGROUND STORMWATER SYSTEM. REFER TO CIVIL AND PLUMBING DRAWINGS. COORDINATE SIZE WITH CANOPY MANUFACTURER. REFERENCE DETAIL 2/A8.02 AND 7/A8.02. LOCATE ON "DOWNSTREAM" SIDE OF VEHICULAR FLOW. REFER TO PHOTO ON SHEET A8.02 FOR INSTALLATION EXPECTATIONS.
0005	CANOPY LIGHT FIXTURE. REFER TO ELECTRICAL DRAWINGS.
0008	CONTINUOUS BIRD NETTING ON UNDERSIDE OF CANOPY. DO NOT BLOCK LIGHTS WITH NETTING. PROVIDE ZIPPERS AT ALL MAINTENANCE ACCESS-POINTS. REFERENCE SPECS.
0014	EXTENTS OF EXTERIOR VAN LOADING CANOPY (ABOVE).
0015	CANOPY GUTTER; PREFINISHED; COLOR TO MATCH EPT-1. COORDINATE SIZE WITH CANOPY MANUFACTURER. REFERENCE DETAIL 2/A8.02 AND 6/A8.02.
0020	COUNT-DOWN CLOCK. TOP OF CLOCK TO BE MOUNTED 16'-0" AFF. REFER TO ELECTRICAL.
0021	POURED-IN-PLACE CONCRETE COLUMN SURROUND. PAINT SAFETY YELLOW. COORDINATE WITH STRUCTURAL DRAWINGS.
0023	TPO ROOF SYSTEM.
0514	BENT METAL PLATE DOWNSPOUT PROTECTOR WITH OPENING FOR CLEANOUT - COORDINATE WITH DOWNSPOUT INSTALLATION. SECURELY FASTEN PLATE TO COLUMN BASE AND SLAB. PAINT SAFETY YELLOW. REFER TO DETAIL 5/A5.03 & 6/A5.03.
0515	EXTERIOR EGRESS LIGHT ABOVE EXTERIOR DOOR; REFER TO MEP.
2509	SLOPE DIRECTION TYP.



3 A8.01 LAUNCH PAD CANOPY ROOF PLAN
Scale: 1/16" = 1'-0"

2 A8.01 LAUNCH PAD CANOPY REFLECTED CEILING PLAN
Scale: 1/16" = 1'-0"

1 A8.01 LAUNCH PAD CANOPY PLAN
Scale: 1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS

6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

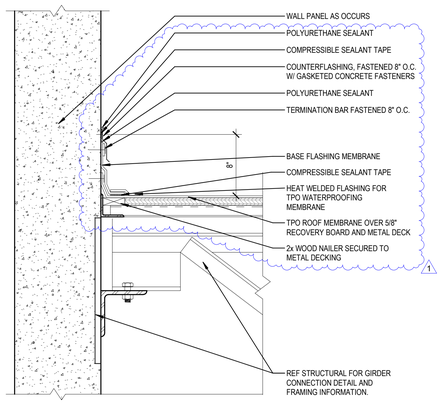
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL / RM
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
LAUNCH PAD CANOPY PLANS

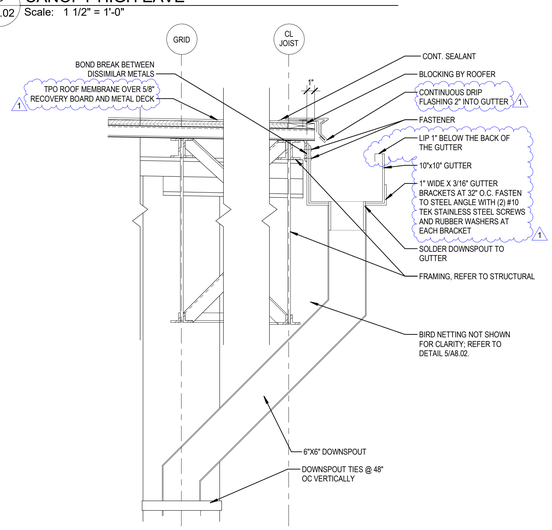
A8.01



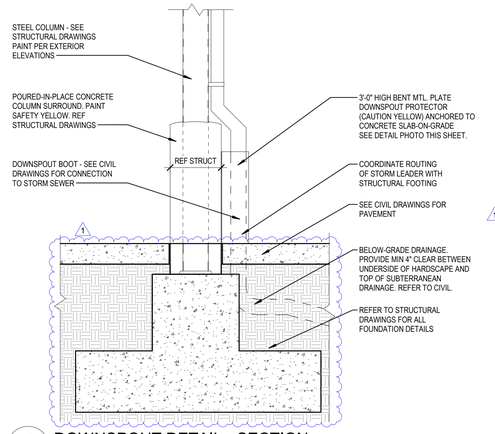
4 A8.02 TYPICAL CANOPY COLUMN - REPRESENTATIVE PHOTO
Scale: 12" = 1'-0"



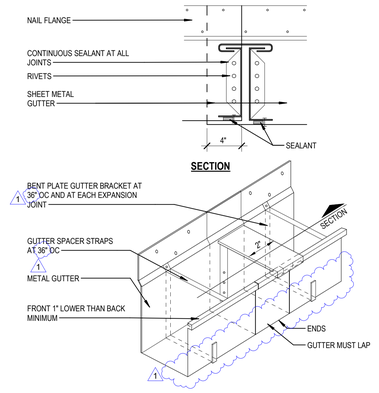
3 A8.02 CANOPY HIGH EAVE
Scale: 1 1/2" = 1'-0"



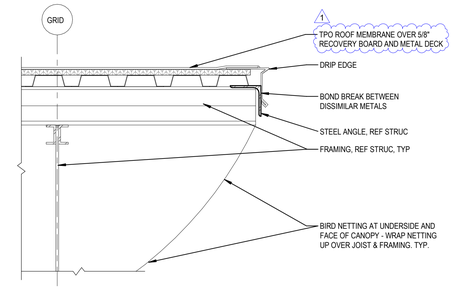
2 A8.02 CANOPY LOW EAVE
Scale: 1 1/2" = 1'-0"



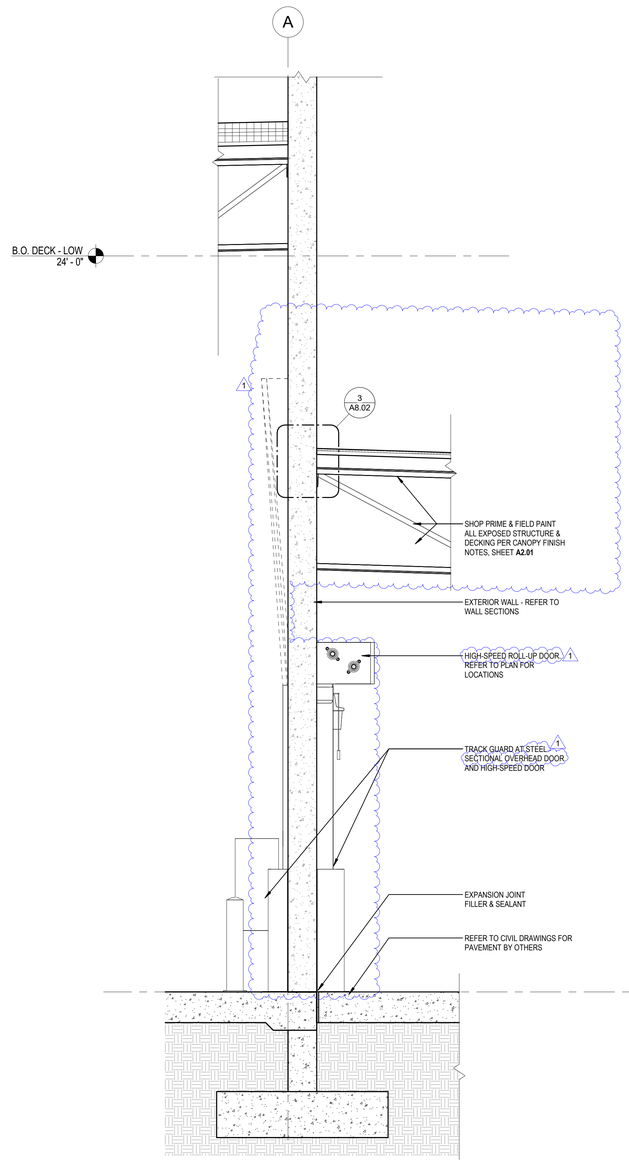
7 A8.02 DOWNSPOUT DETAIL - SECTION
Scale: 1/2" = 1'-0"

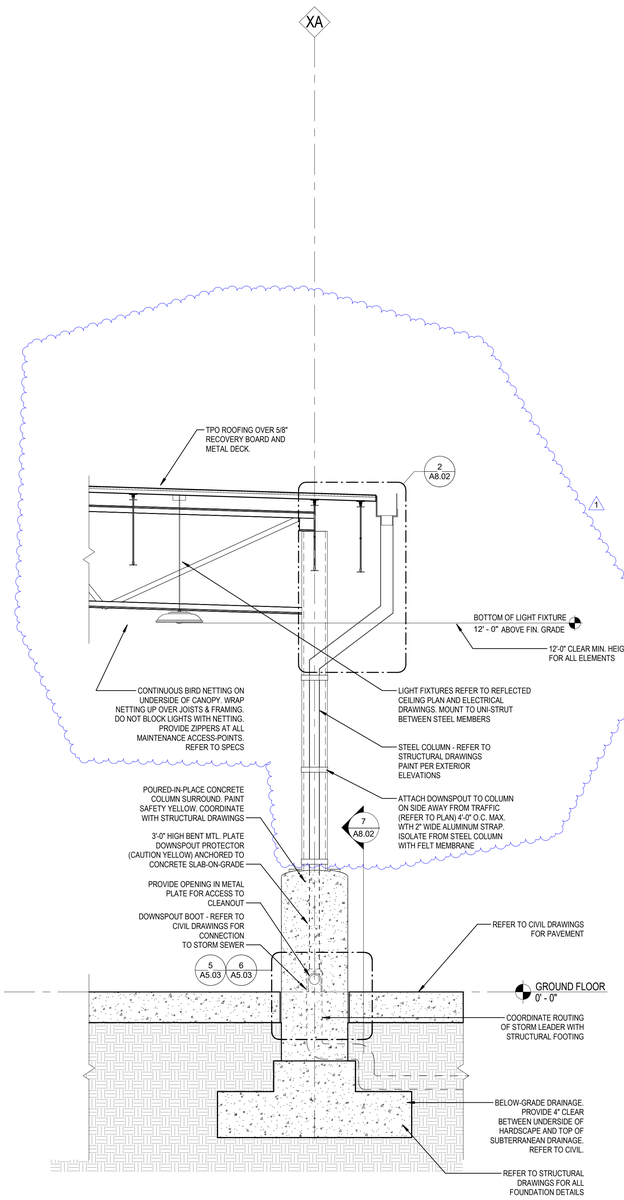


6 A8.02 GUTTER EXPANSION JOINT
Scale: 3" = 1'-0"



5 A8.02 CANOPY RAKE - STEEL BEAM
Scale: 1 1/2" = 1'-0"





1 A8.02 CANOPY SECTION
Scale: 1/2" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 866.208.4826

REGISTERED ARCHITECT
JACOB S BUSH
No. 912522
STATE OF ARKANSAS
6.10.2026 Exp: 7.31.2026

TRAMMELL CROW

PROJECT TCC MOUNTAIN

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	MCL
Checked By:	GJB/TB
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
LAUNCH PAD CANOPY SECTION & DETAILS

A8.02

DESIGN CRITERIA

1. GOVERNING BUILDING CODE: ..... **2021 ARKANSAS FIRE PREVENTION CODE (2021 IBC)**
2. RISK CATEGORY ..... **II**
3. SUPERIMPOSED DEAD
   - ROOF:
     - SPRINKLERS ..... **3 PSF**
     - MECHANICAL & LIGHTING ..... **3 PSF**
     - SOLAR PANELS (FUTURE ALLOWANCE) ..... **5 PSF**
     - MISC ..... **1 PSF**
     - TOTAL (INCL. SELF-WEIGHT OF STRUCTURE) ..... **20 PSF**
   - CANOPY:
     - SPRINKLERS ..... **3 PSF**
     - EV CHARGING, LIGHTING, ETC. ..... **1.5 PSF**
     - TOTAL (INCL. SELF-WEIGHT OF STRUCTURE) ..... **15 PSF**
4. LIVE
   - ROOF ..... **20 PSF**
5. SNOW
   - GROUND SNOW (Pg) ..... **15 PSF**
   - FLAT ROOF SNOW LOAD (Pf) ..... **15.5 PSF BUILDING, 18.6 PSF CANOPY**
   - IMPORTANCE FACTOR **1.0**
   - (SNOW BUILD-UP IN ACCORDANCE W/ IBC)
6. WIND
   - ULTIMATE DESIGN WIND SPEED (3 SECOND GUST), Vult ..... **107 MPH**
   - NOMINAL DESIGN WIND SPEED (3 SECOND GUST), Vasd ..... **83 MPH**
   - WIND EXPOSURE CATEGORY ..... **C**
   - INTERNAL PRESSURE COEFFICIENT, GCpi ..... **+/-0.18**
   - DESIGN WIND PRESSURE ON COMPONENTS AND CLADDING
   - NOTES:
     1. RE: ASCE 7-16 FIGURES 30.3-1 AND 30.3-2A.
     2. REFER TO CODE FOR EFFECTIVE TRIBUTARY AREAS NOT LISTED.
     3. POSITIVE VALUES SIGNIFY PRESSURES ACTING TOWARD THE NOTED SURFACE AND NEGATIVE VALUES SIGNIFY PRESSURES ACTING AWAY FOR THE NOTED SURFACE.
     4. WALL C&C END ZONE WIDTH, a = 9'-8".
     5. ROOF C&C END ZONE WIDTHS:

BUILDING	CANOPY:
ZONE 1 = 15'-6"	ZONE 1 = 12'-8"
ZONE 2 = 15'-6"	ZONE 2 = 12'-8"
ZONE 3 = 5'-4"	ZONE 3 = 4'-4"

BUILDING NET ROOF PRESSURES (0.6W)	EFFECTIVE TRIBUTARY AREA	
	≤10 SQ. FT.	≥200 SQ. FT.
ZONE 1'	-15.0 PSF	-9.9 PSF
ZONE 1	-21.6 PSF	-14.7 PSF
ZONE 2	-34.5 PSF	-20.9 PSF
ZONE 3	-47.0 PSF	-23.8 PSF
ZONE 1, 2 & 3	9.6 PSF	9.6 PSF

WALL PRESSURES (0.6W)	EFFECTIVE TRIBUTARY AREA	
	≤10 SQ. FT.	≥200 SQ. FT.
ZONE 4	-16.3 PSF	-13.4 PSF
ZONE 5	-20.0 PSF	-14.3 PSF
ZONE 4 & 5	15.0 PSF	12.1 PSF

CANOPY NET ROOF PRESSURES (0.6W)	EFFECTIVE TRIBUTARY AREA	
	≤10 SQ. FT.	≥200 SQ. FT.
ZONE 1'	-19.5 PSF	-13.5 PSF
ZONE 1	-30.3 PSF	-19.1 PSF
ZONE 2	-38.3 PSF	-25.1 PSF
ZONE 3	-50.4 PSF	-27.9 PSF
ZONE 1, 2 & 3	11.4 PSF	10.1 PSF

7. RAIN
   - 15-MINUTE RAINFALL INTENSITY (i) ..... **6.54 IN/HR**
8. SEISMIC
   - 0.2 SEC. SPECTRAL RESPONSE ACCELERATION (Ss) **0.339**
   - 1.0 SEC. SPECTRAL RESPONSE ACCELERATION (S1) **0.153**
   - DESIGN SPECTRAL ACCELERATION (SDS) **0.345**
   - DESIGN SPECTRAL ACCELERATION (SD1) **0.233**
   - SITE CLASSIFICATION ..... **D**
   - SEISMIC DESIGN CATEGORY ..... **D**
   - IMPORTANCE FACTOR **1.0**
   - ANALYSIS PROCEDURE ..... **EQUIVALENT LATERAL FORCE**
   - SEISMIC FORCE RESISTING SYSTEM (BUILDING) ..... **BEARING WALLS: SPECIAL REINFORCED CONCRETE SHEAR WALLS**
   - SEISMIC FORCE RESISTING SYSTEM (CANOPY) ..... **STEEL SPECIAL CANTILEVER COLUMNS**
   - RESPONSE MODIFICATION FACTOR (R) ..... **5 (BUILDING), 2.5 (CANOPY)**
   - OVERSTRENGTH FACTOR (Ω) ..... **2 (BUILDING), 1.25 (CANOPY)**
   - SEISMIC RESPONSE COEFFICIENT (Cs) ..... **0.069 (BUILDING), 0.138 (CANOPY)**
   - BASE SHEAR (V) (1.0) ..... **0.069W (BUILDING), 0.138W (CANOPY)**

GENERAL

1. THE PROJECT SPECIFICATIONS, DRAWINGS, STANDARD DETAILS, DETAILS IN THE DRAWINGS, AND THE STRUCTURAL NOTES ARE TO BE COMPLEMENTARY. IN THE CASE OF AN INCONSISTENCE NOT CLARIFIED BY THE DESIGNER OF RECORD THE MOST STRINGENT, HIGHEST QUALITY AND BEST QUALITY PROVISIONS SHALL BE PROVIDED.
2. THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS BEFORE CONSTRUCTION. THE ARCHITECT SHALL BE NOTIFIED OF ANY DISCREPANCIES OR INCONSISTENCIES.DO NOT SCALE DRAWINGS; COORDINATE DIMENSIONS WITH ARCHITECTURAL DRAWINGS.
3. ALL WORK SHALL CONFORM TO THE MINIMUM STANDARDS OF THE GOVERNING BUILDING CODE
4. RE: ARCHITECTURAL DRAWINGS INCLUDING BUT NOT LIMITED TO THE FOLLOWING:
   - A. SIZE AND LOCATION OF ALL OPENINGS. EXCEPT AS NOTED.
   - B. SIZE AND LOCATION OF ALL INTERIOR AND EXTERIOR NONBEARING WALLS
   - C. SIZE AND LOCATION OF ALL CONCRETE CURBS, FLOOR DRAINS, SLOPES, DEPRESSED AREAS, CHANGES IN LEVEL, CHAMFERS, GROOVES, INSERTS, ETC.
   - D. SIZE AND LOCATION OF ALL FLOOR AND ROOF OPENINGS, EXCEPT AS SHOWN.
   - E. FLOOR AND ROOF FINISHES.
   - F. STAIR FRAMING AND DETAILS, EXCEPT AS SHOWN.
   - G. DIMENSIONS NOT SHOWN ON STRUCTURAL DRAWINGS.
5. RE: MEP CONSTRUCTION DOCUMENTS FOR THE FOLLOWING, INCLUDING BUT NOT LIMITED TO:
   - A. PIPE RUNS, SLEEVES, HANGERS, TRENCHES, WALL AND SLAB OPENINGS, ETC., EXCEPT AS SHOWN OR NOTED.
   - B. ELECTRICAL CONDUIT RUNS, BOXES, OUTLETS IN WALLS AND SLABS.
   - C. CONCRETE INSERTS FOR FIXTURES.
   - D. SIZE AND LOCATION OF MACHINE OR EQUIPMENT BASES, ANCHOR BOLTS FOR MOTOR MOUNTS.
   - E. SEISMIC BRACING REQUIREMENTS.
6. METHODS, PROCEDURES, AND SEQUENCES OF CONSTRUCTION ARE THE RESPONSIBILITY OF THE CONTRACTOR. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO MAINTAIN AND ENSURE THE INTEGRITY OF THE STRUCTURE AT ALL STAGES OF CONSTRUCTION.
7. THE CONTRACT STRUCTURAL DRAWINGS AND SPECIFICATIONS REPRESENT THE FINISHED STRUCTURE. THEY DO NOT INDICATE THE METHOD OF CONSTRUCTION. THE CONTRACTOR SHALL PROVIDE ALL MEASURES NECESSARY TO PROTECT THE STRUCTURE, WORKERS AND VISITORS DURING CONSTRUCTION. SUCH MEASURE SHALL INCLUDE, BUT NOT BE LIMITED TO, BRACING, SHORING FOR CONSTRUCTION LOADS, ETC. VISITS TO THE SITE BY THE STRUCTURAL ENGINEER SHALL NOT INCLUDE REVIEW OF THE ABOVE ITEMS.
8. OPENINGS, POCKETS, ETC. SHALL NOT BE PLACED IN STRUCTURAL ELEMENTS UNLESS SPECIFICALLY DETAILED OR APPROVED BY THE STRUCTURAL ENGINEER.
9. CONSTRUCTION LOAD (MATERIAL AND EQUIPMENT) SHALL NOT EXCEED THE DESIGN LIVE LOAD PER SQUARE FOOT. PROVIDE ADEQUATE SHORING AND/ OR BRACING WHERE STRUCTURES HAVE NOT ATTAINED DESIGN STRENGTH.
10. WHEN A DETAIL IS IDENTIFIED, THE CONTRACTOR SHALL APPLY THIS DETAIL IN ESTIMATING AND CONSTRUCTION TO EVERY LIKE CONDITION WHETHER OR NOT THE REFERENCE IS MADE IN EVERY INSTANCE.
11. ANY REFERENCES TO THE RECOMMENDATIONS, GUIDELINES, OR REQUIREMENTS IN NATIONAL PUBLICATIONS, SUCH AS BUT NOT LIMITED TO ASCE, ASTM, IBC, ACI, AISC, NDS, OR AWS, IN THE CONSTRUCTION DOCUMENTS SHALL BE FOLLOWED AS IF THEY ARE SPECIFICALLY MANDATED.

STRUCTURAL DEFERRED SUBMITTALS

1. THE FOLLOWING STRUCTURAL SUBMITTALS ARE TO BE DEFERRED SUBMITTALS BY ARKANSAS LICENSED AND REGISTERED ENGINEERS:
   - A. EXTERIOR STEEL STAIRS
   - B. STEEL JOISTS AND JOIST GIRDERS

FOUNDATION

1. THE SUBSURFACE INFORMATION AND FOUNDATION DESIGN ARE BASED ON THE FOLLOWING GEOTECHNICAL RECOMMENDATIONS:
   - PREPARED BY ..... **TERRACON**
   - DATED **10/10/2025**
2. FOUNDATIONS FOR THE STRUCTURE HAVE BEEN DESIGNED USING THE FOLLOWING VALUES:
   - ALLOWABLE SOIL BEARING ..... **2500 PSF**
   - MINIMUM FOUNDATION BEARING DEPTH ..... **24"**
3. THE CONTRACTOR SHALL PERFORM EXCAVATIONS, FOOTING CONSTRUCTION AND PREPARATION OF THE SUB GRADE UNDER THE SLAB ON GRADE IN ACCORDANCE WITH THE RECOMMENDATIONS CONTAINED IN THE GEOTECHNICAL REPORT AND THE PROJECT SPECIFICATIONS.
4. FOUNDATION CONDITIONS NOTED DURING CONSTRUCTION, WHICH DIFFER FROM THOSE DESCRIBED IN THE GEOTECHNICAL REPORT SHALL BE REPORTED TO THE STRUCTURAL ENGINEER AND/OR GEOTECHNICAL ENGINEER BEFORE FURTHER CONSTRUCTION IS ATTEMPTED.
5. CONTRACTOR WILL PROVIDE FOR DE-WATERING OF EXCAVATIONS FROM EITHER SURFACE, GROUND, OR SEEPAGE WATER.
6. ALL ABANDONED FOOTINGS, UTILITIES, ETC., THAT INTERFERE WITH NEW CONSTRUCTION SHALL BE REMOVED.
7. SITE PREPARATION, OVER-EXCAVATION / RECOMPACTION OF SOILS, AND THE INSTALLATION OF FOUNDATION AND WALL DRAINS AS REQ'D SHALL BE PERFORMED IN ACCORDANCE WITH RECOMMENDATIONS PRESENTED IN THE SOILS REPORT REFERENCED ABOVE.
8. CONTRACTOR SHALL PROVIDE FOR DESIGN AND INSTALLATION OF ALL CRIBBING, SHEATHING, AND SHORING REQUIRED TO SAFELY RETAIN THE EARTH BANKS.

CONCRETE

1. AGGREGATE FOR NORMAL WEIGHT CONCRETE SHALL CONFORM TO ASTM C33. AGGREGATE FOR LIGHTWEIGHT CONCRETE SHALL CONFORM TO ASTM C330. PORTLAND CEMENT SHALL BE TYPE I OR TYPE II AND SHALL CONFORM TO ASTM C150. MINIMUM COARSE AGGREGATE SIZE IS 1/2 INCH. USE AGGREGATES WITH A NOMINAL MAXIMUM SIZE OF 1" FOR SLABS ON GRADE.
2. ADMIXTURES MAY BE USED WITH PRIOR APPROVAL OF THE ENGINEER. ADMIXTURES USED TO INCREASE THE WORKABILITY OF THE CONCRETE SHALL NOT BE CONSIDERED TO REDUCE THE SPECIFIED MINIMUM CEMENT CONTENT. CALCIUM CHLORIDE SHALL NOT BE USED.
3. COMPRESSIVE STRENGTHS OF CONCRETE AT 28 DAYS SHALL BE AS FOLLOWS:
   - FOOTINGS & MECHANICAL PADS ..... **3000 PSI**
   - SLAB ON GRADE ..... **4000 PSI**
   - CONCRETE TILT-WALL ..... **5000 PSI**
   - CONCRETE FOUNDATION AND RETAINING WALLS ..... **4500 PSI**
4. RE: SPECS FOR PERMISSIBLE SLUMP VALUES.
5. MAXIMUM WEIGHT OF NORMAL-WEIGHT CONCRETE SHALL BE 150 PCF
6. REFER TO SPECIFICATIONS FOR ADDITIONAL CONCRETE MIX REQUIREMENTS.
7. REFER TO SPECIFICATIONS FOR LOW-CARBON CONCRETE BID ALTERNATE.
8. MIXING, TRANSPORTING, AND PLACING OF CONCRETE SHALL CONFORM TO THE LATEST EDITION OF ACI 304R AND PROJECT SPECIFICATIONS. ALL CONCRETE SURFACES AGAINST WHICH CONCRETE IS TO BE PLACED SHALL BE THOROUGHLY CLEANED. LAITANCE AND STANDING WATER SHALL BE REMOVED.
9. ALL REINFORCING BARS, WELDED WIRE FABRIC, ANCHOR BOLTS, EMBEDDED PLATES AND OTHER CONCRETE INSERTS SHALL BE WELL SECURED IN POSITION PRIOR TO PLACING CONCRETE. PROVIDE STANDARD BAR CHAIRS AND SPACERS AS REQUIRED TO MAINTAIN CONCRETE PROTECTION SPECIFIED. "PULLING-UP" WELDED WIRE FABRIC WITH HOOKS DURING CONCRETE PLACEMENT IS NOT PERMITTED.
10. CONCRETE COVER PROTECTION FOR REINFORCEMENT BARS SHALL BE AS FOLLOWS:
    (RE: ACI 318 SECTION 7.7 FOR CONDITIONS NOT NOTED.)
    - A. CONCRETE CAST AGAINST AND PERMANENTLY EXPOSED TO EARTH ..... **3"**
    - B. CONCRETE EXPOSED TO EARTH OR WEATHER:
      - BARS #6 AND LARGER ..... **2"**
      - BARS #5 AND SMALLER ..... **1 1/2"**
    - C. CONCRETE NOT EXPOSED TO WEATHER OR IN CONTACT WITH GROUND:
      - SLABS, WALLS, JOISTS - #11 BARS AND SMALLER ..... **3/4"**
      - BEAMS, COLUMNS - TIES, STIRRUPS, SPIRALS ..... **1 1/2"**
11. REINFORCING STEEL FOR CONCRETE SHALL BE GRADE 60 OR GRADE 75 AS SPECIFIED AND SHALL CONFORM TO ASTM A615 OR A706 (GRADE 60 ONLY) FOR WELD TYPE REINFORCING STEEL. REINFORCING BARS SHALL NOT BE TACK WELDED, WELDED, HEATED, OR CUT UNLESS INDICATED ON THE CONTRACT DOCUMENTS OR APPROVED BY THE STRUCTURAL ENGINEER.
12. WELDING REINFORCEMENT BARS, WHEN APPROVED BY THE STRUCTURAL ENGINEER, SHALL CONFORM TO THE AMERICAN WELDING SOCIETY STANDARD D1.4, LATEST EDITION.E70XX ELECTRODES SHALL BE USED IN WELDING A706 REINFORCING BARS TO STRUCTURAL STEEL.
13. DETAILING OF CONCRETE REINFORCEMENT BARS AND ACCESSORIES SHALL CONFORM TO THE RECOMMENDATIONS OF THE LATEST EDITION OF THE ACI 315 DETAILING MANUAL.
14. GROUT SHALL BE NON-SHRINK GROUT CONFORMING TO ASTM C1107 AND SHALL HAVE A SPECIFIED COMPRESSIVE STRENGTH AT 28 DAYS OF 5000 PSI. PRE GROUTING OF BASE PLATES WILL NOT BE PERMITTED.
15. FORMS FOR CONCRETE SHALL BE LAID OUT AND CONSTRUCTED TO PROVIDE FOR THE REQUIRED CAMBERS/SLOPES. DO NOT REMOVE FORMS OR BRACING UNTIL CONCRETE HAS GAINED THE SPECIFIED 28 DAY STRENGTH OR SUFFICIENT STRENGTH TO CARRY ITS OWN WEIGHT AND SUPERIMPOSED LOADS PER THE APPLICABLE PROVISIONS OF ACI 347.
16. CONDUIT OR PIPE SIZE (OD) SHALL NOT EXCEED 30 PERCENT OF SLAB THICKNESS AND SHALL BE PLACED BETWEEN TOP AND BOTTOM REINFORCING, UNLESS SPECIFICALLY DETAILED OTHERWISE. CONCENTRATION OF CONDUITS OR PIPES SHALL BE AVOIDED EXCEPT WHERE DETAILED OPENINGS ARE PROVIDED.
17. PROVIDE SLEEVES FOR PLUMBING AND ELECTRICAL OPENINGS IN CONCRETE BEFORE PLACING. CORING THROUGH CONCRETE IS NOT PERMITTED EXCEPT WHERE SHOWN. NOTIFY THE STRUCTURAL ENGINEER IN ADVANCE OF CONDITIONS NOT SHOWN ON THE DRAWINGS.
18. CURE AND PROTECT CONCRETE IMMEDIATELY AFTER PLACEMENT IN ACCORDANCE WITH ACI 308, ACI 305, AND ACI 306. CURING COMPOUNDS USED ON CONCRETE THAT IS TO RECEIVE A RESILIENT TILE FINISH SHALL BE APPROVED BY THE TILE MANUFACTURER BEFORE USE.
19. PROVIDE CONSTRUCTION OR CONTROL JOINTS IN SLABS-ON-GRADE AS SHOWN IN TYPICAL DETAILS SO AS TO DIVIDE SLABS INTO APPROXIMATELY RECTANGULAR AREAS NOT OVER 225 SQUARE FEET WITH A RATIO OF LONG TO SHORT SIDES NOT OVER 1.5 AND SPACING NOT EXCEEDING 15'-0" ON CENTER. IN ADDITION, PROVIDE CONTROL JOINTS OFF OF ALL REENTRANT CORNERS TO INTERSECTION OF CONTROL JOINTS BEYOND. PROVIDE CONTROL JOINTS TO CONNECT OFFSET COLUMNS, PITS AND OTHER INTERRUPTIONS TO THE SLAB.
20. AN INDEPENDENT TESTING AGENCY TO PERFORM FIELD QUALITY CONTROL TEST. PROVIDE FREE ACCESS TO CONCRETE OPERATIONS AT PROJECT SITE AND COOPERATE WITH APPOINTED FIRM. SUBMIT PROPOSED MIX DESIGN OF EACH CLASS OF CONCRETE TO INSPECTION AND TESTING FIRM FOR REVIEW PRIOR TO COMMENCEMENT OF CONCRETE OPERATIONS. COMPRESSIVE STRENGTH TESTS: ASTM C39/C39M. FOR EACH TEST, MOLD, AND CURE THREE CONCRETE TEST CYLINDERS. OBTAIN TEST SAMPLES FOR EVERY 100 CU YD OR LESS OF EACH CLASS OF CONCRETE PLACED. TAKE ONE ADDITIONAL THREE TEST CYLINDERS DURING COLD & HOT WEATHER CONCRETING AS DEFINED BY ACI 305 AND ACI 306. CURED ON JOB SITE UNDER SAME CONDITIONS AS CONCRETE IT REPRESENTS. PERFORM ONE SLUMP TEST FOR EACH SET OF TEST CYLINDERS TAKEN, FOLLOWING PROCEDURES OF ASTM C143/C143M. PERFORM ONE AIR CONTENT TEST FOR EACH SET OF COMPRESSIVE STRENGTH SPECIMENS, COMPLYING ASTM C231.
21. WHERE INDICATED ON THE DRAWINGS, INTENTIONALLY ROUGHENED CONCRETE SHALL BE CLEAN AND FREE OF LAITANCE AND ROUGHENED TO A FULL AMPLITUDE OF 1/4".

SITE CAST TILT-UP CONCRETE WALL PANEL

1. UNLESS NOTED OTHERWISE, PANELS SHOWN ON DRAWINGS ARE TO BE CAST ON SITE, TILT-UP CONCRETE WALL PANELS.
2. SEE GENERAL NOTES SECTIONS: "CONCRETE" AND "STRUCTURAL STEEL" FOR CONCRETE, REINFORCEMENT BARS, AND EMBEDDED PLATE SPECIFICATIONS.
3. THE CENTERLINE OF SINGLE MAT STEEL SHALL COINCIDE WITH THE CENTERLINE OF THE STRUCTURAL THICKNESS OF THE PANEL. PANELS WITH TWO LAYERS OF MAT STEEL SHALL HAVE A MAT 1-3/4" CLEAR ON THE OUTSIDE FACE AND 1" CLEAR ON THE INSIDE FACE U.N.O. SEE PANEL ELEVATIONS FOR ADDITIONAL REINFORCEMENT REQUIREMENTS.
4. UNLESS NOTED OTHERWISE, PROVIDE (2) #5 CONTINUOUS AT THE TOP, BOTTOM AND SIDES OF EACH PANEL AND AT THE HEAD, JAMBS AND SILL OF EACH OPENING AND EACH FUTURE KNOCKOUT OPENING IN THE PANEL. SEE DRAWINGS FOR ADDITIONAL REINFORCEMENT.
5. THE GENERAL CONTRACTOR SHALL REVIEW AND VERIFY ALL PANEL DIMENSIONS, OPENINGS, BEAM AND JOIST POCKET LOCATIONS, WELD PLATE LOCATIONS AND REPORT ANY DISCREPANCIES TO THE STRUCTURAL ENGINEER PRIOR TO CASTING PANELS.
6. EXPOSED EDGES OF PANELS SHALL BE CHAMFERED, EXCEPT AT THE INSIDE FACE OF OVERHEAD DOORS.
7. SEE ARCHITECTURAL DRAWINGS FOR PANEL FINISHES, REVEALS, CHAMFERS, ETC.
8. THE PANELS HAVE BEEN DESIGNED FOR THE IN-SERVICE CONDITIONS ONLY. THE GENERAL CONTRACTOR SHALL BE RESPONSIBLE FOR THE PANEL LIFTING DESIGN AND METHOD.
9. LIFTING INSERTS VISIBLE AFTER FINAL CONSTRUCTION SHALL BE PATCHED AND FINISHED TO MEET THE ARCHITECT'S APPROVAL.
10. TEMPORARY BRACING OF PANELS SHALL NOT BE REMOVED UNTIL AFTER THE PERMANENT STRUCTURE HAS BEEN COMPLETED AND ALL CONNECTIONS HAVE BEEN MADE.
11. SET UNITS DRY, WITHOUT GROUT, ATTAINING JOINT DIMENSIONS WITH SHIMS. PROVIDE SUFFICIENT SHIMS TO PREVENT SETTLEMENT, ROTATION, OR DAMAGE TO THE FOOTINGS. GROUT PACK BASE OF UNIT WITH NON-SHRINKABLE GROUT CONFORMING TO ASTM C1107 WITH A COMPRESSIVE STRENGTH AT 28 DAYS OF 5000 PSI.
12. REFERENCE ARCHITECTURAL AND MEP DRAWINGS FOR OPENINGS, SLEEVES, AND INSERTS NOT SHOWN ON STRUCTURAL DRAWINGS FOR APPROVAL.
13. PROVIDE TEMPORARY BRACING FOR TILT-UP WALLS DURING ERECTION. BRACING SHALL BE DESIGNED IN ACCORDANCE WITH THE TILT-UP CONCRETE ASSOCIATION (TGA) GUIDELINE FOR TEMPORARY WIND BRACING OF TILT-UP CONCRETE PANELS DURING CONSTRUCTION. DESIGN SHALL BE PERFORMED BY AN ENGINEER LICENSED IN STATE WHERE PROJECT IS LOCATED.
14. ERECTION TOLERANCES SHALL BE COORDINATED WITH STEEL SUPPLIER TO PROVIDE PROPER FIT-UP. DEFLECTIONS MAY REQUIRE ADJUSTMENT AND RESETTING IN ORDER TO MEET TOLERANCES.

METAL DECK

1. METAL DECK SHALL CONFORM TO THE SPECIFICATIONS OF THE STEEL DECK INSTITUTE.
2. ROOF NON-COMPOSITE DECK SHALL BE 1 1/2" TYPE B WIDE RIB RE: ROOF DIAPHRAGM DIAGRAM FOR GAUGE & CONNECTIONS.
3. UNLESS NOTED OTHERWISE ON PLAN, CONNECT DECKING TO SUPPORTING MEMBERS WITH MECHANICAL FASTENERS SPACED AT 6" ON CENTER.
4. IF WELDING IS BASIS OF DESIGN, WELDERS SHALL BE AWS-CERTIFIED FOR LIGHT-GAGE WELDING.
5. LAYOUT DECK SPANS TO PROVIDE A MINIMUM OF (3) SPANS PER LENGTH OF DECK.
6. PROVIDE L5x3x1/4 (LLV) FIELD-FABRICATED FRAME BETWEEN JOISTS AT OPENINGS LARGER THAN 10"x10", U.N.O., (INCLUDING EXHAUST FAN OPENINGS REGARDLESS OF OPENING SIZE). RE: 3/S5.10

LIGHT GAGE STEEL FRAMING

1. LIGHT-GAGE STEEL SHALL CONFORM TO:
   - A. ASTM A 653 SS GRADE 50, CLASS 1 OR CLASS 3 (Fy = 50 KSI) FOR 54 MILS THROUGH 68 MILS THICKNESS.
   - B. ASTM A 653 SS GRADE 33 (Fy = 33 KSI) FOR 18 MILS THROUGH 43 MILS THICKNESS.
2. ALL FABRICATION, ERECTION, AND IDENTIFICATION OF LIGHT-GAGE STEEL FRAMING SHALL CONFORM TO IBC SECTIONS 2209 AND 2210 AND AISI SPECIFICATIONS.
3. PROVIDE ALL ACCESSORIES INCLUDING, BUT NOT LIMITED TO, TRACKS, CLIPS, WEB STIFFENERS, ANCHORS, FASTENING DEVICES AND OTHER ACCESSORIES REQUIRED FOR A COMPLETE AND PROPER INSTALLATION.
4. INSTALL BRIDGING/BLOCKING IN LIGHT-GAGE STEEL STUD WALLS IN ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS AND AS SHOWN IN THE DRAWINGS.
5. DESIGNATIONS OF COLD-FORMED, LIGHT-GAGE STEEL SHAPES REFER TO THOSE DESCRIBED IN ICC-ES EVALUATION REPORT ESR-3064P OF THE METAL STUD MANUFACTURERS' ASSOCIATION.
6. SHEET METAL SCREWS SHALL BE OF THE MAKE SPECIFIED IN THE DRAWINGS OR, WHERE NO SPECIFIC MAKE IS GIVEN, SHALL BE RATED BY THEIR MANUFACTURER AS POSSESSING DESIGN LOAD CAPACITIES IN SHEAR AND TENSION AT LEAST EQUAL TO THOSE PUBLISHED IN ICBO EVALUATION REPORT NO. 4943 OF THE METAL STUD MANUFACTURERS' ASSOCIATION FOR THE SCREW SIZE SPECIFIED.
7. FOR EXTERIOR STUDS RE: DETAILS AT PERIMETER. FOR NON-BEARING INTERIOR STUDS RE: ARCH.

STRUCTURAL STEEL

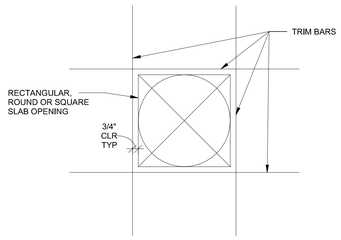
1. ALL W-SECTION SHAPES SHALL CONFORM TO ASTM A992. CHANNEL SHAPES, ANGLES, AND PLATES SHALL CONFORM TO ASTM A36. (UNLESS OTHERWISE NOTED ON THE DWG).
2. STRUCTURAL STEEL PIPE SHALL CONFORM TO ASTM A53, GRADE B (Fy = 35 KSI). MILL TEST REPORTS FOR STEEL PIPE SHALL BE SUBMITTED FOR APPROVAL.
3. HOLLOW STRUCTURAL SECTIONS SHALL CONFORM TO ASTM A500, GRADE C (Fy = 50 KSI RECTANGULAR, Fy = 46 KSI ROUND).
4. ANCHOR BOLTS SHALL CONFORM TO ASTM F1554 GR 36, UNLESS NOTED OTHERWISE.
5. STRUCTURAL STEEL DETAILING, FABRICATION AND ERECTION SHALL CONFORM TO THE LATEST EDITION OF AISC "SPECIFICATION FOR STRUCTURAL STEEL BUILDINGS" WITH AMENDMENTS, AND THE AISC "CODE OF STANDARD PRACTICE FOR STEEL BUILDINGS AND BRIDGES," WITH AMENDMENTS.
6. BOLTS FOR STEEL BEAM AND COLUMN CONNECTIONS SHALL BE 3/4-INCH DIAMETER (MIN.) ASTM F3125, GRADE A325-N HIGH-STRENGTH BOLTS UNLESS NOTED OTHERWISE IN CONTRACT DOCUMENTS.
7. ALL BOLTED JOINTS SHALL BE SNUG TIGHT UNLESS NOTED OTHERWISE IN CONTRACT DOCUMENTS . FOR MARKING, TWIST-OFF-TYPE TENSION CONTROL BOLT ASSEMBLIES (ASTM F3125, GRADE F1852), OR DIRECT TENSION PRETENSIONED OR SLIP-CRITICAL JOINTS, THE METHOD OF INSTALLATION SHALL BE TURN-OF-NUT WITH MATCH INDICATORS (ASTM F959).
8. SPLICING OF STRUCTURAL STEEL MEMBERS WHERE NOT DETAILED ON THE CONTRACT DOCUMENTS IS PROHIBITED WITHOUT THE PRIOR APPROVAL OF THE STRUCTURAL ENGINEER AS TO LOCATION, TYPE OF SPLICE AND CONNECTION TO BE MADE.
9. HEADED CONCRETE ANCHORS SHALL BE NELSON HEADED CONCRETE ANCHORS (OR APPROVED EQUAL), AND SHALL CONFORM TO ASTM A108. ANCHORS SHALL BE AUTOMATICALLY END WELDED WITH SUITABLE STUD WELDING EQUIPMENT IN THE SHOP OR IN THE FIELD. WELDING SHALL BE IN ACCORDANCE WITH THE RECOMMENDATIONS OF THE NELSON STUD WELDING COMPANY.
10. DEFORMED BAR ANCHORS (DBA) SHALL BE NELSON DEFORMED BAR ANCHORS (OR APPROVED EQUAL), AND SHALL BE MADE FROM LOW CARBON STEEL CONFORMING TO ASTM A496. ANCHORS SHALL BE AUTOMATICALLY END-WELDED WITH SUITABLE WELDING EQUIPMENT IN THE SHOP OR IN THE FIELD. WELDING SHALL BE IN ACCORDANCE WITH THE RECOMMENDATIONS OF THE NELSON STUD WELDING COMPANY.
11. WELDS SHALL CONFORM TO AWS SPECIFICATIONS. WELDERS SHALL BE CERTIFIED UNDER AWS SPECIFICATIONS. E70xx, LOW-HYDROGEN ELECTRODES SHALL BE USED FOR ALL WELDS.
12. LOWEST ANTICIPATED SERVICE TEMPERATURE (LAST) SHALL BE 50° F FOR INDOOR CONDITIONED STRUCTURES & 0° F FOR OUTDOOR/UNCONDITIONED STRUCTURES
13. ALL EXTERIOR STEEL TO BE PAINTED, RE: ARCH FOR SPECS.

POST-INSTALLED ANCHORS

1. POST-INSTALLED ANCHOR SYSTEMS SHALL COMPLY WITH THE LATEST REVISION OF ICC-ES ACCEPTANCE CRITERIA AND HAVE A VALID ICC-ES REPORT (OR APPROVED EQUIVALENT) IN ACCORDANCE WITH THE APPLICABLE BUILDING CODE.
2. UNLESS OTHERWISE NOTED ON THE DRAWINGS USE ANCHORS LISTED BELOW:
   - EXPANSION ANCHORS IN CONCRETE SHALL BE ONE OF THE FOLLOWING:
     - HILTI HSL-3 CARBON STEEL HEAVY DUTY EXPANSION ANCHOR (ICC-ES REPORT SR-1545)
     - HILTI HDA CARBON AND STAINLESS STEEL UNDERCUT ANCHOR (ICC-ES REPORT ESR-1546)
     - HILTI KWIK BOLT TZ CARBON AND STAINLESS STEEL ANCHORS (ICC-ES REPORT ESR-1917)
     - DeWALT POWER-STUD+SD2 ANCHOR (ICC-ES REPORT ESR-2502)
     - SIMPSON STRONG-TIE STRONG-BOLT 2 ANCHOR (ICC-ES REPORT ESR-3037)
   - ADHESIVE ANCHORS IN CONCRETE SHALL BE ONE OF THE FOLLOWING:
     - HILTI HIT-RE 500 V3 ADHESIVE ANCHOR (ICC-ES REPORT ESR-3814)
     - HILTI HIT-HY 200 ADHESIVE ANCHOR (ICC-ES REPORT ESR-3187)
     - DeWALT PURE 110+ EPOXY ADHESIVE ANCHOR (ICC-ES REPORT ESR-3298)
     - DeWALT AC200+ ADHESIVE ANCHOR (ICC-ES REPORT ESR-4027)
     - SIMPSON STRONG-TIE SET-XP EPOXY ADHESIVE ANCHOR (ICC-ES REPORT ESR-2508)
     - SIMPSON STRONG-TIE AT-XP EPOXY ADHESIVE ANCHOR (IAPMO UES ER-263)
   - SCREW ANCHORS IN CONCRETE SHALL BE ONE OF THE FOLLOWING:
     - DeWALT SCREW-BOLT+ SCREW ANCHOR (ICC-ES REPORT ESR-3889)
     - HILTI KWIK HUS-EZ SCREW ANCHOR (ICC-ES REPORT ESR-3027)
     - SIMPSON STRONG-TIE TITEN HD SCREW ANCHOR (ICC-ES REPORT ESR-2713)
3. ANCHORS ARE NOT TO BE INSTALLED UNTIL CONCRETE HAS REACHED ITS DESIGN STRENGTH.
4. FOR ANCHOR EMBEDMENT, RE: DRAWINGS OR TYPICAL DETAIL. USE EMBEDMENT RECOMMENDED BY MANUFACTURER WHERE NO EMBEDMENT IS SHOWN.
5. MANUFACTURER'S INSTALLATION TRAINING AND CERTIFICATION IS REQUIRED ON ALL POST-INSTALLED ANCHORS FOR ANCHOR INSTALLER.
6. CONTRACTOR COORDINATE ANCHOR AND REINFORCING LOCATION. IT IS UNACCEPTABLE TO CUT REBAR FOR POST INSTALLED ANCHORS WITHOUT PRIOR APPROVAL FROM A&E.
7. POST-INSTALLED ANCHORS SHALL ONLY BE USED WHERE SPECIFIED ON DRAWINGS.

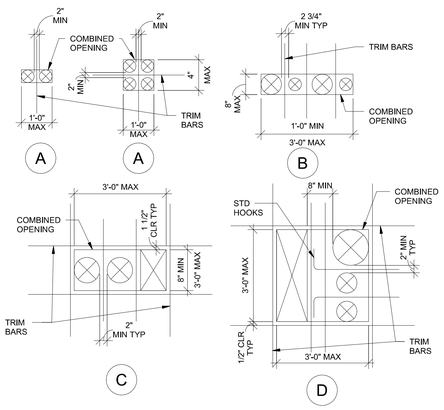
OPEN WEB STEEL JOISTS AND JOIST GIRDERS

1. GENERAL CONTRACTOR TO COORDINATE MECHANICAL, ELECTRICAL, PLUMBING, AND SPRINKLER LOADS WITH JOIST DESIGNER.
2. ALL LOADS UNLESS OTHERWISE NOTED ARE ALLOWABLE LOADS (ASD).
3. OPEN WEB STEEL JOISTS & JOIST GIRDERS WITH THEIR BRIDGING, BRACING, END SUPPORTS AND ANCHORAGE, AND ERECTION STABILITY AND HANDLING REQUIREMENTS SHALL CONFORM TO THE APPLICABLE STEEL JOIST INSTITUTE STANDARD SPECIFICATIONS FOR STEEL JOISTS AND JOIST GIRDERS, LATEST EDITION. TOP CHORDS OF JOISTS AND JOIST GIRDERS SHALL CONSIST OF ANGLES OR TEES.
4. SUBMIT ERECTION DRAWINGS AND CALCULATIONS (BEARING THE SEAL OF A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF THE PROJECT) FOR THE DESIGN OF THE STEEL JOISTS AND JOIST GIRDERS, PER SECTION 2207 OF THE IBC. PROVIDE A CERTIFICATE OF COMPLIANCE FROM THE MANUFACTURER PER SECTION 2



NOTES:
1. THIS DIAGRAM IS FOR ISOLATED SLAB OPENINGS WHOSE LARGER DIMENSION IS BETWEEN 1'-0" AND 3'-0". NO TRIM BARS ARE REQUIRED FOR ISOLATED SLAB OPENINGS SMALLER THAN 1'-0". RE: PLANS FOR OPENINGS LARGER THAN 3'-0"
2. PROVIDE (1) #5 TRIM BAR TOP AND BOTTOM ON EACH SIDE OF OPENING, BARS SHALL EXTEND 1'-6" PAST EDGES OF OPENING.
3. DISPLACE SLAB PRINCIPAL REINFORCEMENT TO EACH SIDE OF OPENINGS. DO NOT CUT SLAB PRINCIPAL REINFORCEMENT.

1 S0.10 TRIM BARS FOR ISOLATED SLAB OPENINGS
1 1/2" = 1'-0"



NOTES:
1. SLAB OPENINGS WHICH ARE CLOSER TO ONE ANOTHER THAN THE DIAMETER OR SHORTER SIDE OF THE LARGER OF THE TWO ARE CONSIDERED TO FORM A COMBINED OPENING.
2. THESE DIAGRAMS ARE FOR COMBINED OPENINGS WHOSE LARGER DIMENSIONS DOES NOT EXCEED 3'-0". RE: PLANS FOR OPENINGS LARGER THAN 3'-0"
3. TRIM BAR EXTENSION PAST EDGES OF COMBINED OPENINGS SHALL BE 1'-0" FOR #4 BARS AND 1'-6" FOR #5 BARS.
4. DISPLACED SLAB PRINCIPAL REINFORCEMENT TO EACH SIDE OF COMBINED OPENINGS OR PLACE BETWEEN INDIVIDUAL OPENINGS. DO NOT CUT SLAB PRINCIPAL REINFORCEMENT.
5. TENDONS MAY PASS BETWEEN SLAB OPENINGS WHEN THE DISTANCE BETWEEN OPENINGS IS GREATER THAN OR EQUAL TO THE SLAB THICKNESS PLUS (N-1) TIMES 3 INCHES, WHERE 'N' IS THE NUMBER OF TENDONS IN A BUNDLE OR DUCT. TENDONS MUST FOLLOW A STRAIGHT ALIGNMENT (IN PLAN) THROUGH THE COMBINED OPENING AND FOR AT LEAST 24" ON EACH SIDE.
6. SUBMIT SPECIAL SITUATIONS TO ENGINEER FOR REVIEW.
7. RE: 1 / S0.10 FOR TRIM BARS AT ISOLATED OPENINGS.

TRIM BAR REQUIREMENTS:

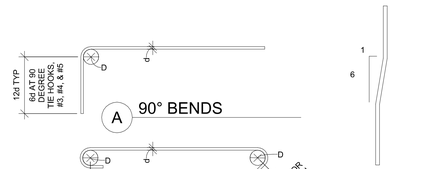
A. IF THE COMBINED OPENING IS SMALLER THAN 1'-0", PROVIDE (1)#4 TOP AND BOTTOM BETWEEN OPENINGS.

B. IF THE LARGER DIMENSION OF A COMBINED OPENING EXCEEDS 1'-0" BUT THE SMALLER DIMENSION IS LESS THAN OR EQUAL TO 8", AND PROVIDED THE COMBINED OPENING IS ALIGNED WITH THE PRINCIPAL REINFORCEMENT, PROVIDE (1)#4 TOP AND BOTTOM BETWEEN OPENINGS.

C. IN ALL OTHER CASES WHERE OPENINGS ARE ARRANGED IN A SINGLE LINE PROVIDE (1)#4 TOP AND BOTTOM BETWEEN OPENINGS AND (1)#5 TOP AND BOTTOM AROUND PERIMETER OF COMBINED OPENING.

D. WHERE INDIVIDUAL OPENINGS OF A COMBINED OPENING FORM TWO OR MORE ROWS, THE ROWS SHALL BE SEPARATED BY AT LEAST 8" OF CONCRETE. PROVIDE (2)#4 TOP AND BOTTOM BETWEEN ROWS OF OPENINGS, (1)#4 TOP AND BOTTOM BETWEEN OPENINGS IN THE PERPENDICULAR DIRECTION, AND (1)#5 TOP AND BOTTOM AROUND PERIMETER OF COMBINED OPENING. PROVIDE STANDARD HOOKS WHERE BARS TERMINATE WITHIN THE COMBINED OPENING.

2 S0.10 TRIM BARS FOR MULTIPLE SLAB OPENINGS
1 1/2" = 1'-0"



REBAR SIZE	D
#3 THRU #8	6d
#9 THRU #11	8d
#14 & #18	10d
#3 THRU #5 TIES	4d

NOTE:
1. TO REDUCE CONGESTION, IT IS GENERALLY ACCEPTABLE TO REPLACE A BEAM/COLUMN LONGITUDINAL BAR HOOK (90° OR 180°) WITH A TERMINATOR, PRIOR EOR APPROVAL REQ'D

3 S0.10 TYPICAL REINFORCING BAR BENDS
1 1/2" = 1'-0"

4 S0.10 TYPICAL CORNER BAR DETAIL
3/4" = 1'-0"

CONCRETE REINFORCING LAP LENGTH SCHEDULE

BAR SIZE	STRUCTURAL ELEMENT MINIMUM COMPRESSIVE STRENGTH (f'c) 3000psi TOP BARS	3000psi OTHER	4000psi TOP BARS	4000psi OTHER	4500psi TOP BARS	4500psi OTHER	5000psi TOP BARS	5000psi OTHER	7000psi TOP BARS	7000psi OTHER
#3	28"	22"	25"	19"	23"	18"	22"	17"	19"	14"
#4	38"	29"	33"	25"	31"	24"	29"	23"	25"	19"
#5	47"	36"	41"	31"	38"	30"	36"	28"	31"	24"
#6	56"	43"	49"	37"	46"	35"	44"	34"	37"	28"
#7	81"	63"	71"	54"	67"	51"	63"	49"	54"	41"
#8	93"	72"	81"	62"	76"	59"	72"	56"	61"	47"
#9	105"	81"	91"	70"	86"	66"	81"	63"	69"	53"
#10	118"	91"	102"	79"	96"	74"	92"	71"	77"	60"

NOTES:
1. LAP LENGTH FOR TOP BARS SHALL BE USED WHEN MORE THAN 12 INCHES OF FRESH CONCRETE IS PLACED BELOW HORIZONTAL REINFORCEMENT.

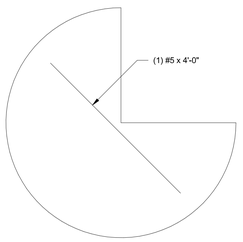
5 S0.10 CONCRETE REINFORCING LAP SCHEDULE
3/4" = 1'-0"

NOTES:
1. AT THE CONTRACTORS OPTION THE TWO-PART DOWEL PRODUCTS LISTED AT RIGHT MAY BE USED TO REPLACE ORDINARY DOWELS SPECIFIED IN THE DRAWINGS
2. FOLLOW MANUFACTURERS DIRECTIONS AND APPLICABLE ICBO REPORTS. SPECIAL INSPECTION IS REQUIRED
3. TWO-PART DOWEL COMPONENTS MUST BE OF SPECIFIED LENGTH AFTER ASSEMBLY

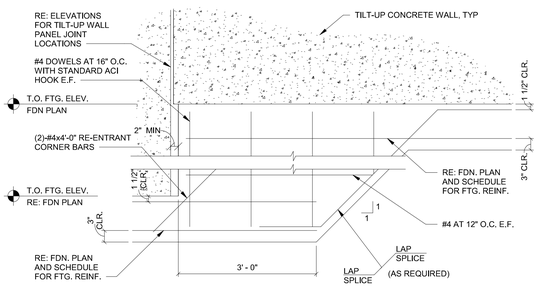
REQUIRED SIZE OF FABRICATED TWO-PART DOWEL COMPONENTS

MANUFACTURER & BRAND NAME	SPECIFIED SIZE FOR REBAR #4 DOWEL-IN COMPONENT	#4 DOWEL-IN COMPONENT	#5 DOWEL-IN COMPONENT	#5 DOWEL-IN COMPONENT	#6 DOWEL-IN COMPONENT	#6 DOWEL-IN COMPONENT
RICHMOND DOWEL BAR SUBSTITUTION	#4	#4	#5	#5	#6	#6
LENTON FORM SAVER	#4	#4	#5	#5	#6	#6
DAYTON-SUPERIOR D-50 DOWEL BAR REPLACEMENT	#4	#4	#5	#5	#6	#6

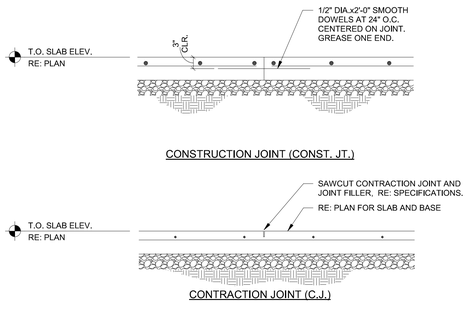
6 S0.10 TWO PART DOWELS SYSTEM
1 1/2" = 1'-0"



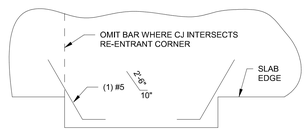
9A S0.10 TYPICAL SLAB RE-ENTRANT CORNER REINFORCING
3/4" = 1'-0"



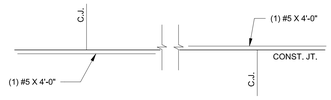
7 S0.10 EXTERIOR WALL FOOTING STEP
3/4" = 1'-0"



8 S0.10 TYPICAL SLAB JOINT DETAILS
3/4" = 1'-0"



9B S0.10 TYPICAL SLAB REINF AT DOOR OPNG
3/4" = 1'-0"



9C S0.10 TYPICAL STAGGERED SLAB REINF AT DOCK WALL
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
MATTHEW C. GEORGER
No. 15018
2025.11.21 16:09:11-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

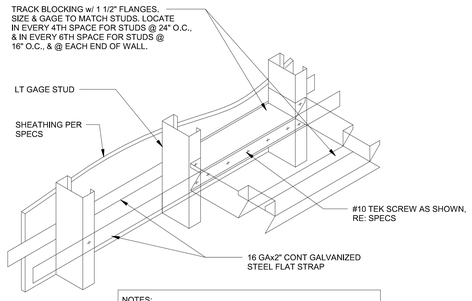
ID	Description	Date

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

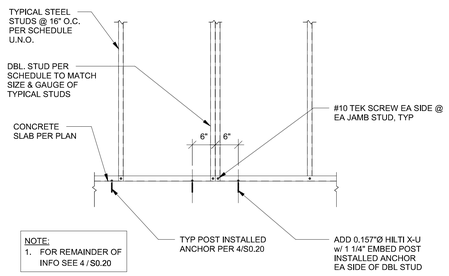
Sheet Title:
TYPICAL DETAILS

S0.10



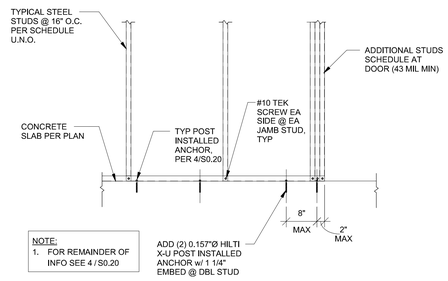
NOTES:
1. INSTALL BRACING ROWS @ 4'-0" O.C. VERT SP, U.O.N.,
2. U.O.N., INSTALL STRAP ON SIDE w/ NO SHTG AT LOCATIONS WHERE SHTG IS ON ONE SIDE ONLY. INSTALL STRAP ON BOTH SIDES WHERE NO SHTG IS PRESENT.

1 S0.20 STUD WALL LATERAL BRACING LOCATIONS
1 1/2" = 1'-0"



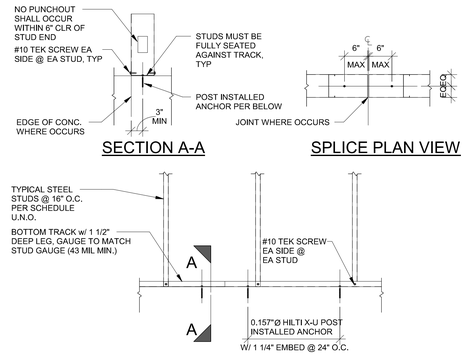
NOTE:
1. FOR REMAINDER OF INFO SEE 4 / S0.20

2 S0.20 TYP BOTTOM TRACK ANCHORAGE @ WINDOW
3/4" = 1'-0"

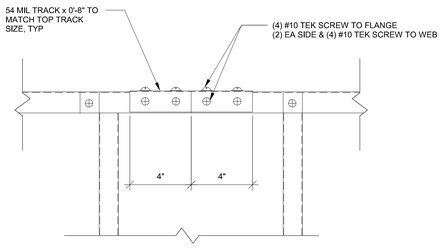


NOTE:
1. FOR REMAINDER OF INFO SEE 4 / S0.20

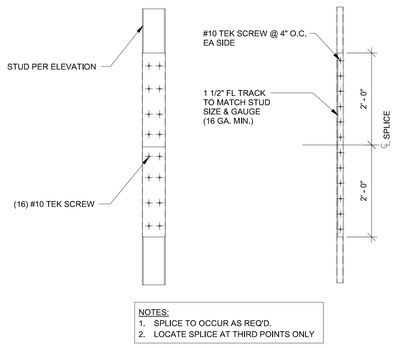
3 S0.20 TYP @ DOOR BOTTOM TRACK ANCHORAGE
3/4" = 1'-0"



4 S0.20 TYPICAL BOTTOM TRACK SPLICE & ANCHORAGE
3/4" = 1'-0"

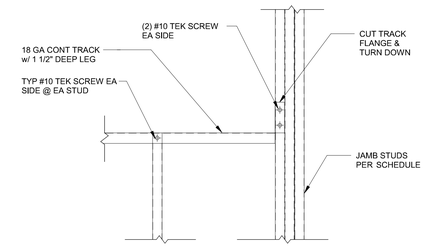


5 S0.20 TYPICAL TOP TRACK SPLICE
3" = 1'-0"

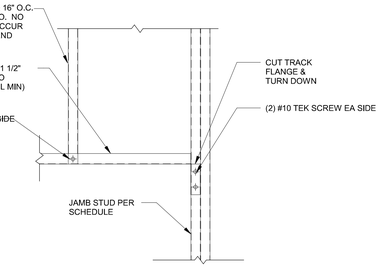


NOTES:
1. SPLICE TO OCCUR AS REQ'D.
2. LOCATE SPLICE AT THIRD POINTS ONLY

6 S0.20 STUD SPLICE DETAIL
3/4" = 1'-0"



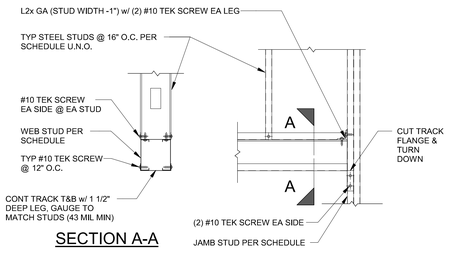
7 S0.20 TYPICAL SILL CONNECTION
1 1/2" = 1'-0"



NOTE:
APPLIES TO INTERIOR NON-BEARING WALL OPENINGS UP TO 4'-0" WIDE, MAX.

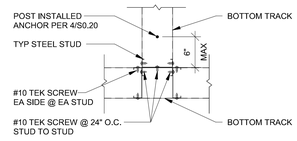
8 S0.20 TYPICAL TRACK HEADER CONNECTION
1 1/2" = 1'-0"

HEADER SCHEDULE	
OPENING SIZE (L)	WEB STUD
L < 6'-0"	(2) 362 S162-43
6'-0" < L ≤ 10'-0"	(2) 800 S162-43
10'-0" < L ≤ 12'-0"	(2) 1000 S162-54

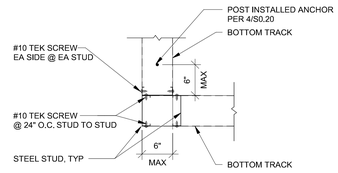


SECTION A-A

9 S0.20 TYPICAL BOX HEADER
1" = 1'-0"



PLAN VIEW, INTERSECTION OF STUDS



PLAN VIEW, CORNER CONDITION

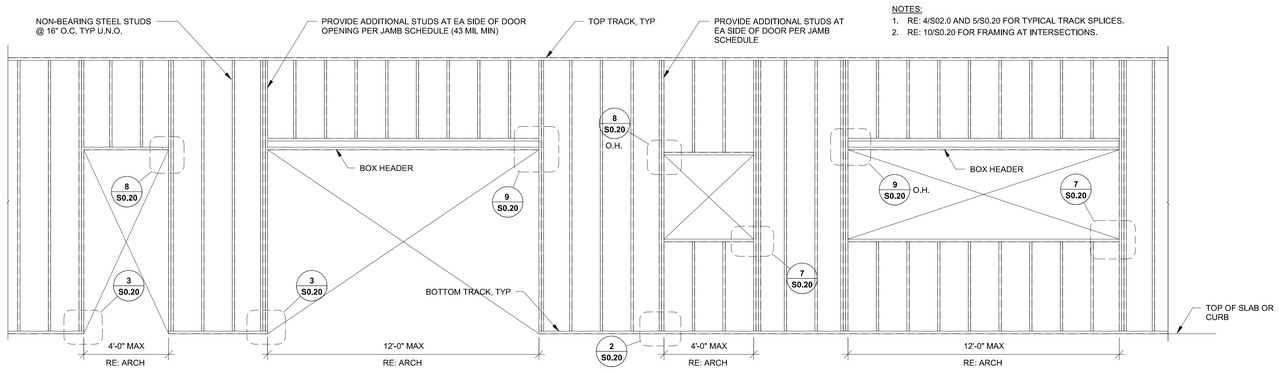
10 S0.20 TYP. STUD FRAMING @ INTERSECTIONS
1" = 1'-0"

WALKABLE CEILING JOIST SIZE					
	MAXIMUM LENGTH (L)				
GAUGE	6"	8"	10"	12"	14"
20 (33 MIL)	8'-0"	9'-0"	--	--	
18 (43 MIL)	10'-0"	11'-6"	13'-0"	--	
16 (54 MIL)	12'-4"	15'-6"	18'-4"	19'-0"	20'-0"
14 (68 MIL)	13'-3"	16'-8"	20'-0"	23'-1"	24'-11"

NOTES:
1. STEEL STUDS SHALL CONFORM TO ICC-ER #3064P OR APPROVED EQUAL.
2. MAXIMUM STUD LENGTH "L" SINGLE SPAN FOR STUDS @ 16" O.C.
3. STEEL STUDS SHALL HAVE 1 5/8" FLANGE, MIN.
4. PROVIDE BRIDGING & BRACING AS REQUIRED.
5. JOIST SIZES IN TABLE ONLY APPLICABLE FOR INTERIOR CONDITIONS WITH TWO LAYERS OF 5/8" GYPSUM BOARD ON THE BOTTOM OF THE JOIST WITH ONE LAYER OF 3/4" PLYWOOD ON TOP OF THE JOIST, DESIGN LL = 20psf
6. RE: ARCHITECTURAL DRAWINGS FOR OTHER CONDITIONS.

CEILING JOIST SIZE						
	MAXIMUM LENGTH (L)					
	3 5/8"	3 5/8"	4"	4"	6"	6"
GAUGE	NO BRACING	MIDSPAN BRACING	NO BRACING	MIDSPAN BRACING	NO BRACING	MIDSPAN BRACING
20 (33 MIL)	9'-5"	13'-2"	9'-8"	13'-8"	11'-0"	15'-10"
18 (43 MIL)	10'-5"	14'-4"	10'-8"	15'-0"	11'-11"	17'-0"

NOTES:
1. STEEL STUDS SHALL CONFORM TO ICC-ER #3064P OR APPROVED EQUAL.
2. MAXIMUM STUD LENGTH "L" FOR STUDS @ 16" O.C.
3. STEEL STUDS SHALL HAVE 1 1/4" FLANGE, MIN.
4. PROVIDE LATERAL BRACING AS REQUIRED.
5. JOIST SIZES IN TABLE ONLY APPLICABLE FOR INTERIOR CONDITIONS WITH ONE LAYER OF 5/8" GYPSUM BOARD.
6. RE: ARCHITECTURAL DRAWINGS FOR OTHER CONDITIONS.



11 S0.20 TYP NON-BEARING STUD WALL FRAMING
3/8" = 1'-0"

NOTES:
1. RE: 4/S02.0 AND 5/S0.20 FOR TYPICAL TRACK SPLICES.
2. RE: 10/S0.20 FOR FRAMING AT INTERSECTIONS.

STEEL STUD SIZE				
	MAXIMUM HEIGHT (H)			
GAUGE	3 5/8"	4"	6"	8"
14 (68 MIL)	19'-9"	21'-3"	29'-9"	42'-0"
16 (54 MIL)	18'-6"	20'-0"	27'-9"	30'-0"
18 (43 MIL)	17'-3"	18'-9"	26'-0"	30'-0"
21 (33 MIL)	15'-9"	17'-0"	23'-6"	--

NOTES:
1. STEEL STUDS SHALL CONFORM TO ICC-ER #3064P OR APPROVED EQUAL.
2. MAXIMUM STUD HEIGHT "H" FOR STUDS @ 16" O.C.
3. STEEL STUDS SHALL HAVE 1 1/4" FLANGE MIN.
4. PROVIDE BRIDGING PER 1/S0.20 OR PER MANUFACTURER WHERE GYPSUM BOARD IS NOT APPLIED TO BOTH SURFACES.
5. RE: ARCHITECTURAL DRAWINGS FOR OTHER CONDITIONS.
6. RE: 6/S0.20 FOR SPLICES.
7. RE: 1/S0.20 FOR STUD BRACING.
8. RE: SHEET S0.21 FOR ADDITIONAL DETAILS.

JAMB SCHEDULE	
OPENING SIZE	# OF JAMB STUDS
4'-0" TO 6'-0"	2
6'-0" TO 10'-0"	2
10'-0" TO 12'-0"	3

NOTES:
1. JAMB STUDS TO MATCH SIZE & GAGE OF TYP STUDS
2. RE: 3/S0.20 FOR ADDITIONAL JAMB DETAILS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15018
MATTHEW C. GOODNIGHT
2025.11.21 16:09:11-06'00'

PROJECT TCC MOUNTAIN HOME
TRAMMELL CROW
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

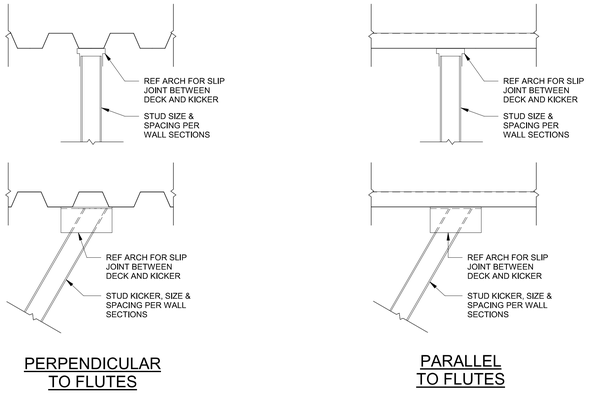
ID	Description	Date

© 2025 CESO, INC

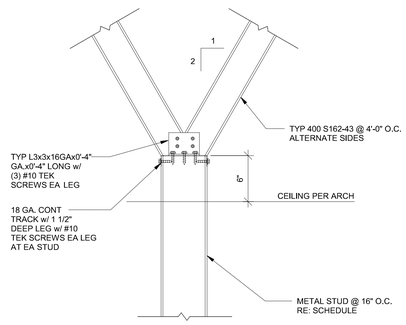
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
TYPICAL INTERIOR LIGHT GAGE STEEL DETAILS

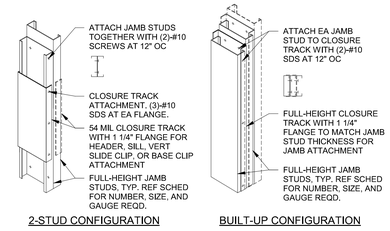
S0.20



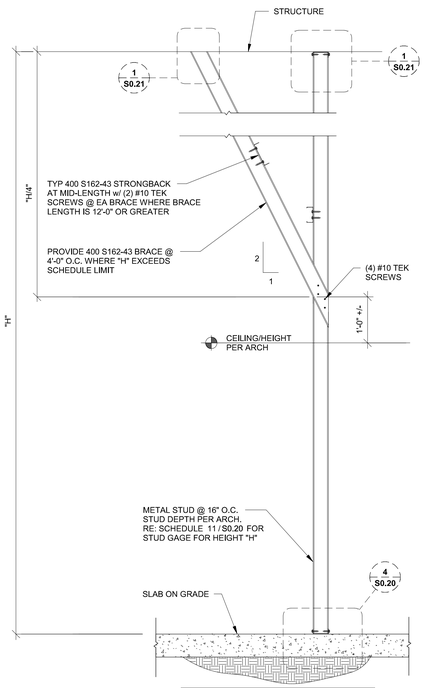
1 S0.21 TYPICAL TRACK KICKER TO DECK
1" = 1'-0"



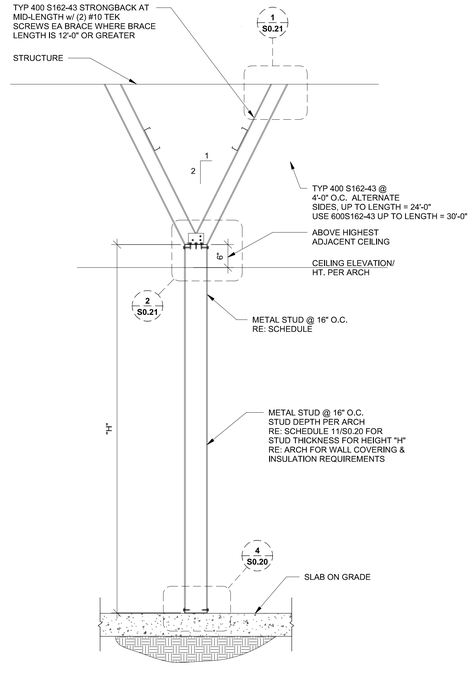
2 S0.21 TYPICAL TRACK PARTITION WALL TOP
1 1/2" = 1'-0"



3 S0.21 TYPICAL TRACK HEADER CONNECTION
1" = 1'-0"



8 S0.21 TYPICAL FULL-HEIGHT PARTITION WALL
3/4" = 1'-0"



9 S0.21 TYPICAL PARTIAL HEIGHT PARTITION WALL
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15018
MATTHEW C. GOODRICH
2025.11.21 16:09:11-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
TYPICAL INTERIOR LIGHT GAGE STEEL DETAILS

S0.21

FOOTING SCHEDULE

MARK	SIZE			BOTTOM REINFORCING		TOP REINFORCING		NOTES
	LENGTH	WIDTH	THICKNESS	LONGITUDINAL	TRANSVERSE	LONGITUDINAL	TRANSVERSE	
F1	6' - 6"	6' - 6"	2' - 0"	7-#7	7-#7	---	---	1
F2	5' - 6"	5' - 6"	1' - 6"	6-#6	6-#6	---	---	1
F3	9' - 6"	9' - 6"	2' - 6"	10-#8	10-#8	10-#8	10-#8	1
F4	5' - 6"	11' - 0"	1' - 6"	6-#6	12-#6	---	---	1

WALL FOOTING SCHEDULE

MARK	SIZE		BOTTOM REINFORCING		TOP REINFORCING		NOTES
	WIDTH	THICKNESS	CONTINUOUS	TRANSVERSE	CONTINUOUS	TRANSVERSE	
WF1	3' - 0"	1' - 6"	3-#6	#6 AT 12" O.C.	---	---	1,2
WF2	5' - 0"	1' - 6"	5-#6	#6 AT 12" O.C.	5-#6	#6 AT 12" O.C.	1,2

NOTES:
1. TOP OF FOOTING ELEVATION (T.O.F. ELEV.) IS REFERENCED TO FINISHED FLOOR. RE: PLAN FOR ELEVATIONS.
2. STEP FOOTING PER 7/S0.10 AS REQUIRED.
3. RE: PLAN FOR CENTERLINE OF FOOTING.

GENERAL NOTES

A. FOR GENERAL STRUCTURAL NOTES RE: S0.00
B. FOR TYPICAL STRUCTURAL DETAILS RE: S0.10
C. LOCATE CL OF FOOTINGS AT CL OF COLUMNS AND/OR WALLS, U.N.O.
D. RE: GENERAL STRUCTURAL NOTES FOR CONTROL/CONSTRUCTION JOINT REQUIREMENTS FOR SLAB ON GRADE.
E. RE: TYPICAL DETAILS FOR REINFORCEMENT AT SLAB PENETRATION AND BLOCKOUTS.
F. RE: 4/S0.10 FOR TYPICAL REINFORCEMENT AT FOOTING CORNERS AND INTERSECTIONS.
G. RE: TYPICAL DETAILS FOR REINFORCEMENT LAP SPLICE LENGTH.
H. CHAIR SLAB REINFORCING AS REQ'D. LIFTING OF BARS WHILE PLACING OF CONC NOT ALLOWED.
I. FOOTING ELEVATION CRITERIA PER STRUCTURAL DETAILS. RE: 9/S4.00 COORDINATE w/ GRADING, UTILITIES & MEP. STEP FOOTING AS REQUIRED PER TYPICAL DETAILS. COORDINATE LOCATION OF FOOTING STEPS WITH TILT-UP PANEL ELEVATIONS.
J. RE: 8/S4.00 FOR LIGHT POLE FOUNDATION DETAIL.

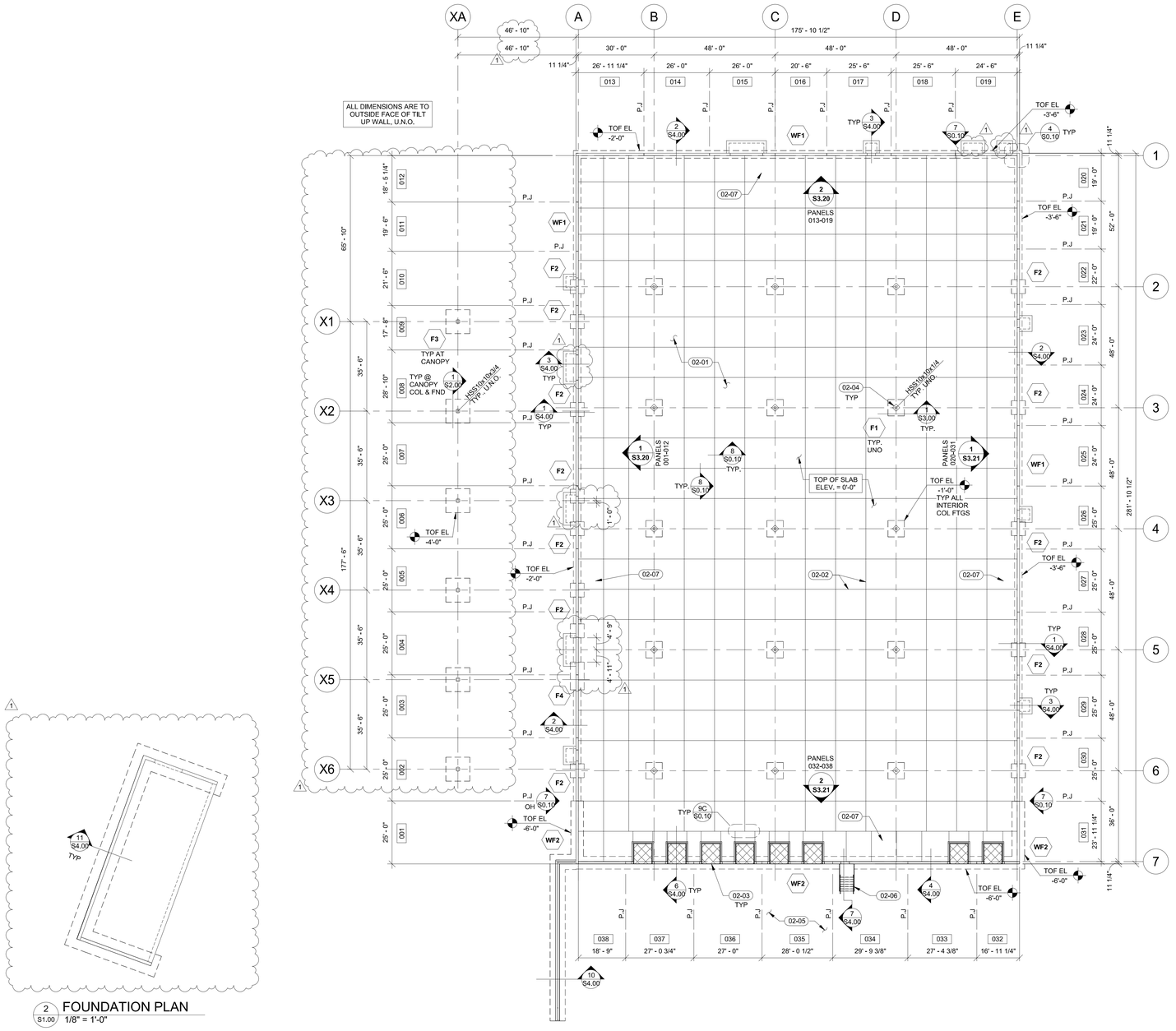
LEGEND

FA — FOOTING PER SCHEDULE

HSS — COLUMN PER PLAN

KEYNOTES

02-01 6" CONCRETE SLAB-ON-GRADE W/#3 @ 18" O.C. EA WAY. RE: GEOTECH REPORT FOR SUBGRADE PREPARATION.
02-02 CONTROL/CONSTRUCTION JOINTS PER 8/S0.10.
02-03 DOCK LEVELER. RE: DETAIL 6/S4.00.
02-04 COLUMN BLOCK OUT PER DETAIL 1/S3.00.
02-05 REF CIVIL FOR TRUCK DOCK SLAB.
02-06 PREFAB METAL STAIR. DESIGN BY STAIR FABRICATOR.
02-07 POUR STRIP WITH REINF PER 2/S4.00.



1 S1.00 FOUNDATION PLAN
1" = 20'-0"

2 S1.00 FOUNDATION PLAN
1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

Certificate of Authorization — Wallace Design Collective, PC #93 — Arkansas Engineer

State of Arkansas — Licensed Professional Engineer — Matthew C. Gebhardt — No. 15018
2026.06.09 10:46:55-05'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

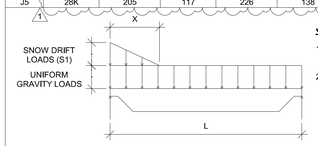
© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FOUNDATION PLAN

S1.00

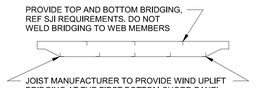
JOIST SCHEDULE										
		UNIFORM GRAVITY LOADS (PLF)						SNOW DRIFT INFORMATION		NOTES
MARK	JOIST SIZE	TOTAL LOAD (DL + LL)	LIVE LOAD (LL)	TOTAL LOAD (DL + SL)	SNOW LOAD (SL)	TOTAL LOAD (DL + RL)	RAIN LOAD (RL)	S1 (PLF)	X (FT)	
J1	28K	240	120	213	93	---	---	444	14'-6"	REF DIAGRAM #1
J1A	28K	240	120	349	229	---	---	---	---	---
J1B	28K	240	120	349	229	354	234	---	---	---
J2	30K	240	120	243	123	---	---	---	---	---
J2A	30K	240	120	349	229	---	---	---	---	---
J2B	30K	240	120	349	229	354	234	---	---	---
J3	30K	240	120	213	93	---	---	444	14'-6"	REF DIAGRAM #1
J3A	36LH	240	120	349	229	---	---	---	---	---
J3B	36LH	240	120	349	229	354	234	---	---	---
J4	28K	205	117	426	338	---	---	---	---	---
J5	28K	205	117	226	138	---	---	---	---	---



JOIST DIAGRAM #1

SEE JOIST SCHEDULE FOR DETAILS

CONTRACTOR NOTE:
BRIDGING AND WEB MEMBERS ARE NOT DESIGNED FOR LOADS OTHER THAN AXIAL. NO ATTACHMENT OF ANY TYPE SHALL BE MADE TO BRIDGING OR JOIST WEB MEMBERS. ALL LOAD ATTACHMENT SHALL BE TO JOIST CHORDS ONLY. REF 1/S5.10



TYPICAL JOIST BRIDGING DIAGRAM

JOISTS AND JOIST GIRDERS

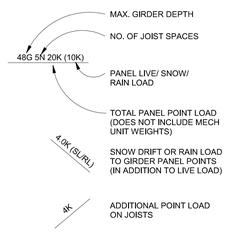
1. JOISTS AND JOIST GIRDERS SHALL BE DESIGNED FOR THE UNIFORM LOAD CAPACITY (AS SPECIFIED IN THE SJI STANDARD LOAD TABLES) IN ADDITION TO CONCENTRATED LOADS SHOWN.
2. UNIFORM GRAVITY LOADS ARE SHOWN FOR EACH JOIST IN THE JOIST SCHEDULE.
   - DEAD LOAD (DL)
   - LIVE LOAD, SNOW LOAD, OR RAIN LOAD (LL/SL/RL)
   - SNOW DRIFT LOADS SHALL BE USED IN CONJUNCTION WITH DEAD AND SNOW LOADS ONLY (DL + SL).

   IN ADDITION TO THE LOADS SHOWN IN THE SCHEDULE, DESIGN JOISTS AND JOIST GIRDERS TO ACCOMODATE RTU LOADS, FAN LOADS, OTHER HANGING LOADS, DRAINLINES, SOFFIT LOADS, AND OTHER CONCENTRATED LOADS.
3. ALL LOADS SHOWN ARE WORKING STRESS LOADS (ASD). APPLY LOAD FACTORS PER CODE.
4. JOISTS SHALL BE DESIGNED FOR ANY STRESS REVERSAL DUE TO UNEVENLY DISTRIBUTED LOADING.
5. ALL JOISTS SHALL HAVE 5" DEEP JOIST SEATS AND JOIST GIRDERS SHALL HAVE 7 1/2" DEEP SEAT, UNO.
6. DESIGN JOISTS FOR AN ADDITIONAL DEAD LOAD OF 32 PLF AT 6" SPRINKLER LINES AND 51 PLF AT 8" LINES.
7. JOIST SUPPLIER TO ACCOUNT FOR NET UPLIFT PRESSURES PER GENERAL NOTES ON SHEET S0.00 IN THEIR DESIGN.
8. JOIST SUPPLIER TO PROVIDE TOP AND BOTTOM CHORD BRIDGING AS REQUIRED BY SJI.
9. JOISTS ARE UNIFORMLY SPACED BETWEEN ADJACENT COLUMNS, BEAMS OR WALLS UNLESS NOTED OTHERWISE.

GENERAL NOTES

A. FOR GENERAL STRUCTURAL NOTES RE: S0.00
B. FOR TYPICAL STRUCTURAL DETAILS RE: S0.10
C. RE: ARCHITECTURAL DRAWINGS FOR ELEVATIONS
D. COORDINATE PERIMETER CONDITIONS WITH ARCHITECTURAL
E. RE: DETAILS FOR ADDITIONAL AXIAL LOADS REQ'D FOR GIRDERS, JOISTS, AND JOIST SEATS
F. CONTRACTOR TO COORDINATE AND CONFIRM MECH UNIT SIZE, LOCATION, & WEIGHTS. COORDINATE AND SUPPLY ALL REQUIRED LOADING TO THE JOIST SUPPLIER
G. CONTRACTOR TO COORDINATE w/ JOIST SUPPLIER ALL PIPING 4" DIAMETER AND LARGER
H. RE: 3/S5.10 FOR ADDITIONAL FRAMING REQUIRED FOR MECH EQUIPMENT AND OPENINGS. RE: ARCH FOR LOCATIONS OF SKYLIGHTS, SMOKE VENTS, ETC.
I. RE: 1/S5.10 FOR ADDITIONAL SUPPORT AT LOADS WEIGHING OVER 100 LBS.
J. RE: PLAN FOR BOTTOM OF METAL DECK ELEVATIONS.

LEGEND



KEYNOTES

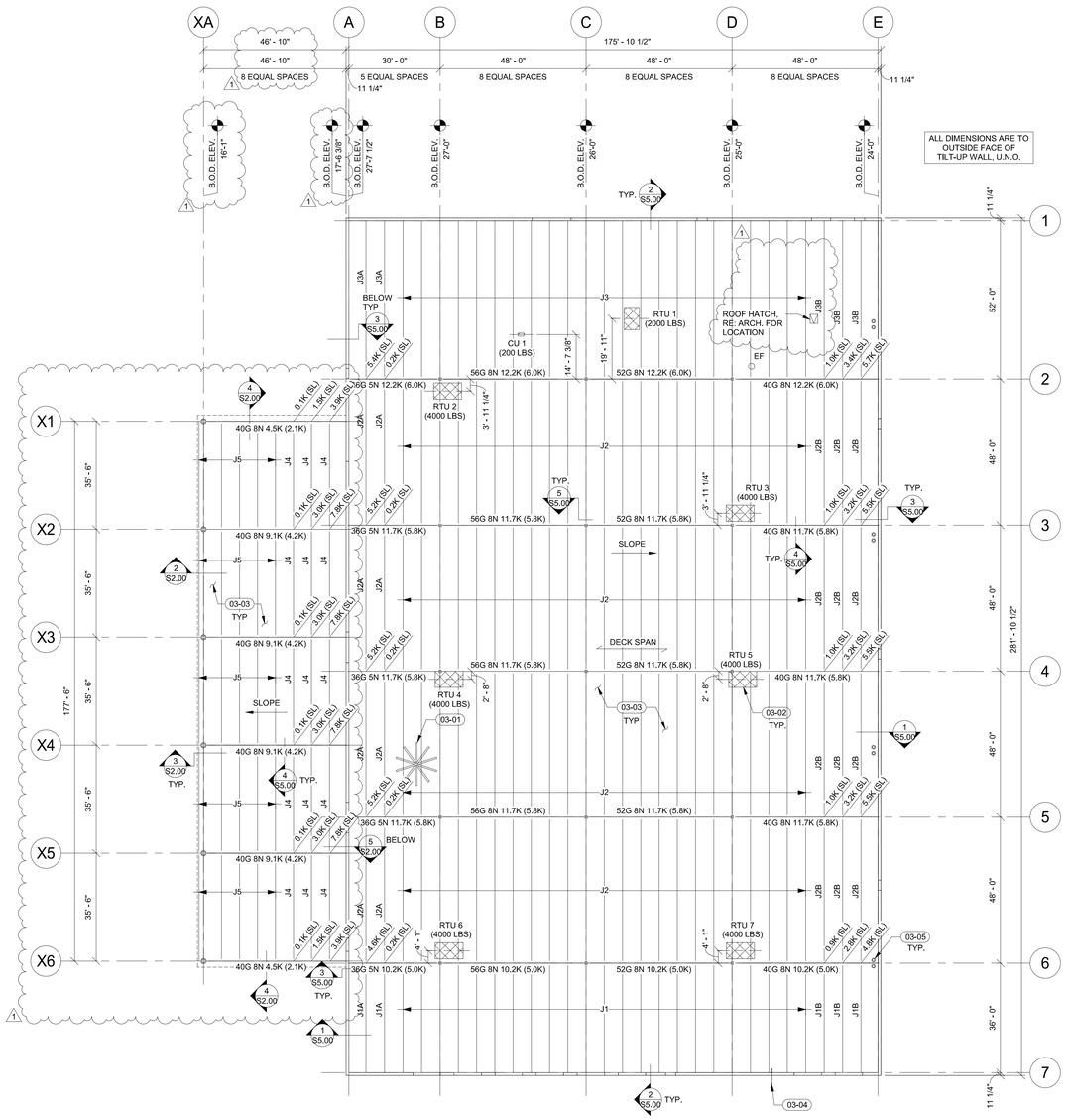
03-01 HVLS FAN, TYP. JOIST MANUF SHALL DESIGN JOISTS FOR A 300 LB DEAD LOAD AT EACH FAN.

03-02 MECHANICAL UNIT PER MEP, COORDINATE LOCATION AND FRAMING WITH MEP, DEVELOPER AND TENANT. RE: 3/S5.10 FOR ATTACHMENT.

03-03 1 1/2" TYPE B WIDE RIB DECK. RE: 3/S3.00 FOR DECK GAGE AND ATTACHMENT TO STEEL SUPPORTS.

03-04 WALL MOUNTED DAVIT CRANE, REF ARCH AND SPECS. REF 6/S5.00.

03-05 ROOF DRAIN, RE: ARCH, RE: 3/S5.10 FOR OPENING SUPPORT FRAMING.



1 S1.10 ROOF FRAMING PLAN
1" = 20'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15018
MATTHEW C. GEBHARDT
2026.06.09 10:48:55-05'00'

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

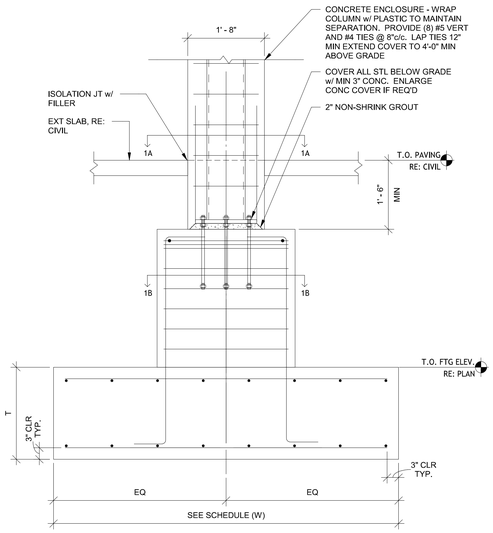
ID	Description	Date
1	REVISION 1	06.10.2026

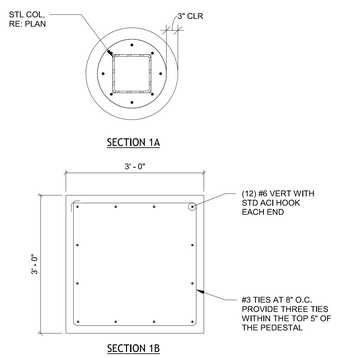
© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

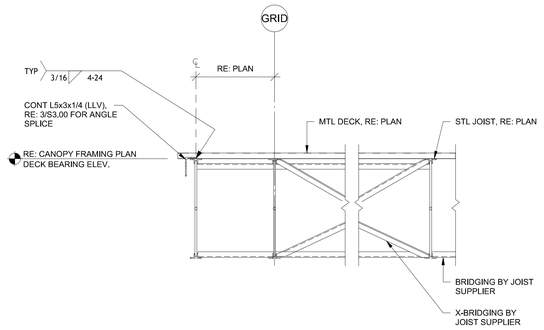
Sheet Title:
ROOF FRAMING PLAN

S1.10

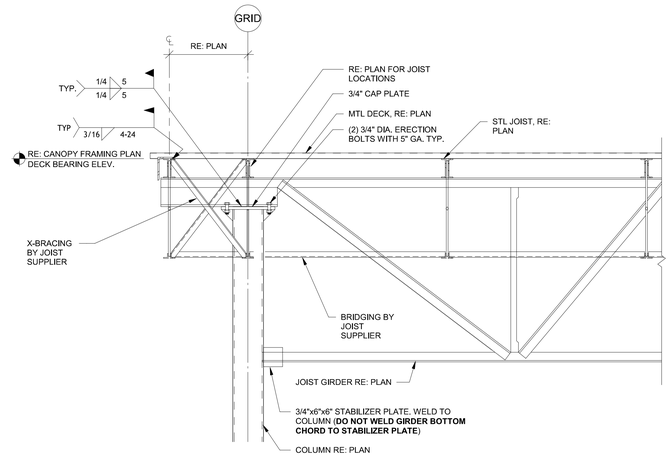




1 S2.00 CANOPY FOOTING SECTION
3/4" = 1'-0"



2 S2.00 CANOPY FRAMING SECTION
3/4" = 1'-0"



3 S2.00 CANOPY FRAMING SECTION
3/4" = 1'-0"

4 S2.00 CANOPY FRAMING SECTION
3/4" = 1'-0"

5 S2.00 CANOPY SECTION AT WALL
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
MATTHEW C. GOODRICH
No. 15018
REGISTERED PROFESSIONAL ENGINEER
2025.11.21 16:09:11-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

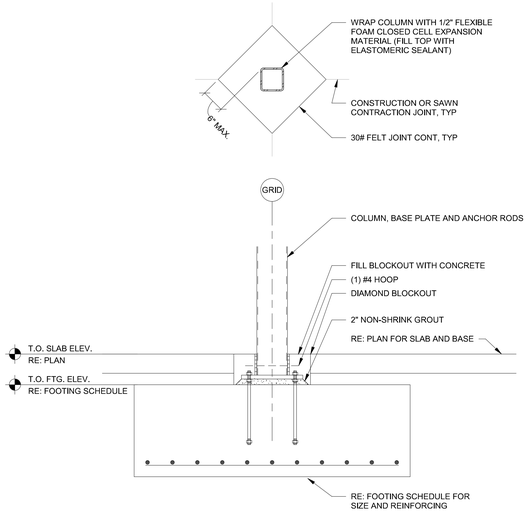
ID	Description	Date
-	60% SET	11.13.2025

© 2025 CESO, INC

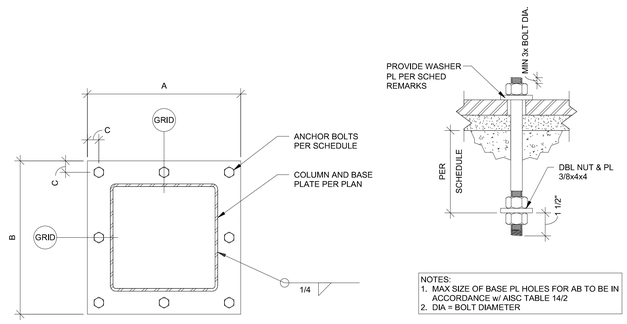
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
CANOPY DETAILS

S2.00



1 S3.00 HSS COLUMN TO FOOTING
NOT TO SCALE

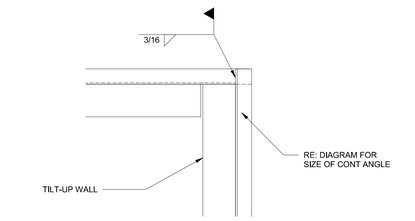


NOTES:
1. MAX SIZE OF BASE PL HOLES FOR AB TO BE IN ACCORDANCE w/ AISC TABLE 14/2
2. DIA = BOLT DIAMETER

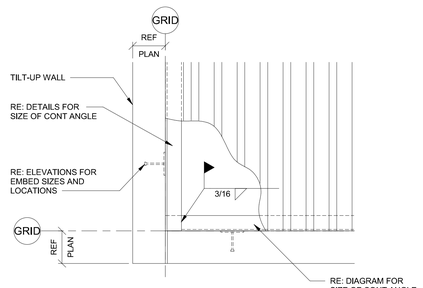
STRUCT - BASE PLATE (BP) SCHEDULE

MARK	BASE PLATE				ANCHOR BOLTS			REMARKS
	THICKNESS	"A"	"B"	"C"	NO.	DIA.	EMBED	
HSS10x10x1/4	3/4"	18"	18"	1 1/2"	4	3/4"	1'-0"	INTERIOR
HSS10x10x3/4	1 1/4"	22"	22"	2"	8	1 1/8"	2'-0"	CANOPY

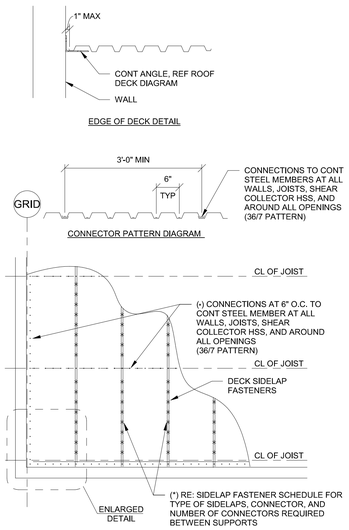
2 S3.00 BASE PLATE AND ANCHOR BOLT SCHEDULE
12" = 1'-0"

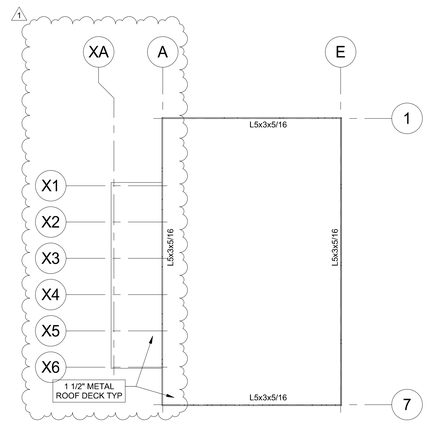


RE-ENTRANT CORNER



ENLARGED DETAIL



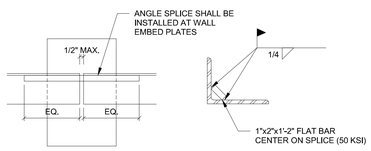


ROOF DECK DIAGRAM

ROOF DECK FASTENER SCHEDULE

(•) DECK TO CONTINUOUS STEEL MEMBER CONNECTOR TYPE (36/7 PATTERN)	(*) SIDE LAP CONNECTOR SPACING	SUITABLE BASE MATERIAL THICKNESS RANGE (IN)	REMARKS
5/8" VISIBLE DIAMETER PUDDLE WELDS	(3) AT (4) EQUAL SPACES	ALL THICKNESSES	BUILDING
POWDER ACTUATED HILTI X-HSN-24	(4) AT (5) EQUAL SPACES	1/8 TO 3/8 INCLUSIVE	BUILDING

NOTES:
1. ALL SIDE LAP SCREWS SHALL BE #12 SELF-DRILLING SCREWS AT EQUAL SPACES.
2. INSTALL ALL DIAPHRAGM CHORD ANGLES LLH AND CONTINUOUS, RE: SPLICE DETAIL.



TYPICAL CONTINUOUS ANGLE SPLICE

3 S3.00 ROOF DIAPHRAGM CONNECTION DIAGRAM AND SCHEDULE
NTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORITY — Wallace Design Collective, PC #93 — ARKANSAS ENGINEER

STATE OF ARKANSAS — LICENSED PROFESSIONAL ENGINEER — No. 15018 — MATTHEW C. GEDRICH
2026.06.09 10:48:55-05'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

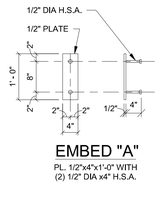
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

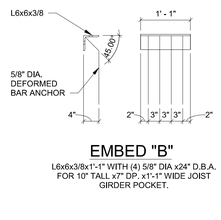
Sheet Title:
GENERAL SCHEDULES AND DETAILS

S3.00



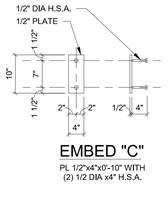
EMBED "A"

PL. 1/2"x4"x1'-0" WITH (2) 1/2" DIA x4" H.S.A.



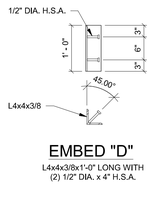
EMBED "B"

L6x6x3/8x1'-1" WITH (4) 5/8" DIA x24" D.B.A. FOR 10" TALL x7" DP. x1'-1" WIDE JOIST GIRDER POCKET.



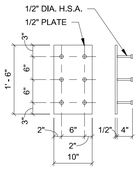
EMBED "C"

PL 1/2"x4"x0'-10" WITH (2) 1/2 DIA x4" H.S.A.



EMBED "D"

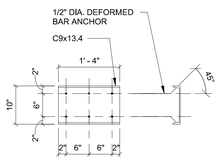
L4x4x3/8x1'-0" LONG WITH (2) 1/2" DIA. x 4" H.S.A.



EMBED "E"

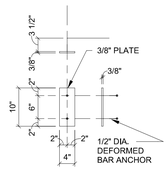
PL. 1/2"x10"x1'-6" WITH (6) 1/2" DIA x4" H.S.A.

NOT USED



EMBED "G"

11 1/4" THICK PANEL C10x15.3x1'-5" WITH (6) 1/2" DIA x 18" D.B.A.



EMBED "H"

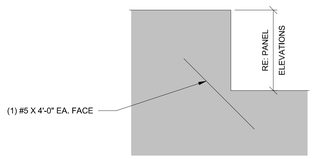
PL 3/8"x4"x0'-10" WITH (2) 1/2 DIA x18" D.B.A.

SITE CAST TILT-WALL NOTES:

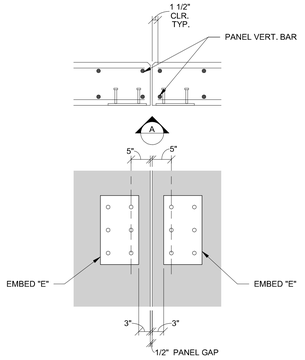
1. CONCRETE FOR WALL PANELS SHALL BE MINIMUM COMPRESSIVE STRENGTH OF 5,000 PSI AT 28 DAYS. RE: GENERAL NOTES AND THE PROJECT SPECIFICATION FOR ADDITIONAL REQUIREMENTS.
2. ALL PANELS ARE VIEWED FROM INSIDE (UNLESS NOTED OTHERWISE) AND SHALL BE CAST WITH EXTERIOR FACE DOWN.
3. ALL PANELS ARE 9 1/4" THICK UNLESS OTHERWISE NOTED.
4. RE: ARCHITECTURAL DRAWINGS FOR EXTERIOR FINISH AND REVEALS.
5. RE: STRUCTURAL SECTIONS FOR DOWELS TO SLAB AND EMBEDDED POCKET AND PLATES FOR SUPPORT OF JOISTS, BEAMS, AND GIRDERS TO PANELS.
6. ALL PLANS AND SECTIONS SHALL BE REVIEWED FOR REINFORCING AND EMBEDDED ITEMS NOT SHOWN ON THE PANEL ELEVATIONS.
7. RE: ARCHITECTURAL DRAWINGS FOR CONNECTIONS OF WOOD, ETC. TO PANELS.
8. RE: ARCH. AND MECHANICAL DRAWINGS FOR ADDITIONAL OPENINGS IN PANELS.
9. PANELS SHALL NOT BE LIFTED UNTIL CONCRETE HAS ATTAINED A MINIMUM COMPRESSIVE STRENGTH OF 3,000 PSI. CONTRACTOR SHALL NOT SUPPORT CRANE LOADS TO SLAB ON GRADE UNLESS AUTHORIZED BY THE OWNER IN WRITING.
10. THE CONTRACTOR SHALL PROVIDE DESIGN FOR THE LIFTING INSERTS AND ANY ADDITIONAL REINFORCING STEEL REQUIRED FOR LIFTING OPERATION. THE PANELS HAVE BEEN DESIGNED FOR GRAVITY, WIND AND SEISMIC CONDITIONS ONLY.
11. THE CONTRACTOR SHALL EMPLOY THE SERVICE OF A LIFTING ACCESSORY SUPPLIER TO DESIGN AND SUPPLY ALL THE HARDWARE FOR LIFTING AND BRACING THE WALL PANELS.
12. THE LIFTING ACCESSORIES SUPPLIER SHALL COMPLETE SHOP DRAWINGS COVERING ERECTION PROCEDURES, ADDITIONAL REINFORCEMENT AND TEMPORARY BRACING. THE SHOP DRAWINGS SHALL BE PREPARED AND SEALED BY A REGISTERED STRUCTURAL ENGINEER IN THE STATE OF WHERE THE PROJECT IS LOCATED.
13. THE CONTRACTOR SHALL VERIFY ALL WALL PANEL ELEVATIONS FOR DIMENSIONS, OPENINGS, BEAM AND JOIST GIRDER POCKET LOCATIONS AND WELD PLATE LOCATIONS AND REPORT AND DISCREPANCIES TO THE STRUCTURAL ENGINEER BEFORE POURING ANY PANELS.
14. EMBEDDED PLATES SHOWN ON TILT-WALL ELEVATIONS ARE FOR CONTRACTORS CONVENIENCE ONLY, CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR ALL EMBEDDED PLATES, ETC. INDICATED ON THE STRUCTURAL PLANS AND/OR SECTIONS WHETHER SHOWN OR NOT ON PANEL ELEVATIONS.
15. THE TILT-WALL ELEVATIONS MAY BE REPRODUCED FOR SHOP DRAWINGS USE AS LONG AS SEALS, COMPANY TITLE BLOCKS, ETC. ARE REMOVED. IN USING THESE DRAWINGS, THE CONTRACTOR/FABRICATOR SHALL TAKE FULL RESPONSIBILITY FOR CORRECTNESS OF ALL DIMENSIONS, EMBEDDED ITEMS AND OPENINGS SHOWN.
16. DO NOT SCALE TILT-WALL PANEL ELEVATIONS.
17. CONTRACTOR SHALL FURNISH AND SUBMIT SHOP DRAWINGS FOR REVIEW BY THE ENGINEER ON THE FOLLOWING ITEMS:
    - A. REINFORCING STEEL
    - B. EMBEDDED ITEMS FOR PLACEMENT
    - C. PANEL LIFTING INSERTS
    - D. DETAILS FOR TILT-WALL PANELS
    - E. PROPOSED EMBEDDED CONDUIT PLACEMENT
18. SYMBOLS AND ABBREVIATIONS:
    - N.S.------ NEAR SIDE
    - F.S.------ FAR SIDE
    - H.S.A.--- HEADED STUD ANCHOR
    - D.B.A.--- DEFORMED BAR ANCHOR
19. TEMPORARY BRACING OF PANELS SHALL NOT BE REMOVED UNTIL AFTER THE PANEL POUR STRIP HAS BEEN POURED AND ROOF DIAPHRAGM CONSTRUCTION AND ALL CONNECTIONS HAVE BEEN COMPLETED.
20. LIFTING INSERTS VISIBLE AFTER FINAL CONSTRUCTION SHALL BE PATCHED AND FINISHED TO MEET ARCHITECT'S APPROVAL.
21. ALL PANEL LEGS THAT ARE REMAINING AROUND THE SIDES OF OPENINGS ARE TO BE REINFORCED AS SHOWN BELOW. VERTICAL X PANEL HEIGHT AT EACH FACE OF PANEL WITH #4 TIES AT 6" O.C. VERTICAL

LEG WIDTH	VERT. REINF. (11 1/4")
1'-6" TO 1'-11"	(3) #8 (EA. FACE)
2'-0" TO 2'-5"	(4) #6 (EA. FACE)
2'-6" TO 2'-11"	(5) #6 (EA. FACE)
3'-0" TO 4'-0"	(6) #6 (EA. FACE)
4'-1" TO 5'-0"	(10) #6 (EA. FACE)

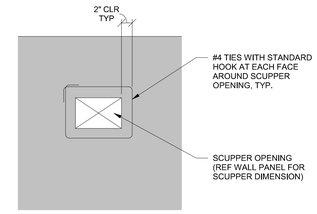
22. UNLESS OTHERWISE NOTED ON PANEL ELEVATIONS, PROVIDE (2) #6 CONTINUOUS AT BOTTOM OF PANEL, (2) #6 VERTICAL X PANEL HEIGHT, ON EACH END OF PANEL, (2) #6 CONTINUOUS AT TOP OF PANEL, AND (2) #6 x6'-0" (36" LEGS) AT ALL CORNERS OF PANEL. PROVIDE ONE BAR EA. FACE AT DOUBLE MAT REINF.
23. MAT STEEL REINFORCING IS TO BE AS FOLLOWS:
    - A. 11 1/4" THICK PANELS ---------- #6 AT 12" O.C. VERTICAL BAR (EA. FACE)
    - B. 11 1/4" THICK PANELS ---------- #4 AT 12" O.C. HORIZONTAL BAR (EA. FACE)
24. RE: 4/S4.00 FOR REINF REQ'D AT DOCK WALL PANELS BELOW FFE.
25. UNLESS OTHERWISE NOTED ON PANEL ELEVATIONS, PROVIDE (4) #6 VERTICAL AT 6" O.C. CENTERED IN PANEL X PANEL HEIGHT AT ALL BEAMS/JOIST GIRDER LOCATIONS IN ADDITION TO TYPICAL PANEL REINFORCING.
26. AT ALL PANEL OPENINGS OR FUTURE KNOCKOUT OPENINGS PROVIDE (2) #6 VERTICAL X PANEL HEIGHT AT EACH SIDE OF OPENING, (2) #6 x PANEL WIDTH AT TOP AND BOTTOM OF OPENING AND (2) #6 x5'-0" DIAG. AT EA. CORNER OF OPENING. PROVIDE ONE BAR EACH FACE AT DOUBLE MAT REINF.
27. RE: GENERAL NOTES SECTIONS: "CONCRETE" AND "SITE CAST TILT-UP CONCRETE WALL PANEL" FOR ADDITIONAL SPECIFICATIONS
28. EACH WALL PANEL SHALL BE SET ON MINIMUM OF (5) SETTING PADS, (1) PAD AT EACH END AND QUARTER POINTS OF PANEL.
29. GROUT SPACE BENEATH WALL PANELS FOR FULL BEARING THE SAME DAY WALL PANELS ARE SET. NON-SHRINK GROUT SHALL BE A NON-METALLIC, SHRINKAGE RESISTANT, PREMIXED, NON-CORROSIVE, NON-STAINING PRODUCT CONTAINING PORTLAND CEMENT, SILICA SAND, SHRINKAGE COMPENSATING AGENTS, AND FLUIDITY IMPROVING COMPOUNDS. NON-SHRINK GROUT SHALL CONFORM TO CORPS OF ENGINEERS SPECIFICATION FOR NON-SHRINK GROUT, C3-CRD-C621, 28-DAY COMPRESSIVE STRENGTH AS DETERMINED BY GROUT CUBE TESTS SHALL BE 5,000 PSI PACK SPACES UNDERNEATH LOAD-BEARING ELEMENTS WITH STIFF GROUT MATERIAL TAMPING UNTIL VOIDS ARE COMPLETLY FILLED. PLACE GROUT TO FINISH SMOOTH, PLUMB, AND LEVEL WITH ADJACENT CONCRETE SURFACES ENSURING THAT ALL BEARING PLATES AND STEEL SHIMS ARE ENCASED.
30. TEMPORARY ERECTION BRACING OF PANELS SHALL BE LOCATED SUCH THAT NO INTERFERENCE OR INTERRUPTION WITH CONTINUOUS ROOF EDGE ANGLES IS REQUIRED.
31. PANELS DAMAGED DURING ERECTION SHALL BE REPAIRED AS DIRECTED BY THE STRUCTURAL ENGINEER OF RECORD.



4 S3.10 REINFORCEMENT AT PARAPET STEP
1/8" = 1'-0"

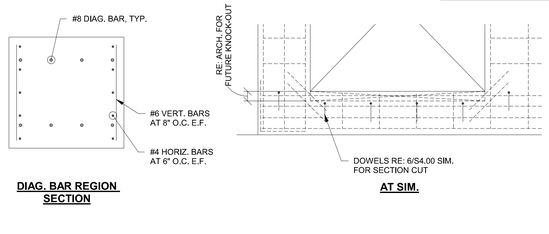


3 S3.10 EMBED DETAIL AT PANEL JOINT / EDGE
3/4" = 1'-0"



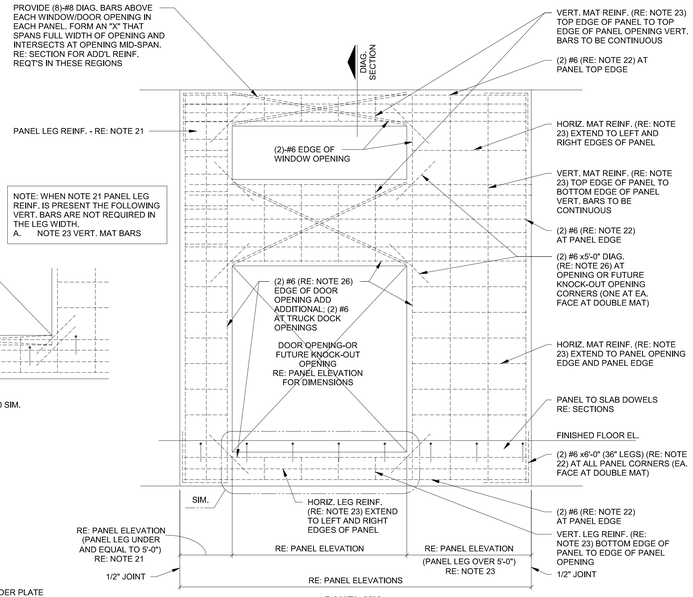
REINFORCEMENT AROUND SCUPPER OPENING

2 S3.10 3/4" = 1'-0"



DIAG. BAR REGION SECTION

AT SIM.

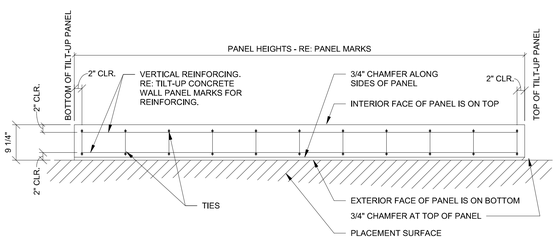


PANEL MK.

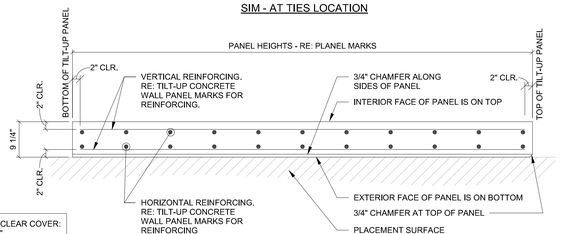
PANEL THK.

NOTE: PANEL LEG REFERS TO SMALLEST LEG SECTION FROM EDGE OF WALL PANEL / OPENINGS WHEN VERTICALLY SPACED OPENINGS ARE OF UNEQUAL WIDTH.

TYPICAL PANEL REINF. INFORMATION
AT PANELS WITH OPENINGS
NOTE: RE: PANEL ELEVATIONS FOR ANY ADDITIONAL OR REPLACEMENT REINFORCING



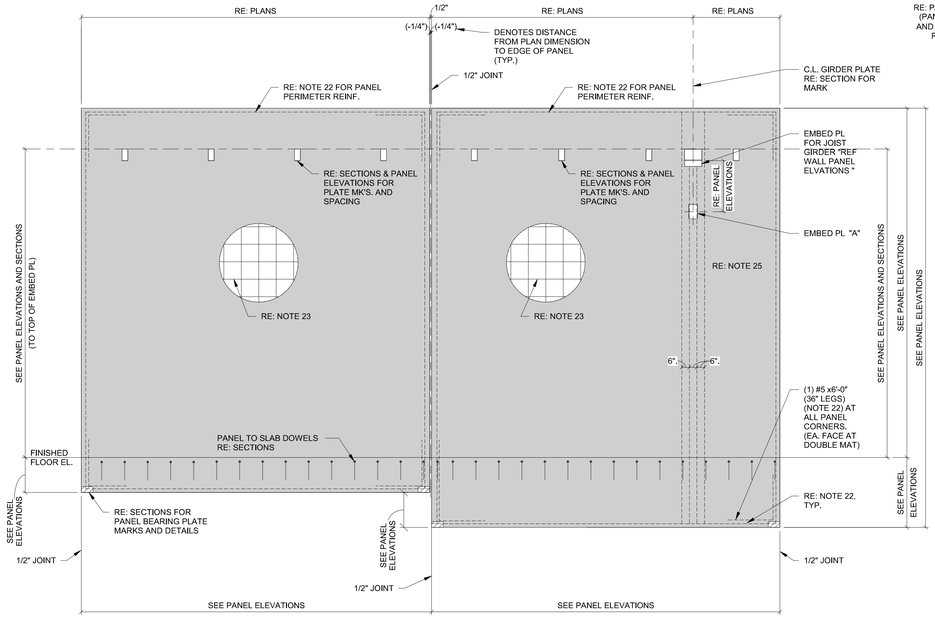
SIM - AT TIES LOCATION



CONCRETE CLEAR COVER:
TOP = 2"
BOTTOM = 2"
END = 2"
SIDE:
1" (TIES)

NOTE:
PLACE VERTICAL BARS NEAR EA. FACE OF PANEL AS SHOWN.

DOUBLE LAYER REINFORCING



PANEL MK. **PANEL MK.**

TYPICAL PANEL REINF. INFORMATION
NOTE: RE: PANEL ELEVATIONS FOR ANY ADDITIONAL OR REPLACEMENT REINFORCING

1 S3.10 TYP. TILT-UP PANEL REINFORCEMENT DETAIL
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORITY
Wallace Design Collective, PC #93
OKLAHOMA ENGINEER

STATE OF ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
MATTHEW C. GOODRICH
No. 15018
2025.11.21 16:09:12-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

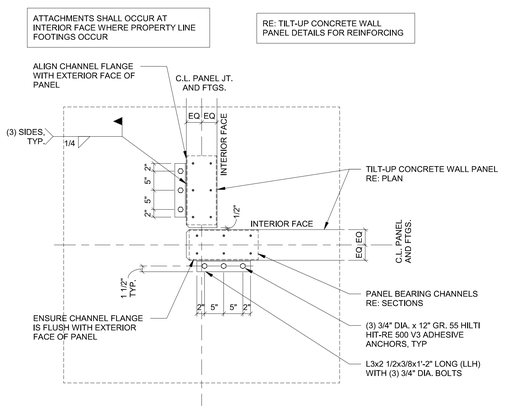
ID	Description	Date

© 2025 CESO, INC

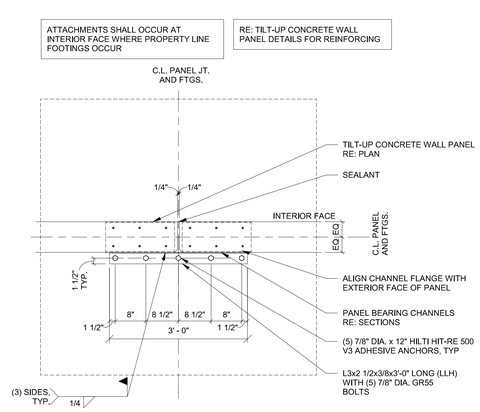
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PANEL NOTES AND EMBEDS

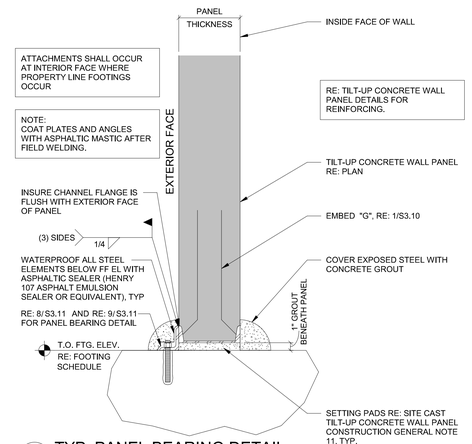
S3.10



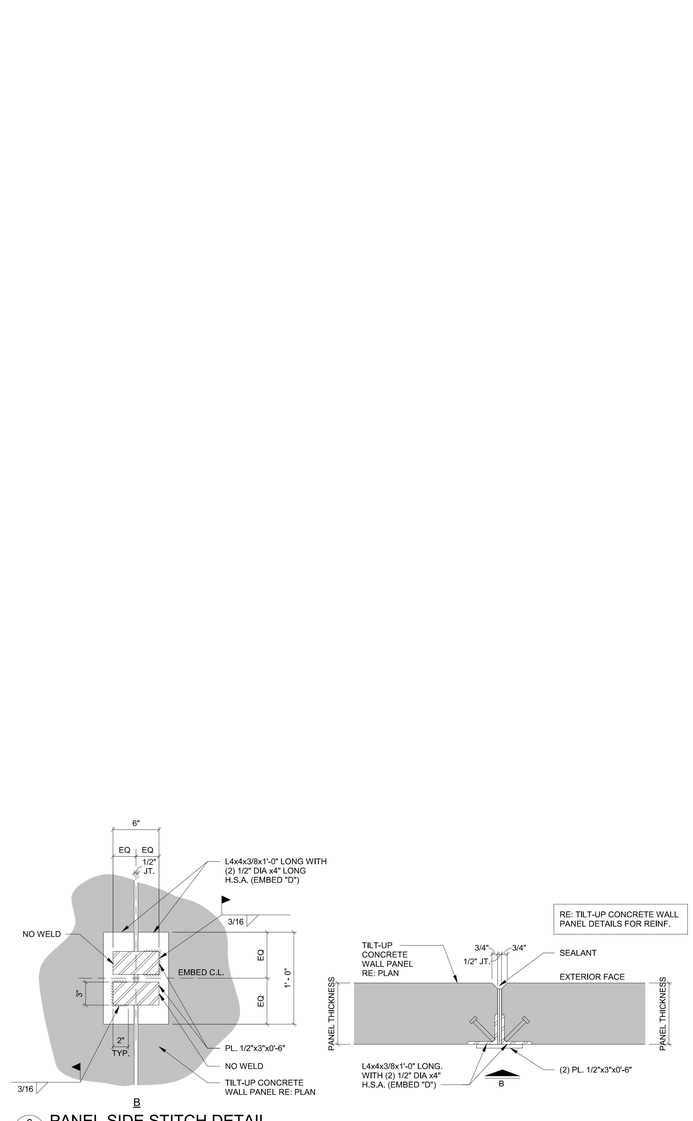
9 S3.11 PANEL BEARING DETAIL
3/4" = 1'-0"



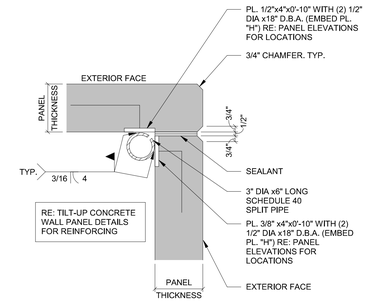
8 S3.11 PANEL BEARING DETAIL
3/4" = 1'-0"



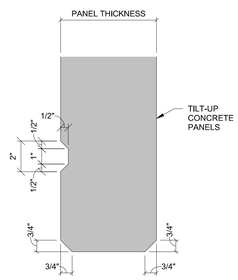
7 S3.11 TYP. PANEL BEARING DETAIL
1 1/2" = 1'-0"



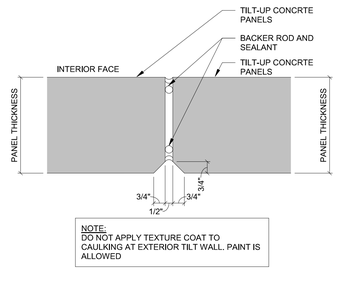
6 S3.11 PANEL SIDE STITCH DETAIL
1 1/2" = 1'-0"



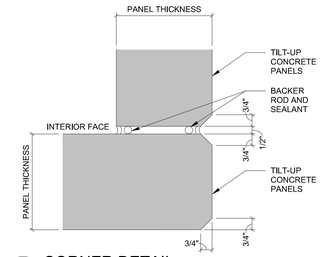
5 S3.11 CORNER STITCH DETAIL
1 1/2" = 1'-0"



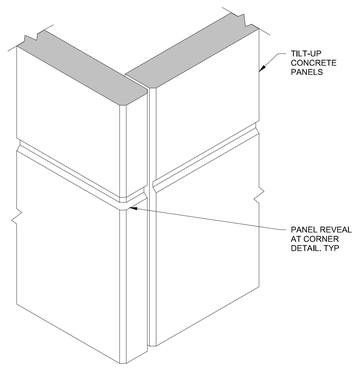
4 S3.11 REVEAL DETAIL
3" = 1'-0"



3 S3.11 TYPICAL PANEL JOINT DETAIL
3" = 1'-0"



2 S3.11 CORNER DETAIL
3" = 1'-0"



1 S3.11 REVEAL AT CORNER DETAIL
1" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
MATTHEW C. GOODRICH
REGISTERED PROFESSIONAL ENGINEER
No. 15018
2025.11.21 16:09:12-06'00'

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

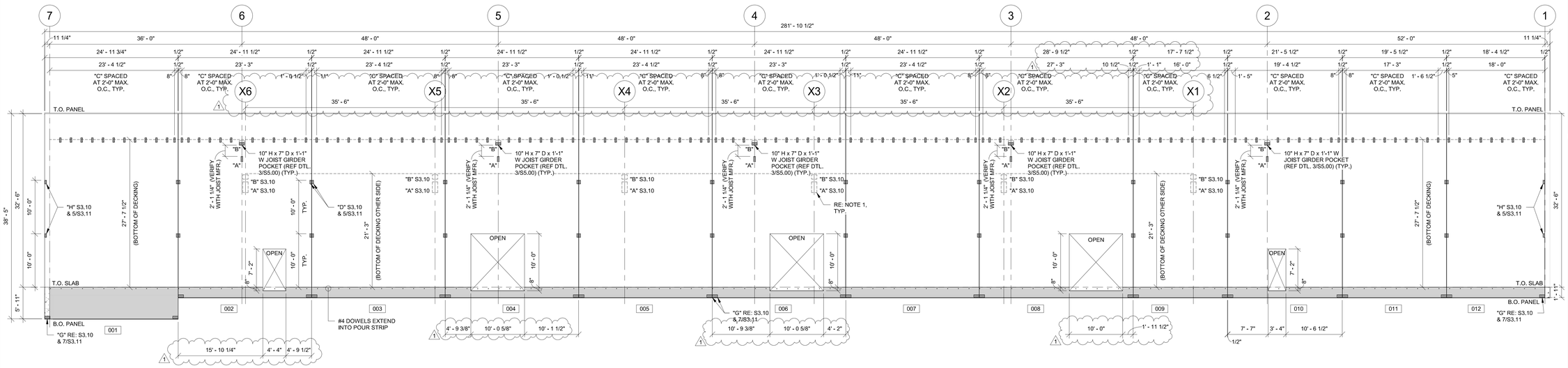
ID	Description	Date

© 2025 CESO, INC

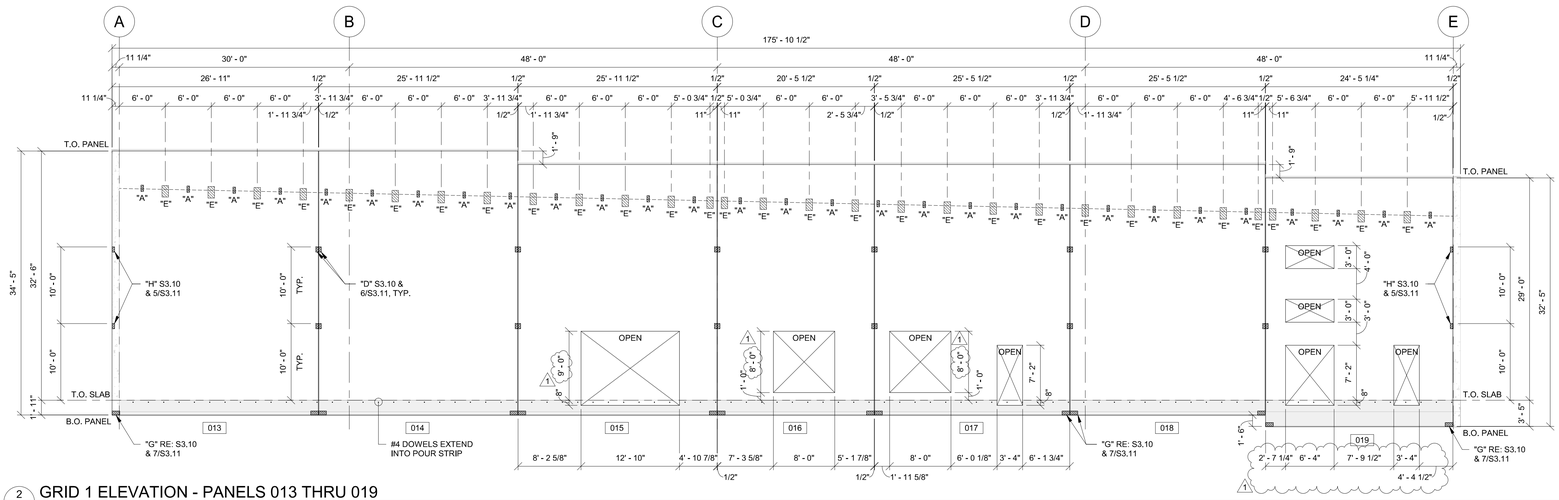
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
WALL PANEL DETAILS

S3.11



1 S3.20 GRID A ELEVATION - PANELS 001 THRU 012
1/8" = 1'-0"



2 S3.20 GRID 1 ELEVATION - PANELS 013 THRU 019
1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORITY
Wallace Design Collective, PC
#93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
MATTHEW C. GEBHARDT
No. 15018
2026.06.09 10:46:55-05'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

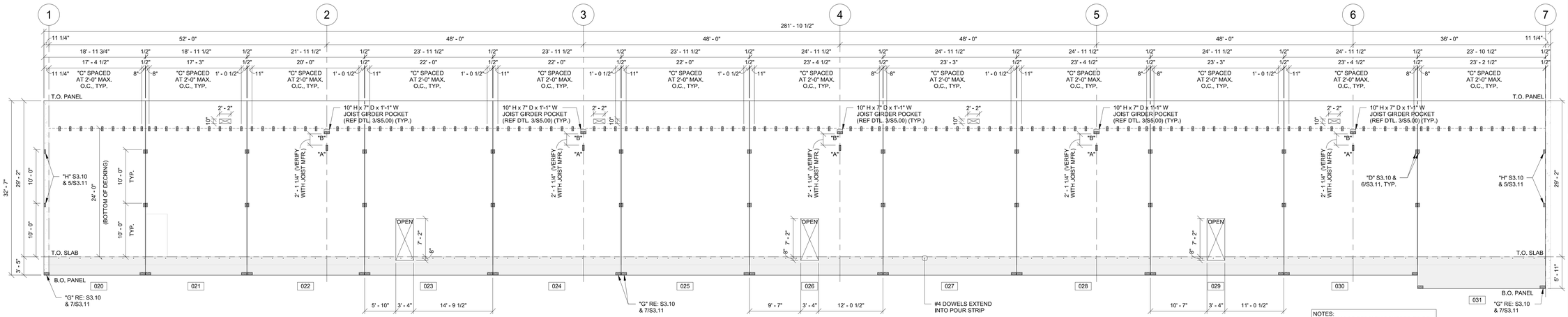
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
EXTERIOR WALL ELEVATIONS

S3.20



NOTES:
1. BOTTOM OF PRIMARY SCUPPER TO BE FLUSH W/ T/ROOF. GC TO PROVIDE EOR WITH FINAL ROOF INSULATION THICKNESS SO THAT SCUPPER ELEVATIONS CAN BE ESTABLISHED CORRECTLY.

NOTES:
1. TRUCK DOCK LEVELER DEPTH (VERIFY WITH MANUFACTURER) + 1'-0" FOR FLOOR SLAB, TYP. U.N.O.

1 S3.21 GRID E ELEVATION - PANELS 020 THRU 031
1/8" = 1'-0"

2 S3.21 GRID 7 ELEVATION - PANELS 032 THRU 038
1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORITY
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15018
MATTHEW C. GEISWEILER
2026.06.09 10:48:55-05'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

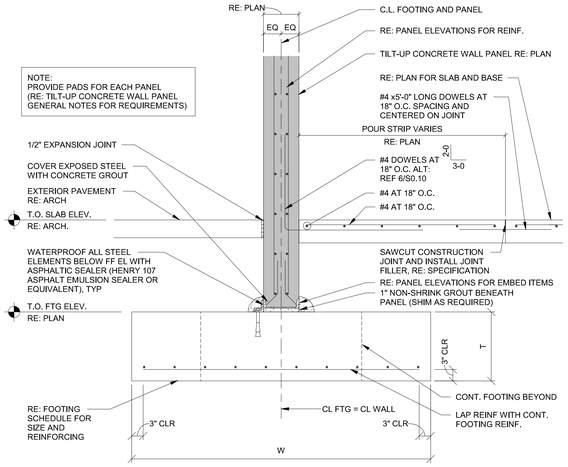
ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC

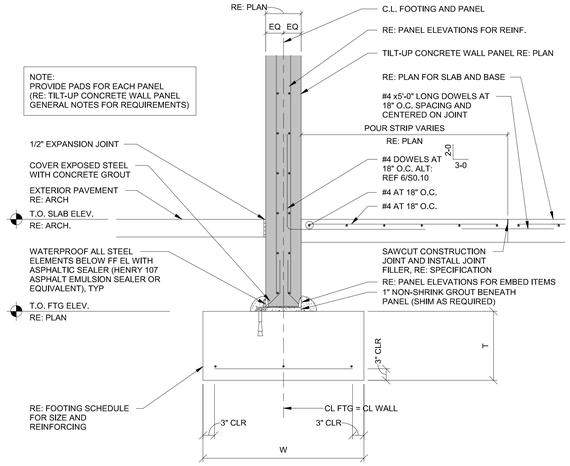
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
EXTERIOR WALL ELEVATIONS

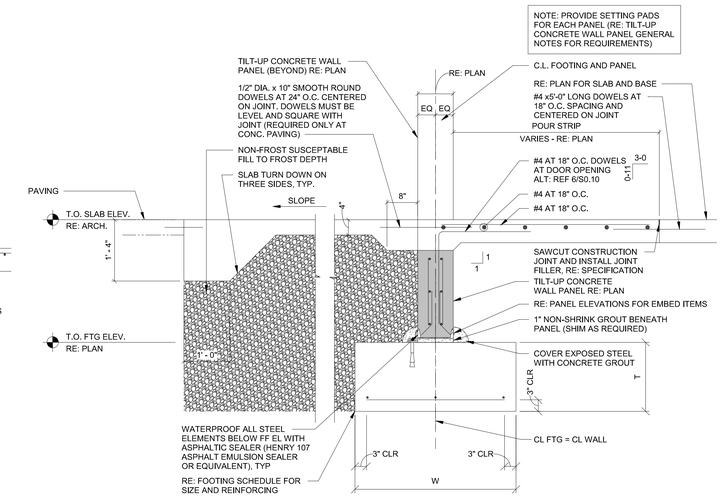
S3.21



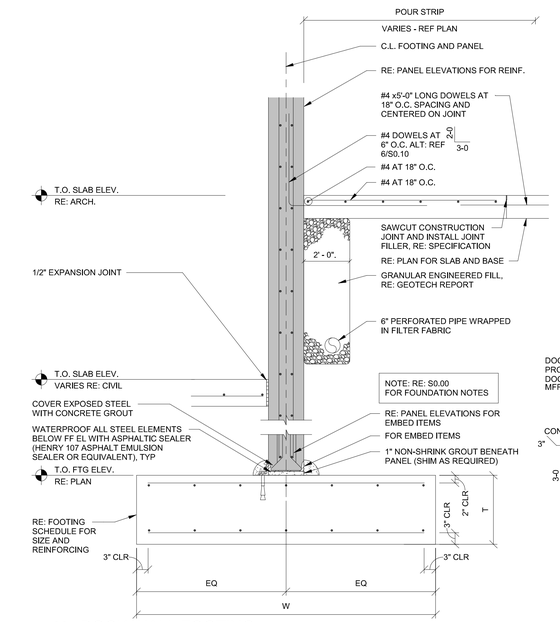
1 S4.00 TILT-UP EXTERIOR WALL SPOT FOOTING
3/4" = 1'-0"



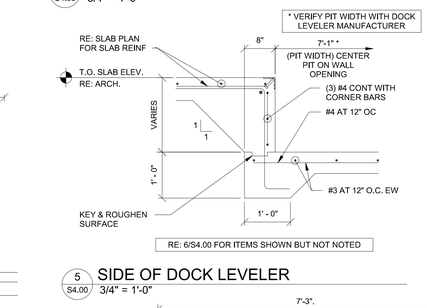
2 S4.00 SECTION AT WALL BASE AT CONTINUOUS WALL FOOTING
3/4" = 1'-0"



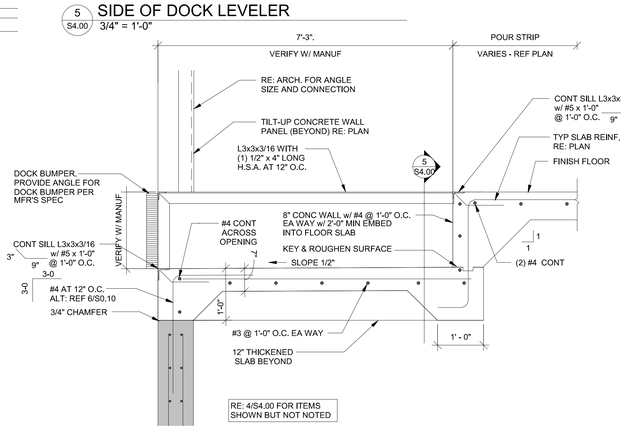
3 S4.00 SLAB AT OPENING
3/4" = 1'-0"



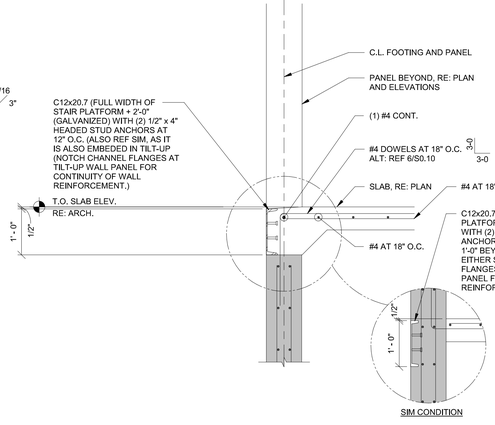
4 S4.00 DOCK WALL FOOTING
3/4" = 1'-0"



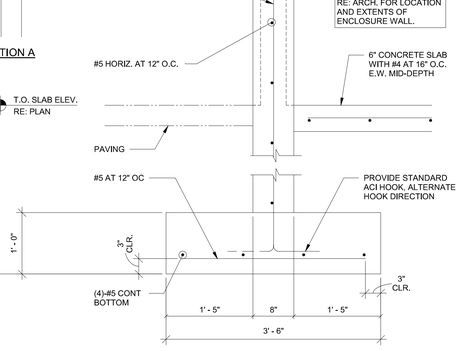
5 S4.00 SIDE OF DOCK LEVELER
3/4" = 1'-0"



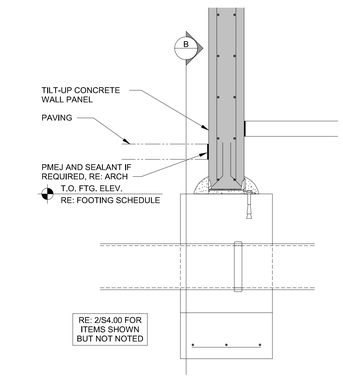
6 S4.00 DOCK LEVELER SECTION
3/4" = 1'-0"



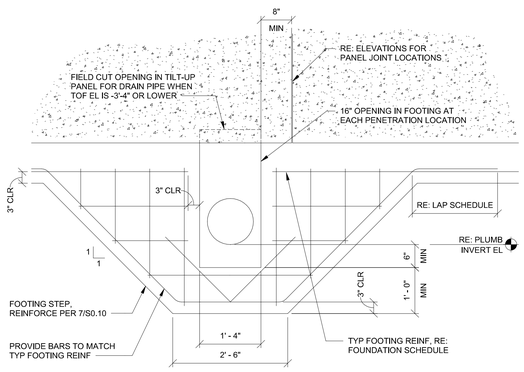
7 S4.00 SECTION AT TDR DOOR
3/4" = 1'-0"

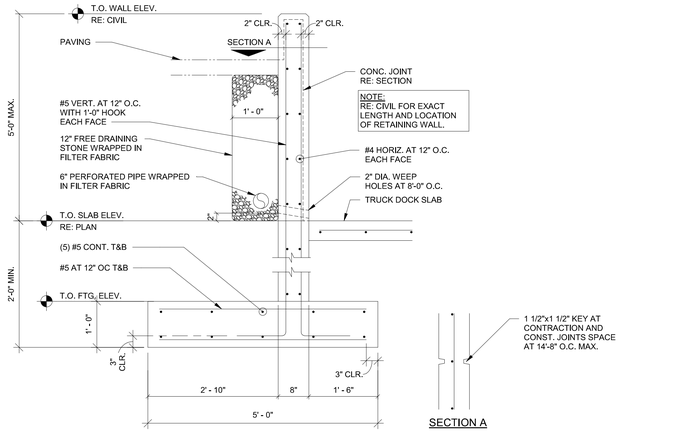


8 S4.00 LIGHT POLE FOUNDATION
3/4" = 1'-0"



9 S4.00 PENETRATION AT FOUNDATION WALL
3/4" = 1'-0"





10 S4.00 DOCK RETAINING WALL
3/4" = 1'-0"

11 S4.00 TRASH ENCLOSURE WALL SECTION
1" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
MATTHEW C. GOODRICH
ENGINEER
No. 15018
2025.11.21 16:09:12-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

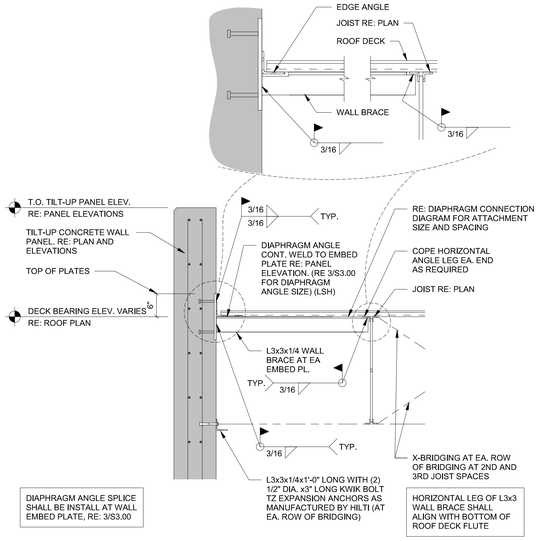
ID	Description	Date

© 2025 CESO, INC

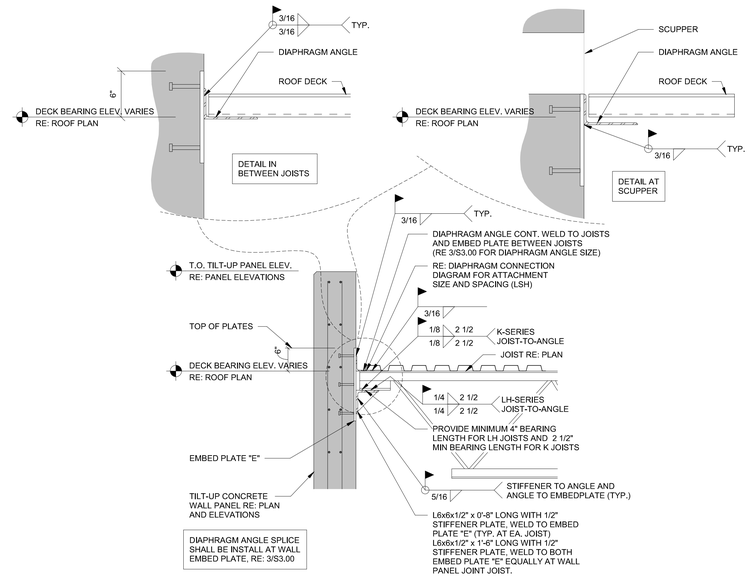
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FOUNDATION DETAILS

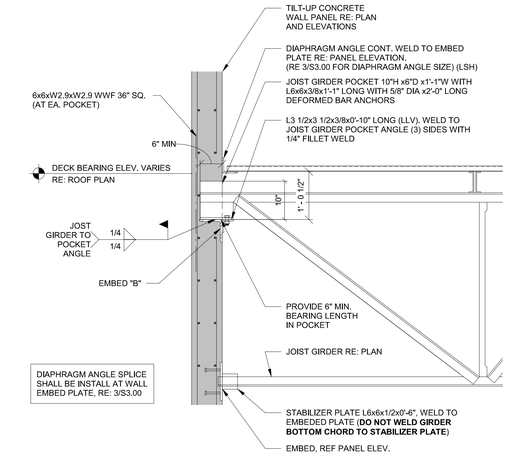
S4.00



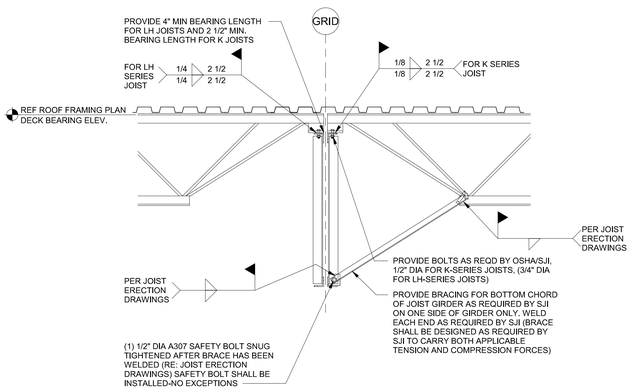
1 S5.00 WALL SECTION PARALLEL TO JOISTS
3/4" = 1'-0"



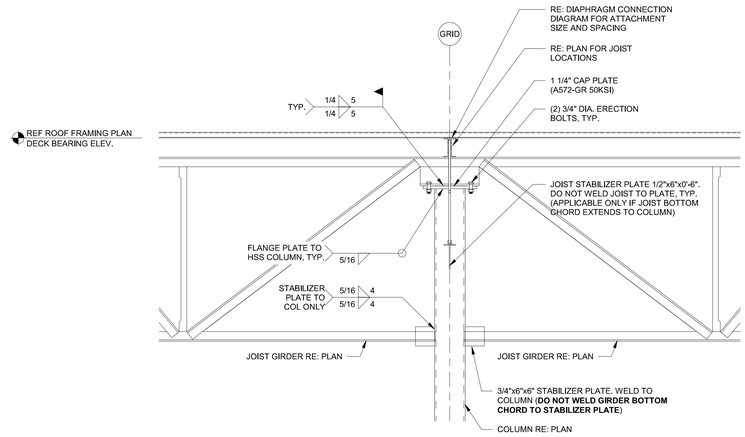
2 S5.00 WALL SECTION PERPENDICULAR TO JOISTS
3/4" = 1'-0"



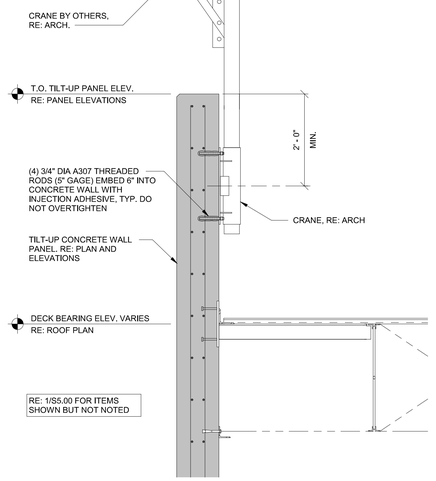
3 S5.00 GIRDER BEARING AT TILT-UP WALL
3/4" = 1'-0"



4 S5.00 JOIST TO JOIST GIRDER
3/4" = 1'-0"



5 S5.00 JOIST GIRDER AT COLUMN
3/4" = 1'-0"



6 S5.00 CRANE CONNECTON DETAIL
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC #93
ARKANSAS ENGINEER

STATE OF ARKANSAS
MATTHEW C. GOODRICH
No. 15018
2025.11.21 16:09:12-06'00'

PROJECT TCC MOUNTAIN

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date

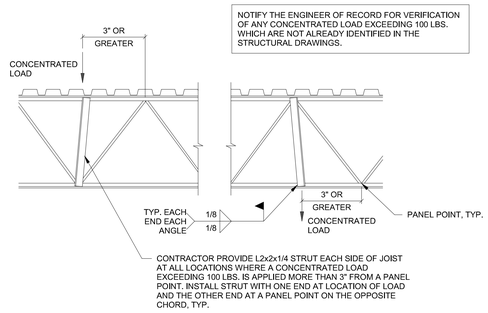
© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ROOF FRAMING DETAILS

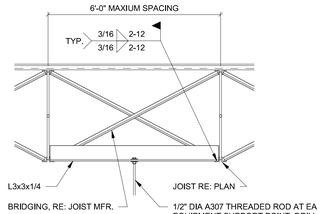
S5.00

NOTIFY THE ENGINEER OF RECORD FOR VERIFICATION OF ANY CONCENTRATED LOAD EXCEEDING 100 LBS. WHICH ARE NOT ALREADY IDENTIFIED IN THE STRUCTURAL DRAWINGS.

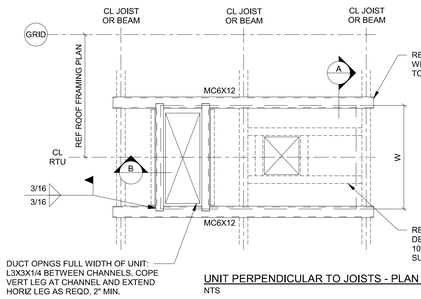


1 S5.10 JOIST REINFORCING DETAIL
3/4" = 1'-0"

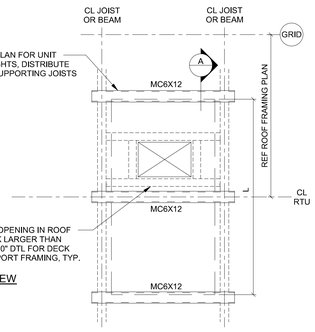
NOTE:
LOCATE ANGLE WITHIN 3" OF JOIST PANEL POINT OR INSTALL JOIST REINFORCING, RE: 1/S5.10



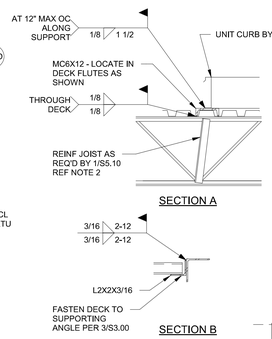
2 S5.10 TYP SUSPENDED EQUIPMENT SUPPORT DETAIL
NOT TO SCALE



UNIT PERPENDICULAR TO JOISTS - PLAN VIEW
NTS

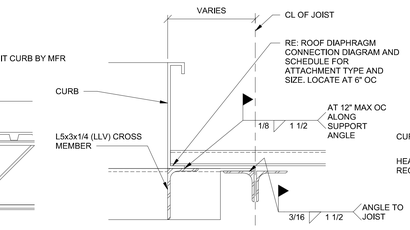


UNIT PARALLEL TO JOISTS - PLAN VIEW
NTS

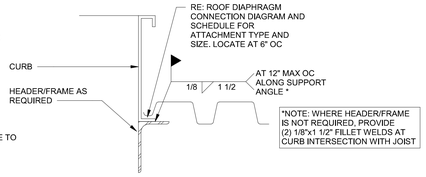


SECTION A

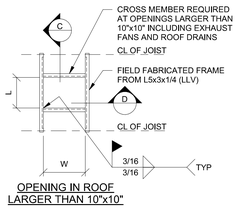
SECTION B



SECTION C



SECTION D



OPENING IN ROOF LARGER THAN 10"x10"

NOTES:

1. GC SHALL COORDINATE RTU DIMENSIONS AND FRAMING LOCATIONS WITH STEEL FABRICATOR, MECHANICAL AND ERECTION SUBCONTRACTORS. STRUCTURAL CURB PLACEMENT SHALL ALLOW FOR SUPPLY/RETURN OPENINGS TO FALL BETWEEN JOISTS. RE: MECHANICAL FOR EXACT CURB LOCATION AND ORIENTATION.
2. THE UNIT LOCATING DIMENSIONS SHOWN ON PLAN ARE FOR THE JOIST MANUFACTURER TO USE TO LOCATE CONCENTRATED LOADS AND ARE NOT INTENDED TO PROVIDE EXACT LOCATIONS OF STEEL FRAMING FOR SUPPORT OF THE UNIT. ADJUST LOCATION OF RTU SO CURB FALLS WITHIN 3 INCHES OF JOIST PANEL POINTS. IF CURB IS MORE THAN 3 INCHES FROM PANEL POINT ADD REINFORCING PER JOIST REINFORCING DETAIL. (1/S5.10)
3. REMOVE DECK AT DUCT PENETRATIONS ONLY.
4. INSTALL MC6X12'S AFTER DECK PLACEMENT.
5. POSITION CURB OVER CHANNELS AND LOCATE REQUIRED DUCT PENETRATIONS THROUGH ROOF. REFER TO MECHANICAL DRAWINGS FOR EXACT SIZES.
6. DECK SUPPORT ANGLE MAY BE OMITTED IF EDGE OF PENETRATION IS WITHIN 6 INCHES OF A JOIST.

3 S5.10 ROOF TOP UNIT AND DECK SUPPORT
3/4" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

wallace design collective
wallace design collective, pc
structural · civil · landscape · survey
123 north martin luther king jr. boulevard
tulsa, oklahoma 74103
918.584.5858 · 800.364.5858

CERTIFICATE OF AUTHORIZATION
Wallace Design Collective, PC
#93
ARKANSAS ENGINEER

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
MATTHEW C. GOODRICH
No. 15018
2025.11.21 16:09:12-06'00'

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	GH
Checked By:	HR/MG
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
STEEL FRAMING DETAILS

S5.10

Division 21: AUTOMATIC SPRINKLER SYSTEM

1. GENERAL INSTRUCTIONS

A. GENERAL REQUIREMENTS

Requirements under Division 01 and the general and supplementary conditions of these specifications shall apply to this section and division. Where the requirements of this section and division exceed those of Division 01, this section and division take precedence. Become thoroughly familiar with all its contents as to requirements that affect this division, section, or both. Work required under this division includes all material, equipment, appliances, transportation, services, and labor required to complete the entire system as required by the drawings and specifications, or reasonably inferred to be necessary to facilitate the function of each system as implied by the design and the equipment specified.

The specifications and drawings for the project are complementary, and any portion of work described in one shall be provided as if described in both. In the event of discrepancies, notify the Engineer and request clarification prior to proceeding with the work involved.

Drawings are graphic representations of the work upon which the contract is based. They show the materials and their relationship to one another, including sizes, shapes, locations, and connections. They convey the scope of work, indicating the intended general arrangement of the systems without showing all of the exact details as to elevations, offsets, control lines, and other installation requirements. Use the drawings as a guide when laying out the work and to verify that materials and equipment will fit into the designated spaces, and which when installed per manufacturers' requirements, will ensure a complete, coordinated, satisfactory, and properly operating system.

Refer to Division 22 for additional requirements that apply to this installation that are not written herein.

B. DEFINITIONS

Division: References contained in this specification follow the numbering system defined in the Construction Specifications Institute (CSI) MasterFormat 2004 Edition. Specification Divisions 01 through 13 provided with this project may reference the CSI MasterFormat 1995 Edition. The corresponding division references between the 2004 Edition and 1995 Edition are as follows:

2004 Edition	1995 Edition
1. Division 21 – Fire Suppression	Division 15
2. Division 22 – Plumbing	Division 15
3. Division 23 – HVAC	Division 15
4. Division 26 – Electrical	Division 16
5. Division 27 – Communications	Division 16
6. Division 28 – Electronic Safety and Security	Division 16

Furnish: "to supply and deliver to the project site, ready for unloading, unpacking, assembly, installation and similar operations."

Install: "to perform all operations at the project site including, but not limited to, the actual unloading, unpacking, assembling, erecting, placing, anchoring, applying, working to dimension, finishing, curing, protecting, cleaning, testing, commissioning, starting up and similar operations, complete, and ready for the intended use."

Provide: "to furnish and install, complete and ready for the intended use."

Furnished by Owner (or Owner-Furnished) or Furnished by Others: "an item furnished by the Owner or under other divisions or contracts, and installed under the requirements of this division, complete and ready for the intended use, including all items and services incidental to the work necessary for proper installation and operation. Include the installation under the warranty required by this division."

Engineer: Where referenced in this division, "Engineer" is the Engineer of Record and the Design Professional for the work under this division, and is a consultant to, and an authorized representative of the Architect, as defined in the General and/or Supplementary Conditions. When used in this division, Engineer means increased involvement by and obligations to the Engineer, in addition to involvement by and obligations to the Architect.

AHJ: The local code and/or inspection agency (Authority) Having Jurisdiction over the work.

NRTL: Nationally recognized testing laboratory, as defined and listed by OSHA in 29 CFR 1910.7 (e.g., UL, ETL, CSA), and acceptable to the AHJ over this project. Nationally recognized testing laboratories and standards listed are used only to represent the characteristics required and are not intended to restrict the use of other NRTLs that are acceptable to the AHJ and standards that meet the specified criteria.

Substitution: Changes in products, materials, equipment, and methods of construction from those required by the Contract Documents and proposed by Contractor. Substitutions include Value Engineering proposals.
1. Substitutions for Cause: Changes proposed by Contractor that are required due to changed Project conditions, such as unavailability of product, regulatory changes, or unavailability of required warranty terms.
2. Substitutions for Convenience: Changes proposed by Contractor or Owner that are not required in order to meet other Project requirements but may offer advantage to Contractor or Owner.

The terms "approved equal", "equivalent", or "equal" are used synonymously and shall mean "accepted by or acceptable to the Engineer as equivalent to the item or manufacturer specified". The term "approved" shall mean labeled, listed, or both, by an NRTL, and acceptable to the AHJ over this project.

C. PREBID SITE VISIT

Prior to submitting bid, visit the site of the proposed work and become fully informed as to the conditions under which the work is to be done. Failure to comply with this requirement shall not be considered sufficient justification to request or obtain extra compensation over and above the contract price.

D. MANUFACTURERS

In other articles where lists of manufacturers are introduced, subject to compliance with requirements, provide products by one of the manufacturers specified.

Where a list is provided, manufacturers are listed alphabetically and not in accordance with any ranking or preference.

Where manufacturers are not listed, provide products subject to compliance with requirements from manufacturers that have been actively involved in manufacturing the specified product for no less than 5 years.

E. COORDINATION

Coordinate the connection of the fire sprinkler alarm devices to the fire alarm system as required.

Coordinate work with that of other trades so that the various components of the systems are installed at the proper time, will fit the available space, and will allow proper service access to those items requiring maintenance. Components installed without regard to the above shall be relocated at no additional cost to the Owner.

F. SUBSTITUTIONS

Materials, products, equipment, and systems described in the Bidding Documents establish a standard of required function, dimension, appearance and quality to be met by the proposed substitution. The base bid shall include only the products from manufacturers specifically named in the drawings and specifications. To request a substitution, request the Substitution Request Form from the Architect or Engineer. Complete and send the Substitution Request From for each material, product, equipment, or system that is proposed to be substituted. The burden of proof of the merit of the proposed substitution is upon the proposer.

Unless stated otherwise in writing to the Engineer by the Contractor, Contractor warrants to the Engineer, Architect, and Owner the following:
1. Proposed substitution has been fully investigated and determined to meet or exceed the specified Work in all respects unless stated otherwise in the substitution request.
2. Proposed substitution is consistent with the Contract Documents and will produce indicated results, including functional clearances, maintenance service, and sourcing of replacement parts.
3. Proposed substitution has received necessary approvals of authorities having jurisdiction.
4. Same warranty will be furnished for proposed substitution as for specified Work.
5. If accepted substitution fails to perform as required, Contractor shall replace substitute material or system with that originally specified and bear costs incurred thereby.
6. Coordination, installation and changes in the Work as necessary for accepted substitution will be complete in all respects.

No substitutions will be considered unless the Substitution Request Form is completed and attached with the appropriate substitution documentation. No substitution will be considered prior to receipt of bids unless written request for approval to bid has been received by the Engineer at least ten (10) calendar days prior to the date for receipt of bids.

If the proposed substitution is approved prior to receipt of bids, such approval will be stated in an addendum. Bidders shall not rely upon approvals made in any other way. Verbal approval will not be given. No substitutions will be considered after the contract is awarded unless specifically provided in the contract documents.

G. SUBMITTALS

Assemble and submit for review shop drawings, material lists, manufacturer product literature for equipment to be furnished, and items requiring coordination between contractors under this contract. Provide submittals in sufficient detail so as to demonstrate compliance with these Contract Documents and the design concept. Prior to transmitting submittal, verify that the equipment submitted is mutually compatible and suitable for the intended use, will fit the available space, and maintain manufacturer recommended service clearances. If the size of equipment furnished makes necessary any change in location or configuration, submit a shop drawing showing the proposed layout.

Transmit submittals as early as required to support the project schedule. Allow for two weeks Engineer review time, plus to/from mailing time via the Architect, plus a duplication of this time for resubmittal if required. Only resubmit those sections requested for resubmittal.

Submittals shall contain the project name, applicable specification section, submittal date, equipment identification acronym as used on the drawings, and the Contractor's stamp. The stamp shall certify that the submittal has been checked by the Contractor, complies with the drawings and specifications, and is coordinated with other trades. Manufacturer product literature shall include shop drawings, product data, performance sheets, samples and other submittals required by this division. Highlight, mark, list, or indicate the materials, performance criteria, and accessories that are being proposed. General product catalog data not specifically noted to be part of the specified product will be rejected and returned without review.

Shop drawings shall meet the requirements of NFPA 13 for working level drawings and shall include the following:

1. Working plans per NFPA 13, including layout drawings of the complete overhead sprinkler system that indicates the relationship of sprinkler piping and sprinklers to all other overhead items, including ceiling grid and tiles, light fixtures, diffusers, registers, grilles, ductwork, structure, soffits, obstructions, etc. Location of risers, piping, etc., shall be as inconspicuous as possible and shall fulfill all functional requirements. System design capabilities and demand shall also be noted on the drawings.

2. Complete details and sections as required to clearly define and clarify the design, including a materials list describing all proposed materials by manufacturer's name and catalog number.

3. Hydraulic calculations.

4. Product data for all fire sprinkler system components. Clearly indicate components to be used where multiple components appear on the same cut sheet.

Where required by the AHJ, Contractor is responsible for obtaining a professional engineer or NICET stamp and signature on their shop drawing submittal. The Engineer is not responsible and will not provide this.

Submittals and shop drawings shall not contain the firm name, logo, seal, or signature of the Engineer. They shall not be copies of the work product of the Engineer. If the Contractor desires to use elements of such product, refer to paragraph "Electronic Drawing Files" for procedures to be used.

Separate submittals according to individual specification sections. Illegible submittals will be rejected and returned without review. Shop drawings shall be produced using Computer Aided Design. Hand drawn documents will not be reviewed or approved. Catalog data shall be properly bound, identified, indexed and tabbed in a 3-ring binder. Each item or model number shall be clearly marked and accessories indicated. Label the catalog data with the equipment identification acronym or number as used on the drawings and include performance curves, capacities, sizes, weights, materials, finishes, wiring diagrams, electrical requirements and deviations from specified equipment or materials. For equipment with motor starters or VFDs, include short circuit current ratings. Mark out inapplicable items. Shop drawings will be returned without review if the above mentioned requirements are not met.

The checking and subsequent approval of such shop drawings by the Engineer shall not relieve the Contractor from responsibility for errors in dimensions, details, size of members, quantities, omissions of components or fittings; coordination of electrical requirements; or for coordinating items with actual building conditions. Proceed with the procurement and installation of equipment only after receiving approved shop drawings relative to each item.

I. RECORD DRAWINGS (AS-BUILT DRAWINGS)

During progress of the work in this division, Contractor shall maintain an accurate record of all changes made during the installation of the system. Upon completion of the work, accurately transfer all record information to three identical sets of the approved shop drawings. Insert one set into each copy of the manual described below.

See Division 01 and General Conditions for additional information.

J. OPERATION AND MAINTENANCE INSTRUCTIONS

During the course of construction, collect and compile a complete brochure of equipment furnished and installed on this project. Include operational and maintenance instructions, manufacturer's catalog sheets, wiring diagrams, parts lists, approved submittals and shop drawings, warranties, and descriptive literature as furnished by the equipment manufacturer. Include an inside cover sheet that lists the project name, date, Owner, Architect, Engineer, General Contractor, Sub-Contractor, and an index of contents.

Submit three copies of literature bound in approved binders with index and tabs separating equipment types to the Architect, for Engineer's review, at the termination of the work. Paper clips, staples, rubber bands, loose-leaf binding, and mailing envelopes are not considered approved binders. Final approval of systems installed under this contract shall be withheld until this equipment brochure is received and deemed complete by the Architect and Engineer. Instruct workmen to save required literature shipped with the equipment itself for inclusion in this brochure.

Literature shall contain the following items:
1. Identification clearly visible on or through the cover, the name of the project, and description "Fire Sprinkler System Manual".

2. Neatly typed index at front with all emergency information clearly identified.

3. Complete list of all system components with manufacturer's names, catalog numbers, and all data for ordering parts.

4. One copy of the record drawings as described above.

5. All information required to secure emergency repairs or service.

6. Test reports and certificates including "Contractor's Material and Test Certificate(s) for Underground Piping" and "Contractor's Material and Test Certificate(s) for Above Ground Piping" as described in NFPA 13.

Refer to Division 01 for acceptance of electronic manuals for this project. For electronic manuals, refer to paragraph "Submittals" for requirements.

K. WARRANTIES

Warrant each system and each element thereof against all defects due to faulty workmanship, design, or material for a period of 12 months from date of Substantial Completion, unless specific items are noted to carry a longer warranty in the construction documents or manufacturer's standard warranty exceeds 12 months. Remedy all defects, occurring within the warranty period(s), as stated in the General Conditions and Division 01.

Warranties shall include labor and material, including travel expenses. Make repairs or replacements without any additional costs to the Owner, and to the satisfaction of the Owner, Architect, and Engineer.

Perform the remedial work promptly, upon written notice from the Engineer or Owner.

At the time of Substantial Completion, deliver to the Owner all warranties, in writing and properly executed, including term limits for warranties extending beyond the one year period, each warranty instrument being addressed to the Owner and stating the commencement date and term.

L. SCOPE

Provide a wet-pipe, automatic fire sprinkler system for the building. Provide a dry-pipe, automatic sprinkler system for the canopy area. Contractor shall be approved and state licensed for design and installation of fire protection systems. The work done under this section shall be performed only by a Contractor whose workmen are experienced and regularly engaged in the installation of fire protection systems. Contractor shall be capable of preparing hydraulic calculations and system layouts.

Provide all fire sprinkler alarm devices including waterflow alarm and valve tamper switches for all system control valves. Provide a notification appliance acceptable to the AHJ on the exterior of the building at 8'-0" above finished grade, adjacent to the fire department connection. Coordinate all wiring and conduit for a complete and functional installation.

System shall, at a minimum, be in accordance with the latest edition of NFPA 13, 24, Underwriters Laboratories (UL), and must be acceptable to the Owner's Insurer, the AHJ, and all applicable local, state and national codes and standards. Where the contract documents exceed the requirements of the referenced codes, standards, etc., the contract documents shall take precedence.

Work shall include, but shall not necessarily be limited to the following:

1. All underground piping (which pertains to the fire sprinkler system) as indicated on the drawings, including all required pipe, valves, etc., as well as the required preparatory and finishing work such as trenching, backfilling, and pavement replacement. Provide thrust blocks, supervised post indicating valve, and valve pit as required or shown on drawings.

2. Connection to city main shall be a wet tap and shall include all required fittings, valves, meter vaults, backflow preventers, backflow preventer vault, etc. Provide backflow prevention equipment as required by local codes.

3. Design and installation of a complete wet-pipe, automatic fire sprinkler system for the area of work shown on the drawings or specified herein.

4. Portions of systems subject to freezing or temperatures below 40 degrees F shall be protected against freezing as required by NFPA 13. The Contractor shall be responsible for repairs and all costs incurred from damage caused by freezing of the fire protection system.

5. Coordinate the connection of all installed fire sprinkler alarm devices.

M. SYSTEM DESIGN

Contractor shall verify design criteria and rating hazards with the Owner's Insurer prior to designing the system. Waterflow and pressure test data shall be acquired before system is calculated and be dated not more than 12 months prior to the submittal of sprinkler shop drawings. Arrangements for and cost of flow tests shall be the responsibility of the Contractor.

Submit hydraulic calculations and plan, including a supply and demand graph; all hydraulic reference points and area of application shall appear on the plan. Contractor shall verify with AHJ any minimum safety factor requirements. Demand shall not be less than 10 percent below the supply at the demand point.

Refer to sprinkler design criteria legend on sheet FS001 for sprinkler design criteria.

The Contractor shall be fully responsible for the hydraulic calculations, the final system design, and the layout of all components of the system as required for approval by the Owner's Insurer and the AHJ.

The Contractor shall be fully responsible for coordinating system layout with other contractors. Changes to system design due to lack of coordination shall be paid for by the Contractor.

Designs requiring cutting of structural members for passage of sprinkler pipes or hangers shall not be accepted. When design appearance or similar aspects require cutting due to economy, it shall be held to an absolute minimum and done only with the Architect and Structural Engineer's written approval. Any excessive requirements of this type shall be identified during the bid period.

Sprinkler spacing shall conform to NFPA 13. Extended coverage sprinklers shall not be used in unfinished (shell) spaces.

The hydraulic area of operation shall be increased by 30% without revising the density for areas with sloped ceilings with a pitch exceeding 1 in 6 (16.7% slope) in accordance with NFPA 13.

The hydraulic area of operation shall be increased by 30% without revising the density for dry-pipe systems in accordance with NFPA 13.

The hydraulic area of operation may not be reduced as allowed by NFPA 13 for areas utilizing quick response sprinklers in unfinished shell spaces. For all other areas, the hydraulic area of operation shall not be reduced as allowed by NFPA 13 for areas utilizing quick response sprinklers unless specifically approved by the Engineer via a formally submitted RFI.

2. MATERIALS AND INSTALLATION

A. PRODUCTS

All fire protection system components shall be Underwriter's Laboratories listed for their intended use.

B. PIPING AND COMPONENTS

Underground piping shall be cement lined ductile iron or other approved or listed material, installed in accordance with NFPA; fire main shall include all required fittings and valves.

Sprinkler piping 2-1/2" and larger shall be Schedule 10 or Schedule 40 black steel. Threaded sprinkler piping 2" and smaller shall be Schedule 40 black steel. Roll-grooved sprinkler piping 2" and smaller shall be Schedule 10 or Schedule 40 black steel. Pipes shall have welded, threaded, or mechanically joined fittings, based on the pipe material and size per NFPA 13 requirements.

Acceptable alternatives to Schedule 10 and Schedule 40 pipe shall be manufactured to standards recognized by NFPA 13. Pipe shall have a corrosion resistance rating of 1.0 or greater. Crimp-type couplings are not permitted. Threadable thinwall pipe with corrosion resistance rating less than 1.0 is not permitted.

C. SPRINKLERS

Sprinklers in areas with gypsum board ceilings shall be:
1. Chrome–plated, recessed type with chrome-plated escutcheons.

Sprinklers in areas with suspended acoustical ceilings shall be:
1. Chrome–plated, recessed type with chrome-plated escutcheons.

Sprinklers in areas with exposed piping may be pendent or upright types with rough brass finish.

Provide quick response sprinklers in all light hazard areas.

Coordinate sprinkler temperature rating near heat-producing sources in accordance with NFPA 13.

D. SERVICE ENTRANCE

Locate fire protection service entrance where indicated on the drawings. Equip the service with a UL listed backflow preventer assembly as required by the AHJ. Service entrance assembly shall include approved outside screw and yoke (OS&Y) valves with tamper switches.

Equip sprinkler system riser with an approved indicating control valve with tamper switch, waterflow alarm switch, notification appliance, check valve, system drain terminating outdoors, gauges, and fire department connection with check valve. Each riser shall meet NFPA 13 standards and requirements for acceptable valve arrangements. Separate control valve and check valve may be omitted if backflow preventer is located at the service entrance and building is protected with a single riser.

Provide a printed sheet giving brief instructions regarding control, emergency procedure and other data as required by NFPA next to the sprinkler riser. Protect sheet with glass or a transparent plastic cover. Permanently attach a placard indicating the location and basis of design (discharge density and system demand) to the riser for hydraulically designed systems.

Provide all control valve supervisory switches, waterflow alarm switches, and sprinkler system equipment panels requiring interconnection to the fire alarm system. Provide a line seizure type automatic dialer (Ademco or equal) and related telephone wiring for remote monitoring of fire sprinkler alarm devices and operation of the notification appliance.

COORDINATE FDC TYPE WITH AHJ.

Provide rough brass Siamese fire department connection with two individual type drop clapper valves and drain, located on building wall where indicated on drawings. Fire department connection shall be complete with pin lug type brass hose inlet caps with chains. Hose threads shall be compatible with local fire department specifications. Provide check valve sized per NFPA 13 with 3/4" ball drip drain piped to the exterior of the building. Fire department connection shall be permanently labeled "AUTOMATIC SPRINKLER FIRE DEPARTMENT CONNECTION".

Provide Storz fire department connection, UL listed, 4", 5" or 6" with rough brass connection and drain, located where indicated on Drawings. Fire department connection shall be complete with 30 degree elbow and hose inlet cap with chain. Provide check valve sized per NFPA 13 with 3/4 inch ball drip drain piped to the exterior of the building. Fire department connection shall be permanently labeled "AUTOMATIC SPRINKLER FIRE DEPARTMENT CONNECTION".

Provide a cabinet containing spare sprinklers and appropriate wrench(es) per NFPA 13 at the fire sprinkler system service entrance area.

3. EXECUTION

A. PIPING AND FINISHES

Excavation, trenching and backfilling shall be in accordance with requirements of the excavation and backfill section of the plumbing specifications.

Conceal piping in areas having ceilings, other than the underside of the roof deck. Piping in areas without ceilings may be exposed but kept at a minimum distance from the deck. All piping shall be clean and free of rust. Install system such that all piping is rigidly secured and supported. All ductwork, lights, structural members and main runs of piping shall take precedence over sprinkler piping. Cutting of structural members for passage of sprinkler pipes or hangers shall not be permitted. All horizontal piping in ceiling space shall be at an elevation above the top of light fixtures and air outlets to allow for access to light fixtures and air outlets without removing horizontal piping. Route all sprinkler piping and provide all offsets, bends, and elbows around all mechanical, electrical, and structural members as required.

Where exposed piping passes through finish work, install chrome plated (or other finish acceptable to the architect) split wall plates or escutcheons to fit snugly around the piping. Provide at each penetration to assure effectiveness of construction as a fire stop where piping is concealed or installed in unfinished areas.

All openings for piping shall be anticipated and indicated on the approved shop drawings. Any additional cutting of openings must have the written approval of the Architect.

Route piping parallel to major building lines.

Coordinate pipe routing near electrical equipment in accordance with NFPA 70.

Do not connect more than one sprinkler to a one inch outlet unless hydraulic calculations are included to verify performance.

Installation shall allow for suitable drainage of system to meet with the approval of the AHJ. Provide access panels as required. All drain locations requiring access panels shall be approved by the Architect prior to installation.

Sprinklers in suspended ceilings shall be not less than 6-inches from the grid in all directions.

A. PENETRATIONS

Seal all fire protection floor, wall and roof penetrations watertight and weathertight. Caulk around fire protection penetrations with 3M CP-25, or approved equal fire barrier caulk (thickness as required and recommended by manufacturer) to maintain fire resistance rating of fire-rated assemblies.

B. TESTING AND ACCEPTANCE

Complete the automatic fire sprinkler system, as soon as possible, when building construction allows. Following system installation, Place the system in service. After the system has been placed in service for continuous use, water charges, if any, will be paid by Owner.

Upon completion of the systems installation, and prior to acceptance by the Engineer and Owner, the Contractor shall make general operating tests to demonstrate that all equipment and systems are in proper working order, and are functioning in conformance with the intent of the drawings and specifications.

Prior to connecting to the overhead sprinkler piping, the underground main shall be thoroughly flushed and tested in accordance with NFPA 24. Secure all required approvals and written documentation of the flushing operation. Test above ground piping in accordance with NFPA 13. Hydrostatically test all sprinkler piping at a minimum pressure of 200 psi for a minimum 2-hour period of time. Correct any faulty or leaking joints and pipe. The use of any substance or material added to the water to correct leaks shall not be permitted. Caulking of defective joints, cracks or holes shall not be permitted. Repeat tests after defects have been eliminated. Perform all tests in the presence of the AHJ and/or the Owner's authorized representative.

Upon completion of each phase of the installation, test each system in conformance with local code requirements. Furnish all labor and equipment required to properly test all sprinkler equipment installed under this contract. Assume all costs involved in making the tests and repair and/or replace all damage resulting therefrom.

Notify the Architect and the AHJ three (3) working days prior to making sprinkler system tests. Concealed work shall remain uncovered until the required tests are complete. Portions of the work may be concealed if approved by the AHJ or if necessary due to construction procedure.

C. INSTRUCTIONS

After completion of all installation, tests, etc., and prior to the final acceptance date, instruct the building Owner and his selected personnel in the operation of the sprinkler system. Include in the training the procedure to conduct quarterly main drain tests as required by NFPA 25. Special care shall be taken to make sure the building personnel will immediately recognize whether the main valve is in an open position, know how to drain the system, and know how to test the system. The building personnel shall also be made familiar with the existence and contents of the System Manual described in the Operation and Maintenance section of this specification.

END OF SECTION 21

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DARWIN W. HODGE JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FIRE PROTECTION SPECIFICATIONS

FP0.01

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

FIRE PROTECTION DESIGN CRITERIA BASED ON 2013/2016 NFPA 13

OCCUPANCY CLASSIFICATION	DENSITY	MAXIMUM SPRINKLER SPACING (SQ. FT.)	TOTAL HOSE DEMAND (GPM)	DURATION (MINUTES)	DESIGN BASIS
RESTROOMS / OFFICES / BREAKROOM / MOTHERS ROOM	0.10/1500 SQ. FT.	225	100	30	LIGHT HAZARD; 13:11.2.3.1.1 AND TABLE 11.2.3.1.2
ELECTRICAL / MECHANICAL / BUILDING SUPPORT ROOMS	0.15/1500 SQ. FT.	130	250	60	ORDINARY HAZARD GROUP 1; 13:11.2.3.1.1 AND TABLE 11.2.3.1.2
WAREHOUSE	12 25.2K ESFR @ 25PSI	100	250	60	CARTONED AND ENCAPSULATED UNEXPANDED GROUP A PLASTICS ON RACKS; 8 FT MAXIMUM STORAGE HEIGHT; 28 FT MAXIMUM CEILING HEIGHT. OWNER ELECTED PROTECTION SCHEME; UL PROJECT 4790050452; FILE NC32504 CARTONED RETAIL PRODUCTS SORTED INTO FLEXIBLE AND RIGID NYLON BAGS ON RACKS. FILLED BAGS ARE LOADED ON VANS FOR DELIVERY.
LOADING CANOPY	0.20/1500 SQ. FT.	130	250	60	ORDINARY HAZARD GROUP 2; 13:11.2.3.1.1 AND TABLE 11.2.3.1.2

WAREHOUSE INTERIOR HOSE CONNECTIONS:

(WHERE REQUIRED BY THE AHJ)

1. SMALL HOSE CONNECTIONS SHALL BE PROVIDED THROUGHOUT THE FACILITY IN ACCORDANCE WITH THE LOCAL REQUIREMENTS, NFPA 13, AND THESE DRAWINGS FOR FIRST-AID FIREFIGHTING AND OVERHAUL OPERATIONS.
2. EACH INTERIOR FIRE HOSE CONNECTION (NFPA 13) SHALL CONSIST OF A 2-1/2 IN. HOSE VALVE WITH INTEGRAL PRESSURE REGULATING DEVICE TO LIMIT RESIDUAL PRESSURE TO 100 PSI, [A 1-1/2 IN. REDUCER], AND A CAP AND CHAIN, WITHOUT HOSE. [SUPPLY PIPE FOR EACH CONNECTION SHALL BE SIZED BY HYDRAULIC CALCULATIONS PER THE FOLLOWING DESIGN CRITERIA: EACH HOSE CONNECTION SHALL BE CAPABLE OF PRODUCING 250 GPM AT A MINIMUM RESIDUAL PRESSURE OF 100 PSI.]
3. INTERIOR FIRE HOSE CONNECTIONS SHALL BE PROVIDED AT THE FOLLOWING LOCATIONS:
   - 3.1. AT EACH FIRE DEPARTMENT ACCESS MAN DOOR ON GROUND LEVEL.
   - 3.2. AT OTHER LOCATIONS WHEN REQUIRED BY AHJ.
4. INTERIOR FIRE HOSE CONNECTIONS SHALL BE SUPPLIED FROM AN ADJACENT SPRINKLER SYSTEM MAIN AND NOT A BRANCH LINE. SUPPLY PIPE SHALL NOT BE LESS THAN NOMINAL 4 IN. DIAMETER UNLESS IT SERVES A SINGLE CONNECTION. ALL PIPING INSTALLATION SHALL BE IN ACCORDANCE WITH NFPA 13.

ESFR SPRINKLER NOTES:

1. THE SPRINKLER CONTRACTOR SHALL BE RESPONSIBLE FOR PROPER CONSIDERATION AND COORDINATION OF ALL OBSTRUCTIONS AND OTHER INSTALLED EQUIPMENT WHICH MAY HAVE AN IMPACT ON THE OPERATION OF ESFR SPRINKLERS.
2. PRIOR TO THE START OF CONSTRUCTION, THE SPRINKLER CONTRACTOR SHALL CLOSELY COORDINATE WITH ALL OTHER TRADES - INCLUDING, BUT NOT LIMITED TO, STRUCTURAL STEEL, MECHANICAL, ELECTRICAL, PLUMBING, DATA PROCESSING, AND MATERIAL HANDLING - TO ENSURE THE WATER DISCHARGE FROM ESFR SPRINKLERS WILL NOT BE OBSTRUCTED FROM REACHING BURNING COMMODITIES AT HIGH VOLUME AND HIGH MOMENTUM.
3. THE STANDARD TO BE UTILIZED IN IDENTIFYING ESFR SPRINKLER PLACEMENT AND OBSTRUCTION ISSUES SHALL BE THE LATEST VERSION OF FM GLOBAL PROPERTY LOSS PREVENTION DATA SHEET 2-0 ("FMDS 2-0"). ANY OBSTRUCTION ISSUE IDENTIFIED DURING THE COURSE OF CONSTRUCTION OR ACCEPTANCE INSPECTIONS SHALL BE CORRECTED TO MEET THE REQUIREMENTS OF THIS STANDARD AT NO ADDITIONAL COST TO THE CONTRACT.
4. THE FOLLOWING ARE THE MOST COMMON RULES FOUND IN THE STANDARD FOR HANDLING OBSTRUCTIONS LOCATED ENTIRELY BELOW THE SPRINKLERS. COMPLIANCE WITH THESE RULES IN NO WAY RELIEVES THE CONTRACTOR FROM FULL COMPLIANCE WITH THE STANDARD.
   - 4.1. INDIVIDUAL OBSTRUCTIONS MEASURING 3/4-IN. WIDE OR LESS AND AT LEAST 4 IN. BELOW THE SPRINKLER DEFLECTOR OR LOCATED AT LEAST 12 IN. HORIZONTALLY FROM THE CENTERLINE OF THE SPRINKLER MAY BE IGNORED.
   - 4.2. CONTINUOUS OBSTRUCTIONS WIDER THAN 3/4 IN. AND NO WIDER THAN 1-1/4 IN. SHALL BE LOCATED AT LEAST 12 IN. HORIZONTALLY FROM THE CENTERLINE OF THE SPRINKLER OR AT LEAST 16 IN. VERTICALLY BELOW THE SPRINKLER DEFLECTOR.
   - 4.3. CONTINUOUS OBSTRUCTIONS WIDER THAN 1-1/4 IN. AND NO WIDER THAN 2 IN. SHALL BE LOCATED AT LEAST 12 IN. HORIZONTALLY FROM THE CENTERLINE OF THE SPRINKLER OR AT LEAST 24 IN. VERTICALLY BELOW THE SPRINKLER DEFLECTOR.
   - 4.4. CONTINUOUS OR ISOLATED OBSTRUCTIONS WIDER THAN 2 IN. AND NO WIDER THAN 12 IN. SHALL BE LOCATED AT LEAST 12 IN. HORIZONTALLY FROM THE CENTERLINE OF THE SPRINKLER.
   - 4.5. CONTINUOUS OR ISOLATED OBSTRUCTIONS WIDER THAN 12 IN. AND NO WIDER THAN 24 IN. SHALL BE LOCATED AT LEAST 24 IN. HORIZONTALLY FROM THE CENTERLINE OF THE SPRINKLER.
   - 4.6. OBSTRUCTIONS GREATER THAN 24 IN. WIDE SHALL BE POSITIONED IN ACCORDANCE WITH NFPA 13, OTHERWISE ADDITIONAL SPRINKLERS SHALL BE INSTALLED UNDERNEATH THE OBSTRUCTION.
5. VERTICAL DUCT WORK SUPPLYING UNIT HEATERS SHALL BE CENTERED BETWEEN ESFR SPRINKLERS.
6. THE CONTRACTOR SHALL SPACE ESFR SPRINKLERS WITH CONSIDERATION OF THE LOCATION OF ALL SKYLIGHTS SO THAT AN ESFR SPRINKLER IS NOT LOCATED DIRECTLY UNDERNEATH A SKYLIGHT. REFER TO ARCHITECTURAL DRAWINGS FOR THE LOCATIONS OF SKYLIGHTS. INDICATE COORDINATION ON THE SHOP DRAWINGS.
7. DIRECTLY UNDERNEATH A SKYLIGHT. REFER TO ARCHITECTURAL DRAWINGS FOR THE LOCATIONS OF SKYLIGHTS. INDICATE COORDINATION ON THE SHOP DRAWINGS.
8. ESFR SPRINKLER LOCATIONS SHALL BE COORDINATED WITH THE LIGHTING FIXTURE LOCATIONS, IN ORDER TO AVOID POTENTIAL OBSTRUCTION ISSUES. INDICATE COORDINATION ON THE SHOP DRAWINGS.
9. COORDINATE THE LOCATION OF ALL HIGH VOLUME LOW SPEED (HVLS) CEILING FANS SUCH THAT THE FAN HUB IS INSTALLED CENTERED BETWEEN FOUR ESFR SPRINKLERS AND THAT THE TOP OF THE FAN BLADES (AIRFOILS) ARE A MINIMUM OF 36 IN. BELOW THE SPRINKLER DEFLECTOR. INDICATE COORDINATION ON THE SHOP DRAWINGS.
10. SPRINKLERS SHALL NOT BE REQUIRED BELOW CONVEYORS (SINGLE OR MULTI-STACK THAT ARE VERTICALLY ALIGNED) T HAT ARE 24 IN. WIDE OR LESS, ARE OVER PERSONNEL WALKWAYS, AND/OR WOULD NOT ALLOW FOR COMBUSTIBLE STORAGE UNDERNEATH (E.G., ADMINISTRATIVE CONTROLS IN PLACE TO PREVENT STORAGE)

FIRE SPRINKLER GENERAL NOTES:

1. PRIOR TO SUBMITTING BID, VISIT THE JOB SITE AND BECOME FULLY ACQUAINTED WITH THE EXISTING CONDITIONS OF THE PROJECT. REVIEW THE GENERAL NOTES, SPECIFICATIONS AND OTHER DRAWINGS FOR ADDITIONAL REQUIREMENTS WHICH MAY NOT BE SPECIFICALLY CALLED OUT IN THIS PORTION OF THE CONSTRUCTION DOCUMENTS. NOTIFY ARCHITECT, ENGINEER AND/OR OWNER OF CONFLICTS OR DISCREPANCIES PRIOR TO SUBMISSION OF BID.
2. SYSTEM DESIGN, INSTALLATION AND MATERIALS SHALL BE IN ACCORDANCE WITH APPLICABLE NFPA STANDARDS. SYSTEM SHALL ALSO COMPLY WITH ALL APPLICABLE BUILDING CODES, FIRE CODES AND THE REQUIREMENTS OF THE AUTHORITY HAVING JURISDICTION AND INSURANCE CARRIER. VERIFY REQUIREMENTS PRIOR TO BID SUBMITTAL.
3. INFORMATION ON CONTRACT DOCUMENTS IS GENERAL INFORMATION AND FOR BID PURPOSES ONLY. CONTRACTOR SHALL BE FULLY RESPONSIBLE FOR THE FINAL SYSTEM DESIGN AND LAYOUT OF ALL COMPONENTS, COORDINATION WITH ALL OTHER TRADES, AND SYSTEM CALCULATIONS REQUIRED FOR APPROVAL BY THE AUTHORITY HAVING JURISDICTION, ENGINEER, AND OWNER'S INSURER.
4. THE CONTRACTOR SHALL FOLLOW THE ENGINEER OF RECORD'S SYSTEM DESIGN AND LAYOUT OF ALL COMPONENTS EXCEPT WHERE MODIFICATION TO THE DESIGN IS NECESSARY. MODIFICATIONS SHALL BE REFLECTED IN THE CONTRACTOR'S SHOP DRAWINGS AND CALCULATIONS.
5. DEVIATIONS FROM ENGINEER'S DESIGN WILL NOT BE CONSIDERED UNLESS A FORMALLY SUBMITTED RFI IS RECEIVED AND APPROVED.
6. THE CONTRACTOR SHALL PROVIDE ALL EQUIPMENT AND LABOR REQUIRED FOR A COMPLETE AND OPERATIONAL SYSTEM AS INDICATED IN THE DRAWINGS AND SPECIFICATIONS.
7. WHERE EXISTING SYSTEMS ARE PRESENT, CONTRACTOR SHALL MODIFY, RELOCATE AND/OR PROVIDE ADDITIONAL EQUIPMENT AS REQUIRED FOR SCOPE OF WORK AS REQUIRED FOR A COMPLETE AND OPERATIONAL SYSTEM. COORDINATE WITH WALLS, CEILINGS, LIGHTS, DIFFUSERS, STRUCTURE, OBSTRUCTIONS, ETC. IN AREAS AFFECTED BY SCOPE OF WORK. NEW EQUIPMENT SHALL BE COMPATIBLE WITH EXISTING SYSTEMS. CONTRACTOR SHALL REMOVE ALL ABANDONED EQUIPMENT, COORDINATE SYSTEM MODIFICATIONS TO MINIMIZE SYSTEM IMPAIRMENT, AND PROVIDE FIRE WATCH AND/OR INTERIM FIRE PROTECTION MEASURES WHERE REQUIRED BY THE AUTHORITY HAVING JURISDICTION, INSURANCE CARRIER OR OWNER.
8. PROVIDE ADDITIONAL MATERIALS AND LABOR REQUIRED DUE TO LACK OF COORDINATION OR TO MEET AUTHORITY HAVING JURISDICTION AND INSURANCE CARRIER REQUIREMENTS AT NO ADDITIONAL COST TO THE OWNER.
9. FORWARD COMPLETED CERTIFICATE OF COMPLETION AND CONTRACTOR MATERIAL TEST CERTIFICATES TO THE OWNER.
10. REFER TO SPECIFICATIONS FOR ADDITIONAL INFORMATION.

WATER SUPPLY INFORMATION:

OBTAINED FROM:

LOCATION:

DATE:

STATIC PRESSURE:

RESIDUAL PRESSURE:

WATER FLOW:

FIRE SPRINKLER SYMBOLS

THIS IS A MASTER LEGEND AND NOT ALL SYMBOLS OR ABBREVIATIONS ARE USED.

ABBREVIATIONS V2.02

AFF	ABOVE FINISHED FLOOR	NIC	NOT IN CONTRACT
AFG	ABOVE FINISHED GRADE	OC	ON CENTER
CD	CANDELA	PIV	POST INDICATOR VALVE
DI	DUCTILE IRON	PROVIDE	FURNISH AND INSTALL
ESFR	EARLY SUPPRESSION FAST RESPONSE	PRV	PRESSURE REDUCING VALVE
ETR	EXISTING TO REMAIN	RD	RETURN DUCT
FHC	FIRE HOSE CABINET	REV	REVISION
FP	FIRE PROTECTION	SD	SUPPLY DUCT
GC	CONTRACTOR	SF	SQUARE FEET
GPM	GALLONS PER MINUTE	TYP	TYPICAL
JBU-BOX	JUNCTION BOX	UNO	UNLESS NOTES OTHERWISE
MAX	MAXIMUM	V	VOLT(S)
MIN	MINIMUM	W	WATTS
N/A	NOT APPLICABLE	WP	WEATHERPROOF

ANNOTATION

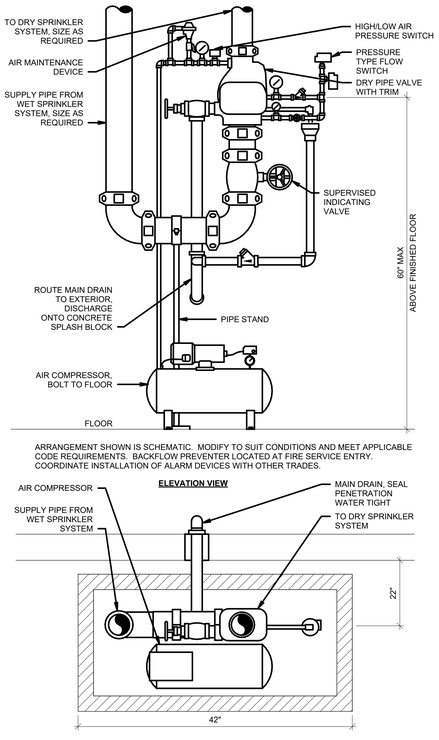
- (1) FIRE SPRINKLER PLAN NOTE CALLOUT
- CONNECTION POINT OF NEW WORK TO EXISTING
- (1 / F1) DETAIL REFERENCE UPPER NUMBER INDICATES DETAIL NUMBER LOWER NUMBER INDICATES SHEET NUMBER
- (1 / F1) SECTION CUT DESIGNATION

FIRE SPRINKLERS

- UPRIGHT SPRINKLER
- PENDENT SPRINKLER
- CONCEALED SPRINKLER
- DRY PENDENT SPRINKLER
- DRY SIDEWALL SPRINKLER
- SIDEWALL SPRINKLER

FIRE SPRINKLER PIPING

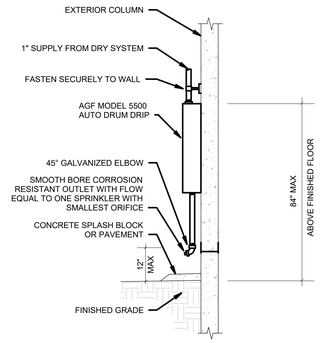
- FP — FIRE PROTECTION (FP)
- SHUTOFF VALVE
- CHECK VALVE
- BACKFLOW PREVENTER
- CAP
- ELBOW UP
- ELBOW DOWN
- TEE UP
- TEE DOWN
- FIRE DEPARTMENT CONNECTION
- FIRE PUMP TEST HEADER
- INSPECTOR'S TEST CONNECTION / AUXILIARY DRAIN
- SPRINKLER RISER
- TOP BEAM CLAMP



ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS. BACKFLOW PREVENTER LOCATED AT FIRE SERVICE ENTRY. COORDINATE INSTALLATION OF ALARM DEVICES WITH OTHER TRADES.

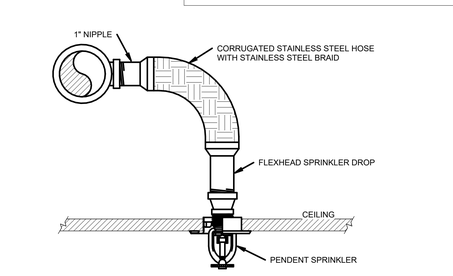
CROSS HATCHED AREA IS THE MAXIMUM ALLOWABLE AREA TO BE USED FOR SPRINKLER SYSTEM RISER. INSTALLATION MUST ALLOW FOR ALL REQUIRED MAINTENANCE ACCESS WITHIN CROSS HATCHED AREA.

(7) FIRE PROTECTION RISER - DRY PIPE
NTS



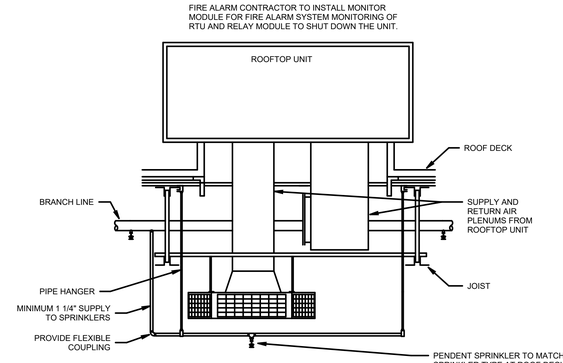
ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS. OBTAIN ARCHITECT'S APPROVAL FOR FINAL LOCATION. EXTERIOR PIPING AND FITTINGS SHALL BE GALVANIZED.

(6) AUTOMATIC DRUM DRIP - DRY-PIPE SYSTEM
NTS



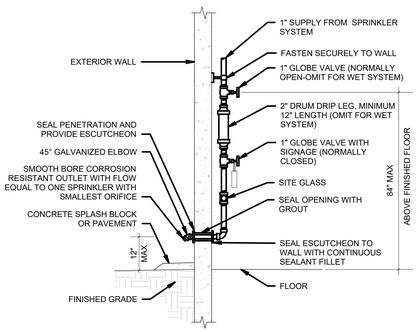
ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS.

(5) PENDENT SPRINKLER WITH FLEXIBLE PIPING
NTS



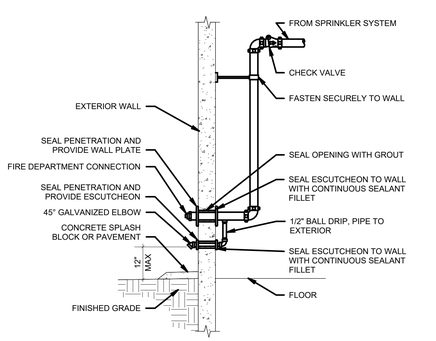
ROOF PENETRATIONS OF RTU SHALL BE COORDINATED WITH SPRINKLER LAYOUT; PENETRATIONS SHALL BE CENTERED BETWEEN FOUR (4) ADJACENT SPRINKLERS.

(4) ROOFTOP UNIT (RTU)
NTS



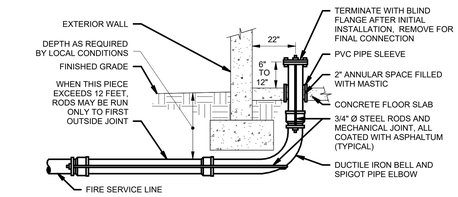
ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS. OBTAIN ARCHITECT'S APPROVAL FOR FINAL LOCATION. EXTERIOR PIPING AND FITTINGS SHALL BE GALVANIZED.

(3) INSPECTORS TEST / AUXILIARY DRAIN
NTS



ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS. EXTERIOR PIPING AND FITTINGS SHALL BE GALVANIZED. REFER TO DRAWINGS FOR APPROVED LOCATIONS.

(2) FIRE DEPARTMENT CONNECTION
NTS



ARRANGEMENT SHOWN IS SCHEMATIC. MODIFY TO SUIT FIELD CONDITIONS AND MEET APPLICABLE CODE REQUIREMENTS. VERIFY FOUNDATION WITH ARCHITECTURAL DRAWINGS. COORDINATE WHO IS TO PROVIDE THE FIRE SERVICE ENTRY WITH THE GENERAL CONTRACTOR OR CONSTRUCTION MANAGER PRIOR TO SUBMITTING BID.

(1) FIRE SERVICE ENTRY
NTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:

FIRE SPRINKLER GENERAL NOTES AND LEGEND

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

FP0.02

GENERAL SYMBOLS LEGEND

- REVISION NUMBER - SHOWN ON PLANS
- POINT WHERE NEW CONNECTS TO EXISTING
- NUMBER OF DETAIL ON SHEET / NUMBER OF SHEET WHERE DETAIL APPEARS
- KEYNOTE
- CONTINUATION SYMBOL
- Room / # — ROOM NAME AND NUMBER
- ITEM TO BE DEMOLISHED
- AREA NOT IN CONTRACT
- "Z" — PIPE SIZE TAG (DIAMETER)
- ABOVE GROUND PIPING
- 1/8" / 12" SLOPE — PIPE SLOPE TAG
- BELOW GROUND PIPING
- INVERT: -105' - 1" — PIPE INVERT ELEVATION TAG
- (E) — EXISTING PIPE TAG
- PIPING BEING DEMOLISHED

ABBREVIATIONS

Ø	ROUND	LVR	LOUVER
ABV	ABOVE	LWT	LEAVING WATER TEMPERATURE
AC	AIR CONDITIONING	M/A	MIXED AIR
AD	AREA DRAIN	MAX	MAXIMUM
ADD	ADDENDUM	MBH	ONE THOUSAND BTU PER HOUR
AFF	ABOVE FINISHED FLOOR	MCF	ONE THOUSAND CUBIC FEET
AFUE	ANNUAL FUEL UTILIZATION EFFICIENCY	MD	MOTORIZED DAMPER
ALT	ALTERNATE	MECH	MECHANICAL
AP	ACCESS PANEL	MFR	MANUFACTURER
ARCH	ARCHITECT/ARCHITECTURAL	MIN	MINIMUM
BFF	BELOW FINISHED FLOOR	MISC	MISCELLANEOUS
BLW	BELOW	MTR	MOTOR
BTU	BRITISH THERMAL UNITS	MU/A	MAKE-UP/AIR
BTUH	BRITISH THERMAL UNITS PER HOUR	NC	NOISE CRITERIA
CAP	CAPACITY	NC	NORMALLY CLOSED
CB	CATCH BASIN	NIC	NOT IN CONTRACT
CFM	CUBIC FEET PER MINUTE	NO	NUMBER
CLG	CEILING	NO	NORMALLY OPEN
CO	CLEAN OUT	NTS	NOT TO SCALE
CW	COLD WATER	O	OXYGEN
D	DEGREE	O/A	OUTSIDE AIR
DB	DRY BULB	ORD	OVERFLOW ROOF DRAIN
DIA	DIAMETER	PD	PRESSURE DROP
DN	DOWN	PIV	POST INDICATOR VALVE
DW	DISTILLED WATER	PLBG	PLUMBING
EA	EACH	PRESS	PRESSURE
EAT	ENTERING AIR TEMPERATURE	PRV	PRESSURE REDUCING VALVE
ELEC	ELECTRICAL	PSI	POUNDS PER SQUARE INCH
EQUIP	EQUIPMENT	PSIG	POUNDS PER SQUARE INCH GAUGE
EWC	ELECTRIC WATER COOLER	PWR	POWER
EWT	ENTERING WATER TEMPERATURE	R	DUCT RISER
E/A	EXHAUST AIR	R/A	RETURN AIR
EXIST	EXISTING	RCP	RADIANT CEILING PANEL
F	DEGREES FAHRENHEIT	RD	ROOF DRAIN
FCO	FLOOR CLEAN OUT	REC	RECESSED
FD	FLOOR DRAIN	RED	REDUCER
FDC	FIRE DEPARTMENT CONNECTION	RH	RELATIVE HUMIDITY
FL	FLOOR	RL/A	RELIEF AIR
FO	FUEL OIL	RM	ROOM
FOV	FUEL OIL VENT	RPM	REVOLUTIONS PER MINUTE
FOR	FUEL OIL RETURN	RW	RAIN WATER
FOS	FUEL OIL SUPPLY	SF	SQUARE FOOT
FPM	FEET PER MINUTE	S/A	SUPPLY AIR
FS	FLOOR SINK	SAN	SANITARY
FT	FOOT/FEET	SF	SQUARE FOOT
FTR	FIN TUBE RADIATION	SD	SMOKE DAMPER
GAL	GALLON	SM	SURFACE MOUNT
GF	GAS-FIRED	SP	STAND/PIPE
GC	GENERAL CONTRACTOR	SP	STATIC PRESSURE
GPM	GALLONS PER MINUTE	STM	STEAM
GW	GREASE WASTE	T	THERMOSTAT
HB	HOSE BIB	TD	TEMPERATURE DROP
HP	HORSE POWER	TDR	TRENCH DRAIN
HTG	HEATING	TEMP	TEMPERATURE
HTR	HEATER	TYP	TYPICAL
HW	HOT WATER	UG	UNDERGROUND
HYD	HYDRANT	VAC	VACUUM
ID	INDIRECT	V	VENT
IN	INCH	VAV	VARIABLE AIR VOLUME
INV	INVERT	VENT	VENTILATION
LB	POUND	VTR	VENT THROUGH ROOF
LB/HR	POUNDS PER HOUR	W	WASTE
LAT	LEAVING AIR TEMPERATURE	WB	WET BULB
LP	LOW PRESSURE	WCO	WALL CLEAN OUT
LPG	LIQUEFIED PETROLEUM GAS	WH	WALL HYDRANT

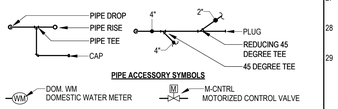
EQUIPMENT ABBREVIATIONS

AC	AIR CONDITIONING UNIT	FCU	FAN COIL UNIT
ACCU	AIR COOLING CONDENSING UNIT	FP	FIRE PUMP
AHU	AIR HANDLING UNIT	GI	GREASE INTERCEPTOR
AS	AIR SEPARATOR	GWH	GAS WATER HEATER
B	BOILER	HWP	HEATING WATER PUMP
CH	CHILLER	HRU	HEAT RECOVERY UNIT
CT	COOLING TOWER	JS	JANITOR SINK
CUH	CABINET UNIT HEATER	OB	OUTLET BOX
CHWP	CHILLED WATER PUMP	PRV	POWER ROOF VENTILATOR
CP	CIRCULATION PUMP	RE	RETURN/EXHAUST FAN
DBP	DOMESTIC WATER BOOSTER PUMP	RTU	ROOFTOP UNIT
DC	DUCT MOUNTED COIL	SP	SUMP PUMP
DCP	DOMESTIC WATER CIRCULATING PUMP	UH	UNIT HEATER
ET	EXPANSION TANK	WH	WATER HEATER
EWH	ELECTRIC WATER HEATER		

* NOTE *
ALL OF GENERAL NOTES ON THIS SHEET ARE TO BE APPLIED TO ALL OTHER DRAWINGS IN THIS SET.THE SYMBOLS AND ABBREVIATIONS SHOWN ON THIS SHEET MAY OR MAY NOT BE USED IN THIS SET OF DRAWINGS.

PLUMBING AND PIPING SYMBOLS LEGEND

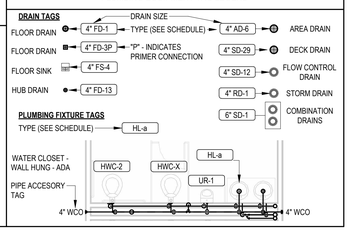
- CHWR — CHILLED WATER RETURN
- CHWS — CHILLED WATER SUPPLY
- CD — CONDENSATE DRAINAGE
- CWR — CONDENSER WATER RETURN
- CWS — CONDENSER WATER SUPPLY
- GWR — GEOTHERMAL WATER RETURN
- GWS — GEOTHERMAL WATER SUPPLY
- HWR — HEATING WATER RETURN
- HWS — HEATING WATER SUPPLY
- G — NATURAL GAS
- PG — PROPANE GAS
- REF-L — REFRIGERANT-LIQUID
- REF-S — REFRIGERANT-SUCTION
- REF-HG — REFRIGERANT-HOT GAS
- STM — STEAM
- CDR — CONDENSATE RETURN
- CWV — COMBINATION WASTE & VENT
- CA — COMPRESSED AIR
- CW — DOMESTIC COLD WATER
- H-CW — HARD COLD WATER
- S-CW — SOFT COLD WATER
- F-CW — FILTERED COLD WATER
- RO — REVERSE OSMOSIS WATER
- HW — HOT WATER
- HW-140° — HOT WATER 140°
- HW-R — HOT WATER RECIRCULATION
- HW-R-140°- — HOT WATER RECIRCULATION 140°
- GV — GREASE VENT
- GW — GREASE WASTE
- IW — INDIRECT WASTE
- OV — OIL VENT
- OW — OIL WASTE
- PD — PUMP DISCHARGE
- V — SANITARY VENT
- SS — SANITARY SEWER
- SHWR — SOLAR HOT WATER RETURN
- SHWS — SOLAR HOT WATER SUPPLY
- SD — STORM DRAINAGE
- OSD — OVERFLOW STORM DRAINAGE
- LAB-G — LABORATORY GAS
- MED — MED GAS
- NIT — NITROGEN
- VAC — VACUUM
- WAGD — WASTE ANESTHETIC GAS DISPOSAL
- N2O — NITROUS OXIDE
- H2O2 — HYDROGEN PEROXIDE
- O2 — OXYGEN
- DI — DE-IONIZED WATER



PIPE ACCESSORY SYMBOLS

- WM — DOM. WM: DOMESTIC WATER METER
- BALANCING BALANCING VALVE
- SHUTOFF 1/4 TURN BALL VALVE
- CHECK CHECK VALVE
- TMV 3-WAY MIXING VALVE
- GATE VALVE
- 3-WAY AIRMOTOR CONTROLLER
- ANGLE GLOBE VALVE
- GATE VALVE
- DIAPHRAGM VALVE
- GLOBE VALVE
- HOSE GLOBE VALVE
- M — M-CNTRL: MOTORIZED CONTROL VALVE
- M — 3-WAY CNTRL: 3 WAY MOTORIZED CONTROL VALVE
- PRV PRESSURE REDUCING VALVE
- S — SOLENOID REFRIGERANT SOLENOID VALVE
- BUTTERFLY BUTTERFLY VALVE
- LOCK SHIELD VALVE
- NEEDLE VALVE
- GATE VALVE
- QUICK OPENING VALVE
- SPRING CHECK VALVE
- SWING GATE CHECK VALVE
- TEMP PRESSURE RELIEF VALVE

PLUMBING EQUIPMENT TAG LEGEND



GENERAL PLUMBING NOTES

1. THE ENTIRE PLUMBING SYSTEM SHALL BE IN ACCORDANCE WITH THE 2018 ARKANSAS PLUMBING CODE REGULATIONS AND LOCAL PLUMBING INSPECTOR.
2. IT IS THE PLUMBING CONTRACTOR'S RESPONSIBILITY TO COORDINATE WITH THE SITE CONTRACTOR TO CONFIRM THAT THE INVERT AND LOCATION OF THE SANITARY SERVICE IS COMPATIBLE WITH THE SITE UTILITIES PRIOR TO BEGINNING WORK.
3. THE PIPING INDICATED ON THESE PLANS ARE DIAGRAMMATICAL. ALL WORK SHALL BE COORDINATED WITH ALL OTHER TRADES PRIOR TO INSTALLATION. CONTRACTOR SHALL COORDINATE ROUTING OF ALL PIPING WITH EXISTING CONDITIONS AND SHALL PROVIDE ANY NECESSARY OFFSETS, REROUTING, TEES, ELBOWS, ETC. REQUIRED FOR A COMPLETE AND COORDINATED INSTALLATION.
4. THE CONTRACTOR SHALL OBTAIN AND PAY ALL FEES RELATED TO PERMITTING, INSPECTIONS, TAP-ON FEES, ETC.
5. THE CONTRACTOR SHALL COORDINATE ANY PLUMBING OR PIPING SYSTEM SHUTDOWN WITH THE OWNER 48 HOURS IN ADVANCE.
6. WATER HAMMER ARRESTORS SHALL BE INSTALLED AT DISHWASHERS, WASHING MACHINES, SUPPLY BOXES, AND QUICK CLOSING VALVES NOT LISTED. INSTALL WHA-1 AS CLOSE TO QUICK CLOSING VALVE AS POSSIBLE PER MANUFACTURER'S RECOMMENDATIONS. ISOLATION VALVES SHALL BE INSTALLED ON ALL SUPPLY FIXTURE GROUPS AND HOT WATER BALANCING VALVES. CONTRACTOR SHALL COORDINATE AND PROVIDE ALL NECESSARY PIPING & PLUMBING FITTINGS, PIPING, MISCELLANEOUS ITEMS REQUIRED FOR A COMPLETE INSTALLATION OF ALL PLUMBING RELATED ITEMS.
7. DOMESTIC WATER AND SEWER LOCATED OUTSIDE OF FOOTING SHALL MAINTAIN A MINIMUM OF 10' SEPARATION UNLESS WRITTEN PERMISSION IS OBTAINED FROM LOCAL AUTHORITIES AND/OR PROPER CONTAMINATION PROVISIONS PER LOCAL CODE HAVE BEEN MET.
8. ALL DOMESTIC WATER PIPING SHOWN IS ABOVE CEILING, EXPOSED OVERHEAD, AND WITHIN WALLS UNLESS OTHERWISE NOTED.
9. ALL SANITARY PIPING SHOWN IS BELOW SLAB, BELOW FLOOR, OR WITHIN WALLS UNLESS OTHERWISE NOTED. ALL SANITARY VENT PIPING SHOWN IS ABOVE CEILING, EXPOSED OVERHEAD, OR WITHIN WALLS UNLESS OTHERWISE NOTED.
10. FROST PROOF HOSE BIBBS AND SUPPLY PIPING SHALL BE INSTALLED ON THE INSIDE OF THE INSULATION. SEAL SHEATHING PENETRATION TO PREVENT AIR FROM REACHING THE VALVE.
11. FLOOR DRAIN CONNECTION SIZE TO BE THE SAME SIZE AS THE DRAIN LINE IT CONNECTS UNLESS NOTED OTHERWISE. IF SIZE IS NOT INDICATED ON DRAWINGS REFER TO PLUMBING ROUGH-IN SCHEDULE FOR PROPER SIZE.
12. FLUSH CONTROLS FOR HANDICAPPED WATER CLOSETS ARE TO BE MOUNTED TO THE OPEN SIDE OF THE TOILET AREAS.
13. THE CONTRACTOR SHALL COORDINATE THE INSTALLATION OF ALL UNDER SLAB PIPING WITH EXISTING STRUCTURAL FOUNDATIONS. UNDERGROUND UTILITY LOCATIONS SHALL BE VERIFIED PRIOR TO ANY WORK BEING PERFORMED. CONTRACTOR SHALL REPAIR OR REPLACE ALL PIPING NOT IN PROPER WORKING ORDER OR DAMAGED DURING INSTALLATION OF THE NEW UNDERGROUND PIPING.
14. ALL PIPING PENETRATIONS THROUGH NEW, EXISTING WALL, OR FLOOR SHALL BE SEALED TO EQUAL THE RATING OF THE NEW, EXISTING WALL OR FLOOR.
15. THE PLUMBING SYSTEM SHALL BE TESTED AS REQUIRED BY LOCAL CODE OR BY THE REQUIREMENTS OF THE LOCAL PLUMBING INSPECTOR.
16. THE ENTIRE DOMESTIC WATER SYSTEM SHALL BE DISINFECTED IN ACCORDANCE TO THE LOCAL CODE & HEALTH DEPARTMENT REQUIREMENTS.
17. FINISHED FLOOR ELEVATION (F.F.E.) SHALL BE 0.00' FOR CALCULATION PURPOSES ONLY, UNLESS NOTED OTHERWISE.
18. THE BACKFLOW PREVENTION DEVICE SHALL BE INSTALLED PER LOCAL CODE & PER AUTHORITY HAVING JURISDICTION REQUIREMENTS. NON-LEAD TYPE ONLY.
19. ALL PIPING ON ROOF SHALL BE ANCHORED TO STEEL RIB FASTENERS APPROVED BY THE ROOF MANUFACTURER. INSTALL ANCHORS PER MANUFACTURERS RECOMMENDATION.
20. ALL PLUMBING & PIPING SYSTEMS SHALL BE SUPPORTED AS REQUIRED BY THE LOCAL CODE REQUIREMENTS AND PER MANUFACTURER'S RECOMMENDATIONS.
21. ALL VENT THRU ROOF (VTRS) PENETRATIONS INDICATED ON PLANS ARE PRELIMINARY. FINAL LOCATIONS SHALL BE COORDINATED WITH ALL TRADES. ALL VTRS SHALL BE A MINIMUM OF 10'-0" FROM ALL FRESH AIR INTAKE OPENINGS.
22. ANY PVC PIPE PENETRATING A FIRE RATED ASSEMBLY SHALL BE EXTERNALLY SLEEVED WITH STEEL, FERROUS, OR COPPER MATERIALS, SECURELY FASTENED TO THE FIRE RATED ASSEMBLY. ANY SPACE BETWEEN THE SLEEVE AND THE FIRE RATED ASSEMBLY PENETRATED SHALL BE PROTECTED USING MATERIAL THAT CONFORMS TO ASTM E 814 OR UL 1479, SUCH AS FIRE STOP FS-1900 OR FLAME STOPPER 5000.
23. CONTRACTOR SHALL MAKE ALL FINAL CONNECTIONS FOR DISHWASHER, WASHING MACHINE, REFRIGERATOR, ETC.
24. PROVIDE SHUT-OFF VALVES FOR PROPER OPERATION AND SERVICING OF DOMESTIC WATER DISTRIBUTION SYSTEM. LOCATION SHALL INCLUDE BUT NOT BE LIMITED TO THE FOLLOWING: AT EACH FIXTURE GROUP, AT EACH BRANCH TAKE-OFF FROM MAINS AND AT THE BASE OF EACH RISER. COORDINATE WITH ARCHITECTURAL PLAN FOR ACCESS DOOR LOCATIONS.
25. TEMPERED WATER, NOT EXCEEDING A MAXIMUM OF 110° F, SHALL BE DELIVERED FROM PUBLIC HANDWASHING FACILITIES THROUGH AN APPROVED WATER TEMPERATURE LIMITING DEVICE THAT CONFORMS TO ASSE 1070.
26. VALVES SHALL BE LOCATED 6" ABOVE ACCESSIBLE CEILING WHEN AT ALL POSSIBLE AND SHALL BE CLEAR OF ANY OBSTRUCTIONS FROM OTHER TRADES. MAINTENANCE SHALL BE ABLE TO ACCESS VALVES WITH STANDARD LADDER. SHOULD LOCATION NOT BE APPLICABLE CONTRACTOR SHALL PROVIDE A CONTROL CHAIN AND/OR ARM.
27. IT IS THE PLUMBING CONTRACTOR'S RESPONSIBILITY TO COORDINATE WITH THE SITE CONTRACTOR TO CONFIRM THAT THE INVERTS AND LOCATIONS OF THE BUILDING UTILITIES ARE COMPATABLE WITH THE SITE UTILITIES PRIOR TO BEGINNING WORK.
28. ANY LINE VOLTAGE WIRING THAT IS RUN BY THE PLUMBING CONTRACTOR SHALL BE COORDINATE WITH ELECTRICAL CONTRACTOR ON SITE, AND INSTALLED IN ACCORDANCE WITH THE ELECTRICAL PLANS, NOTES, AND SPECIFICATIONS.
29. INSULATION JACKET SHALL BE PROVIDED WHEN PIPING INSULATION IS EXPOSED.

GENERAL PLUMBING SEISMIC NOTES

1. PROVIDE VIBRATION AND SEISMIC CONTROLS FOR PLUMBING PIPING AND EQUIPMENT.
2. COORDINATE ALL VIBRATION ISOLATION DEVICE INSTALLATION AND SEISMIC BRACING FOR PLUMBING PIPING AND EQUIPMENT WITH OTHER SYSTEMS AND EQUIPMENT IN THE VICINITY, INCLUDING OTHER SUPPORTS AND RESTRAINTS, IF ANY.
3. TESTING AGENCY QUALIFICATIONS: AN INDEPENDENT AGENCY, WITH THE EXPERIENCE AND CAPABILITY TO CONDUCT THE TESTING INDICATED, THAT IS AN NRTL AS DEFINED BY OSHA IN 29 CFR 1910.7 AND THAT IS ACCEPTABLE TO AUTHORITIES HAVING JURISDICTION.
4. COMPLY WITH SEISMIC-RESTRAINT REQUIREMENTS IN THE INTERNATIONAL BUILDING CODE
5. WELDING QUALIFICATIONS: QUALITY PROCEDURES AND PERSONNEL ACCORDING TO AWS D1.1/D1.1M, "STRUCTURAL WELDING CODE-STEEL."
6. SEISMIC-RESTRAINT DEVICES SHALL HAVE HORIZONTAL AND VERTICAL LOAD TESTING AND ANALYSIS AND SHALL BEAR ANCHORAGE PRE-APPROVAL OPA NUMBER FROM OSHPD, PRE-APPROVAL BY ICC-ES, OR PRE-APPROVAL BY ANOTHER AGENCY ACCEPTABLE TO AUTHORITIES HAVING JURISDICTION, SHOWING MAXIMUM SEISMIC-RESTRAINT RATINGS. RATINGS BASED ON INDEPENDENT TESTING ARE PREFERRED TO RATINGS BASED ON CALCULATIONS. IF PRE-APPROVED RATINGS ARE UNAVAILABLE, SUBMITTALS BASED ON INDEPENDENT TESTING ARE PREFERRED. CALCULATIONS (INCLUDING COMBINING SHEAR AND TENSILE LOADS) TO SUPPORT SEISMIC-RESTRAINT DESIGNS MUST BE SIGNED AND SEALED BY A QUALIFIED PROFESSIONAL ENGINEER.
7. BUILDING IS CLASSIFIED AS SEISMIC DESIGN CATEGORY D. CONTRACTOR SHALL PROVIDE SEISMIC BRACING FOR PIPING, DUCTWORK AND EQUIPMENT TO MEET ALL LOCAL AND NATIONAL CODE REQUIREMENTS.
8. SEISMIC RESTRAINTS FOR MEP EQUIPMENT AND SYSTEMS
9. CONTRACTOR'S RESPONSIBILITIES SHALL INCLUDE PROVIDING ALL SUBMITTAL'S AND DETAILS WITH STRUCTURAL ENGINEER'S CERTIFICATION FOR PERMITTING.
10. SEISMIC PROTECTION FOR CONCERNS OF ALL BUILDING SYSTEMS INCLUDING BUT NOT LIMITED TO MECHANICAL, PLUMBING, AND ELECTRICAL MUST MEET MINIMUM REQUIREMENTS OF ALL APPLICABLE CODES FOR BUILDINGS' CLASSIFIED SEISMIC PROTECTION MEASURES TO BE APPLIED SHALL BE INSTALLED IN STRICT ACCORDANCE WITH ALL APPLICABLE LOCAL, STATE, AND/OR FEDERAL CODES AND WITH MANUFACTURERS'S REQUIREMENTS, THE MOST STRINGENT SHALL APPLY

PLUMBING SHEET INDEX

P0.01	PLUMBING LEGEND
P0.02	PLUMBING SCHEDULES
P1.01A	LEVEL 1 SANITARY AND VENT PLAN
P1.01B	LEVEL 1 SUPPLY PLAN
P1.02	PLUMBING ROOF PLAN
P3.01	PLUMBING ENLARGED PLANS
P3.02	PLUMBING ENLARGED PLANS
P4.01	PLUMBING DETAILS
P4.02	PLUMBING DETAILS
P5.01	PLUMBING DRAIN AND VENT RISER

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DARWIN W. HODGE JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING LEGEND

P0.01

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

FIXTURE SCHEDULE

NOTES:
1.INSTALL PER MANUFACTURER GUIDELINES.

FIXTURE TAG	FIXTURE TYPE	FIXTURE MANUFACTURER	FIXTURE MODEL	FIXTURE MATERIAL DESCRIPTION	FAUCET/VALVE MANUFACTURER	FAUCET/VALVE MODEL	FAUCET/VALVE TYPE	DESCRIPTION.	NOTES
EWC-1	WATER COOLER - DUAL HEIGHT - ADA	ELKAY	EZSTLDDLC	-	-	-	-	DUAL-LEVEL ELECTRIC WATER COOLER WITH BOTTLE FILLING STATION. WALL-MOUNTED, INDOOR RATED, STAINLESS STEEL BASIN, 8 GPH, ADA COMPLIANT. 120V/1Φ ELECTRIC POWER.	115V, 1PH, 370W
EWC-2	WATER COOLER	BY TENANT	-	-	-	-	-	FREE STANDING POINT OF UF USE WATER COOLER PROVIDED AND SET IN PLACE BY TENANT.PROVIDE CW SUPPLY WITH 3/8" DISCONNECT AND SHUT OFF VALVE AT 24" AFF.	115V, 1PH, 370W
FB-1	FOOT BATH	WUDUMATE	WM-COM-IR 867	-	WUDUMATE	WM-T-PIL-180-SQ	MANUAL	1.25 GPF, WALL MOUNTED ELONGATED SIPHON JET BOWL, 1 ½" TOP SPUD AMERICAN STANDARD 5901.110T STANDARD SEAT WITH EVERCLEAN. FURNISH WITH ZURN Z1201N, 4 OR Z1201-ND4 WATER CLOSET CARRIER. INSTALL AT ADA HEIGHT.	
HB-1	EXTERIOR WALL HYDRANT	WOODFORD	SRH				MANUAL	FREEZELESS ANTI-SIPHON, INTEGRAL BACKFLOW PROTECTION, PROVIDE SHUTOFF VALVE FOR SUPPLY LINE IN AN ACCESSIBLE LOCATION. CONTRACTOR SHALL COORDINATE WALL THICKNESS.	
JS-1	JANITOR SINK	STERN WILLIAMS	MTB-2424	MOLDED STONE	FIAT	830-AA	MANUAL	MOP SINK BASIN, MOLDED STONE, FLOOR MOUNT, 24"Wx24"Lx10"D BASIN, STAINLESS STEEL DRAIN BODY.	
L-2	HAND SINK AND FAUCET	AMERICAN STANDARD	0355.012	WHITE VITREOUS CHINA	SLOAN	EBF-650	BATTERY	WALL-MOUNTED, VITREOUS CHINA, 15" X 10-7/8" BOWL, ADA ACCESSIBLE. REAR OVERFLOW, CONCEALED ARMS. 4" CENTERSET HOLES, BATTERY POWERED FAUCET WITH 0.35 GPM AERATOR. PROVIDE WITH 0059.020 SHROUD/KNEE CONTACT GUARD. INSULATE ALL EXPOSED DRAIN AND WATER PIPING UNDER SINK PER ADA REQUIREMENTS WITH TRUEBRO #102 WHITE INSULATION OR EQUIVALENT. PROVIDE ASSE 1070 MIXING VALVE WITH INTEGRAL CHECK VALVE AND STRAINER, SET AT 110 DEGREES.	
RH-1	ROOF HYDRANT	WOODFORD	SRH				MANUAL	NON-FREEZE TYPE ROOF HYDRANT, WITH ASSE 1052 DOUBLE CHECK BACKFLOW PREVENTER, VALVE ON THE INSIDE OF THE ROOF, HOSE CONNECTION WITH BACKFLOW PREVENTER, AND CLOCKING HANDLE ON THE OUTSIDE OF THE ROOF. ALL EXPOSED PARTS SHALL BE PAINTED. MAKE ARRANGEMENTS WITH THE GENERAL CONTRACTOR TO PROVIDE THE NECESSARY SUPPORT OF ROOF. PROVIDE SHUTOFF VALVE IN ACCESSIBLE LOCATION AND ROUTE DRAINPIPE TO NEAREST FLOOR DRAIN.	
S-1	SINGLE BOWL SINK - DROP-IN	ELKAY	LRAD 2219-55-3	STAINLESS STEEL	PFISTER	LG529-ESAC	BATTERY		
S-2	DUAL BOWL SINK - COUNTER DROP-IN	ELKAY	LRAD-3319-55-3	STAINLESS STEEL	PFISTER	LG529-ESAC	BATTERY	DOUBLE COMPARTMENT SINK, 33"x19", #18 GAUGE STAINLESS STEEL, SELF RIMMING, 5-1/2" BOWL DEPTH, SINGLE HOLE, LK-99 DRAIN FITTING, AND ADA COMPLIANT. INSULATE ALL EXPOSED DRAIN AND WATER PIPING UNDER SINK WITH TRUEBRO #102 WHITE INSULATION OR EQUIVALENT. PFISTER 'STELLEN' SINGLE HOLE KITCHEN FAUCET WITH LEVER HANDLE. 1.8 GPM.	
WB-1	WATER SUPPLY BOX	SIOUX CHIEF	696-1011	GALVANIZED STEEL				ICE MAKER OUTLET BOX, QUARTER TURN VALVE, 1/2" CONNECTION, LEAD FREE. SECURE BOX TO STRUCTURAL MEMBER.	
WC-2	WATER CLOSET - WALL HUNG - ADA	AMERICAN STANDARD	2257.101	WHITE VITREOUS CHINA	AMERICAN STANDARD	6065.121.002	BATTERY	1.25 GPF, WALL MOUNTED ELONGATED SIPHON JET BOWL, 1 ½" TOP SPUD AMERICAN STANDARD 5901.110T STANDARD SEAT WITH EVERCLEAN. FURNISH WITH ZURN Z1201N, 4 OR Z1201-ND4 WATER CLOSET CARRIER. INSTALL AT ADA HEIGHT.	

ELECTRIC WATER HEATER SCHEDULE

NOTES:
1.INSTALL PER MANUFACTURER GUIDELINES.

ID	MANUFACTURER	MODEL NO.	TYPE	ELECTRIC HEAT EXCHANGER EWT	ELECTRIC HEAT EXCHANGER LWT	ELECTRIC HEAT EXCHANGER MAX TEMP RISE	ELECTRIC HEAT EXCHANGER POWER	TANK VOL	PERFORMANCE RECOVERY	ASME	VOLT	PH	UNIT WEIGHT	MOCP	REMARKS
WH-1	RHEEM	XE65T10HS45U0	STORAGE	30 °F	140 °F	110 °F	4.5 kW	65.0 gal	27.0 gal/h	Yes	208 V	1	225 lb	30.0 A	SINGLE ELEMENT, TEN YEAR LIMITED WARRANTY, MEETING THE CURRENT EDITION OF ASHRAE STANDARD 90 AND LOCAL ENERGY CONSERVATION REQUIREMENTS. PROVIDE WATER HEATER ON HOUSEKEEPING PAD PER DUAL HYBRID WATER HEATER DETAIL. PROVIDE AMTROL # ST-8 THERMAL EXPANSION TANK WITH A TOTAL VOLUME OF 3.2 GALLONS AND A MAX ACCEPTANCE VOLUME OF 1.9 GALLONS, ¾" CONNECTION. INSTALL NEAR WATER HEATER PER MANUFACTURER'S INSTRUCTIONS. PROVIDE ASSE 1017 COMPLIANT MIXING VALVE; POWERS SERIES LFSH OR EQUAL
WH-2	RHEEM	XE65T10HS45U0	STORAGE	30 °F	140 °F	110 °F	4.5 kW	65.0 gal	27.0 gal/h	Yes	208 V	1	225 lb	30.0 A	SINGLE ELEMENT, TEN YEAR LIMITED WARRANTY, MEETING THE CURRENT EDITION OF ASHRAE STANDARD 90 AND LOCAL ENERGY CONSERVATION REQUIREMENTS. PROVIDE WATER HEATER ON HOUSEKEEPING PAD PER DUAL HYBRID WATER HEATER DETAIL. PROVIDE AMTROL # ST-8 THERMAL EXPANSION TANK WITH A TOTAL VOLUME OF 3.2 GALLONS AND A MAX ACCEPTANCE VOLUME OF 1.9 GALLONS, ¾" CONNECTION. INSTALL NEAR WATER HEATER PER MANUFACTURER'S INSTRUCTIONS. PROVIDE ASSE 1017 COMPLIANT MIXING VALVE; POWERS SERIES LFSH OR EQUAL.

PLUMBING ACCESSORIES SCHEDULE

FIXTURE TAG	DESCRIPTION	MANUFACTURER	TRIM	ELECTRICAL REQUIREMENTS
BV-1	BALL VALVE	APOLLO INTERNATIONAL 94ALF-A	LEAD FREE BALL VALVE, FULL PORT, BLOWOUT-PROOF, PRESSURE RETAINING, ADJUSTABLE STEM PACKING NUT	
CBV-1	CALIBRATED BALANCE VALVE	BELL&GOSSETT CIRCUIT SETTER PLUS	LEAD FREE, CIRCUIT SETTER PLUS, CALIBRATED BALANCE AND POSITIVE SHUT-OFF VALVE	
COTG-1	CLEANOUT TO GRADE, SPEEDI-SET OUTLET	J. R. SMITH 4237	UNFINISHED FLOOR CLEANOUT WITH ADJUSTABLE ROUND CAST IRON TRACTOR COVER TOP, DUCO CAST IRON CLEANOUT WITH ROUND ADJUSTABLE SCORIATED SECURED CAST IRON TOP, TAPERED THREAD BRONZE PLUG, REFER TO PLANS FOR SIZES	
CP-1	CIRCULATING PUMP	ARMSTRONG ASTRO 280 SS	THREE SPEED, BRONZE BODY WITH BRASS IMPELLER, WITH AQUASTAT AND AUTOMATIC TIMER KIT, 5 GPM @ 25 HEAD-FEET	115V, 1PH, 370 WATTS
DS-1	DOWNSPOUT NOZZLE	ZURN Z199 ZARB	ROUGH BRONZE BODY, DECORATIVE WALL FLANGE AND OUTLET NOZZLE	
FCO-1	FLOOR CLEANOUT, SPEEDI-SET OUTLET	J. R. SMITH 4020-4034	FINISHED FLOOR CLEANOUT WITH ROUND ADJUSTABLE SCORIATED SECURED NICKEL BRONZE TOP, DUCO CAST IRON, TAPERED THREAD BRONZE PLUG, REFER TO PLANS FOR SIZES	
RPZ-1	REDUCE PRESSURE PRINCIPLE BACKFLOW PREVENTER, FOR DOMESTIC WATER	WATTS LF009M2 QT	PROVIDE SAME SIZE AS WATER LINE FROM METER, WATTS BALL VALVES AND "Y" STRAINER, SHALL MEET APPROVAL BY FOUNDATION FOR CROSS CONNECTION CONTROL AND HYDRAULIC RESEARCH AT THE UNIVERSITY OF SOUTHERN CALIFORNIA	
RPZ-2	REDUCE PRESSURE PRINCIPLE BACKFLOW PREVENTER, FOR IRRIGATION WATER	WATTS LF009M2 QT	PROVIDE SAME SIZE AS WATER LINE FROM METER, WATTS BALL VALVES AND "Y" STRAINER, SHALL MEET APPROVAL BY FOUNDATION FOR CROSS CONNECTION CONTROL AND HYDRAULIC RESEARCH AT THE UNIVERSITY OF SOUTHERN CALIFORNIA	
TWCO-1	TWO WAY CLEANOUT, SPEEDI-SET OUTLET	J. R. SMITH 4237	UNFINISHED FLOOR DUCO CAST IRON CLEANOUT WITH ROUND ADJUSTABLE SCORIATED SECURED CAST IRON TOP, TAPERED THREAD BRONZE PLUG, REFER TO PLANS FOR SIZES	
UB-1	UTILITY BOX, WASTE, AND SUPPLY	OATEY QUADTRO	(2) 1/2" SUPPLY VALVES, 2" DRAIN CONNECTION, 1/4" TURN VALVE, PROVIDE WHA-1 (WATER HAMMER ARRESTOR)	
WCO-1	WALL CLEANOUT	J. R. SMITH 4510	DUCO CAST IRON CLEANOUT TEE, BRONZE PLUG, REMOVABLE STAINLESS STEEL COVER. REFER TO PLANS FOR SIZE, PROVIDE ROUND OR SQUARE FRAME AND COVER AS REQUIRED, REFER TO ARCHITECT	
WHA-1	WATER HAMMER ARRESTOR	SIOUX CHIEF 650&660 HYDRARESTER	VACURESTER VACUUM BREAKER ARRESTER, TYPE L COPPER CONSTRUCTION, IF AN ACCESS DOOR IS NEEDED CONTACT THE ARCHITECT	
WM-1	WATER METER	BY CIVIL	BY CIVIL	

FLOOR DRAIN SCHEDULE

ID	DESCRIPTION	MANUFACTURER	MODEL	MATERIAL DESCRIPTION DRAIN BODY	MATERIAL DESCRIPTION STRAINER	SPECIFICATION
FD-1	FLOOR DRAIN	MIFAB	F1000	EPOXY COATED CAST IRON	STAINLESS STEEL	CAST IRON BODY, ANCHOR FLANGE, SECURED ROUND ADJUSTABLE STRAINER HEAD WITH HOLE GRATE, LOOSE GRATE AND SEDIMENT BUCKETS, MIFAB TRAP GUARD OR EQUAL IF ALLOWED BY AHJ, REFER TO PLANS FOR SIZES.
FS-1	FLOOR SINK	WATTS	FS-730	EPOXY COATED CAST IRON	ALUMINUM	12" SQUARE X 6" DEEP SANITARY FLOOR SINK WITH WHITE PORCELAIN ENAMEL COATED INTERIOR, LOOSE SET PORCELAIN ENAMEL COATED CAST IRON GRATE, ALUMINUM DOME BOTTOM STRAINER, AND NO HUB OUTLET. PROVIDE WITH MANUFACTURER RECOMMENDED TRAP GUARD.

DOMESTIC BOOSTER PUMP SCHEDULE

NOTES:
1.INSTALL PER MANUFACTURER GUIDELINES.

ID	MANUFACTURER	MODEL NO.	TYPE	PUMP FLOW DESIGN	PUMP HEAD	PUMP SPEED (RPM)	MOTOR POWER	MOTOR ECM	MOCP.	VOLT	PH	REMARKS
BP-1	ARMSTRONG	NPS-115020-09S-SHP	VERTICAL INLINE	60.0 GPM	92.0 FT	3450	5.00 hp	Yes	25	460 V	3	DUPLEX SKID (1 STANDBY PUMP), 3" HEADER.

PLUMBING PIPING INSULATION SCHEDULE

DESCRIPTION	INSULATION TYPE	MINIMUM INSULATION THICKNESS PER ASHRAE 90.1 NOMINAL PIPE SIZE RECOMMENDATIONS <1	1 TO <1-1/2	1-1/2 TO <4	4 TO <8	≥8
DOMESTIC COLD WATER PIPING BELOW GRADE	PVC OR HDPE JACKET ONLY	1	1	1.5	1.5	1.5
CONDENSATE PIPING ABOVE GRADE	ELASTOMERIC, ADD ASTM E84 COMPLIANT JACKET IN AIR PLENUM SPACES	0.5	1	1	1	1.5
PVC WASTE VENT AND WASTE DRAIN IN AIR PLENUM SPACE	COMPRESSED FIBERGLASS OR ELASTOMERIC WITH ASTM E84 COMPLIANT JACKET	0.5	0.5	0.5	0.5	0.5
PVC AND CAST IRON ROOF DRAINS IN ALL AREAS ABOVE GRADE	COMPRESSED FIBERGLASS OR ELASTOMERIC WITH ASTM E84 COMPLIANT JACKET	1	1	1.5	1.5	1.5
WATER COOLER TRAPS, ALL EXPOSED LAVATORY AND SINK TRAPS, TAILPIECES, HOT AND COLD WATER SUPPLY LINES/ANGLE VALVES TO THESE DEVICES	EQUIVALENT TO TRUEBRO 102 E-Z PIPE COVER	0.125	0.125	0.125	0.125	0.125
DOMESTIC HOT WATER AND HOT WATER RETURN PIPING BELOW GRADE	ELASTOMERIC OR FOAM. ENCAPSULATE WITH PVC OR HDPE JACKET	1	1	1.5	1.5	1.5
DOMESTIC COLD WATER, HOT WATER, AND HOT WATER RETURN PIPING ABOVE GRADE	ELASTOMERIC, ADD ASTM E84 COMPLIANT JACKET IN AIR PLENUM SPACES	1	1	1.5	1.5	1.5
PVC WASTE DRAIN IN WALLS, AND WASTE VENT IN ALL AREAS ABOVE GRADE	COMPRESSED FIBERGLASS OR ELASTOMERIC WITH ASTM E84 COMPLIANT JACKET	1"	1"	1.5"	1.5"	1.5"

ROUGH-IN AND MOUNTING HEIGHT SCHEDULE

NOTES:
1. ALL VENT LINE SIZES SHOWN ARE MINIMUM UNLESS SHOWN LARGER ON RISER DIAGRAMS.
2. SIZES SHOWN FOR WASTE ARE FOR RISERS ONLY.
3. ALL DRAIN AND VENT LINES BELOW SLAB SHALL BE 2" OR LARGER.
4. VENT LINES SHALL RISE 6" ABOVE FLOOD LEVEL RIM BEFORE OFFSETTING HORIZONTALLY, EXCEPT FOR INTERCEPTORS LOCATED OUTDOORS.
5. SIZES SHOWN APPLY UNLESS NOTED DIFFERENTLY ON PLANS.
6. IN APPLICATIONS WHERE PEX PIPING IS USED, CONTRACTOR SHALL NOT STUB ANY PEX PIPING DIRECTLY OUT OF THE WALLS. CONTRACTOR SHALL MAKE TRANSITION TO COPPER AT ALL STUB OUT LOCATIONS AND ENSURE PIPING CLIPS BETWEEN STUDS ARE PROVIDED TO SECURE CONNECTIONS. ROUGH IN PANELS FOR PEX PIPING APPLICATIONS ARE ACCEPTABLE ALTERNATIVE TO STUBOUTS WITH COPPER, PROVIDE OMNI PANELS BY SIOUX CHIEF OR EQUAL FOR ALTERNATIVE ROUGH IN INSTALLATIONS WITH PEX.

FIXTURE	WASTE	VENT	COLD WATER	HOT WATER	HEIGHT OF INSTALLATION
DRINKING FOUNTAIN	1-1/2"	1-1/2"	1/2"		NON-ADA 40" TO TOP OF ORIFICE ADA 36" TO TOP OF ORIFICE
FLOOR DRAINS/SINKS	2"	1-1/2"			
HOSE BIBB			3/4"		18" ABOVE GRADE OUTSIDE, 18" A.F.F. INSIDE
JANITOR'S SINK	3"	1-1/2"	1/2"	1/2"	
LAVATORIES AND SINKS, COUNTER MOUNTED	1-1/2"	1-1/4"	1/2"	1/2"	
LAVATORIES AND SINKS, WALL MOUNTED	1-1/2"	1-1/4"	1/2"	1/2"	NON-ADA 31" TO TOP OF RIM ADA 34" TO TOP OF RIM
OPEN HUB DRAIN	2"	1-1/2"			PROVIDE 3" PVC REDUCER, MOUNT AT HEIGHT REQUIRED FOR INSTALL LOCATION
SUPPLY BOX			1/2"		12" TO BOTTOM OF BOX
URINAL FLUSH VALVE WALL MOUNTED	2"	1-1/4"	1"		NON-ADA 24" TO TOP OF FLOOD LEVEL ADA 17" TO TOP OF FLOOD LEVEL GRADES K-3, 18" TO TOP OF FLOOD LEVEL GRADES 4-6, 20" TO TOP OF FLOOD LEVEL GRADES 7-9, 22" TO TOP OF FLOOD LEVEL GRADES 10-12, 24" TO TOP OF FLOOD LEVEL
UTILITY BOX	2"	1-1/2"	1/2"	1/2"	36" TO BOTTOM OF BOX
WATER CLOSET FLUSH VALVE WALL MOUNTED	3"	1-1/2"	1-1/4"		NON-ADA 15" TO TOP OF BOWL ADA 17" TO TOP OF BOWL GRADES K-3, 12" TO TOP OF BOWL GRADES 4-12, 15" TO TOP OF BOWL

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE JR.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

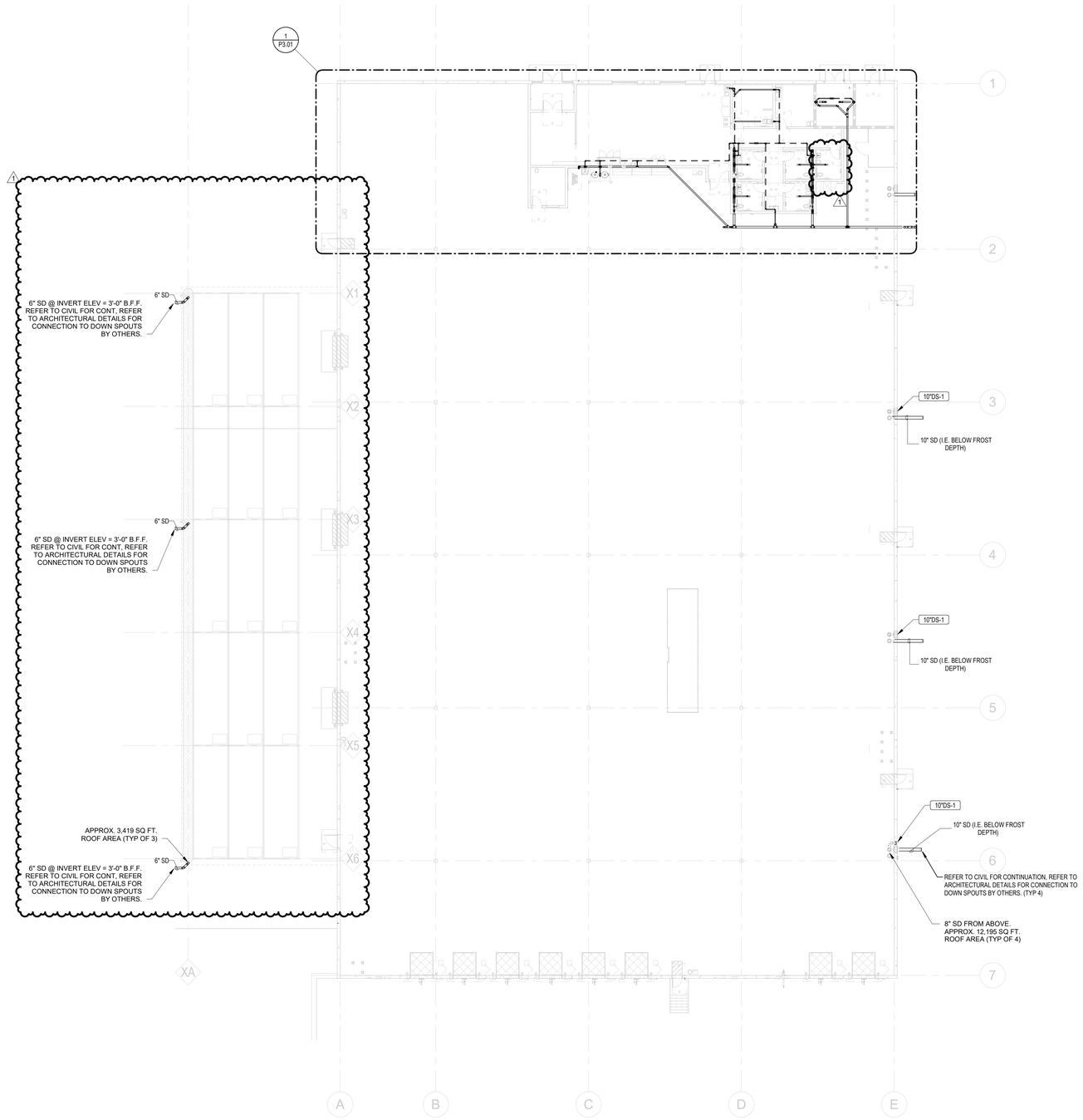
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING SCHEDULES

P0.02

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428



TRUE NORTH

1 / P1.01A PLUMBING WASTE AND VENT PLAN
1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE, IV
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
LEVEL 1 SANITARY AND VENT PLAN

P1.01A

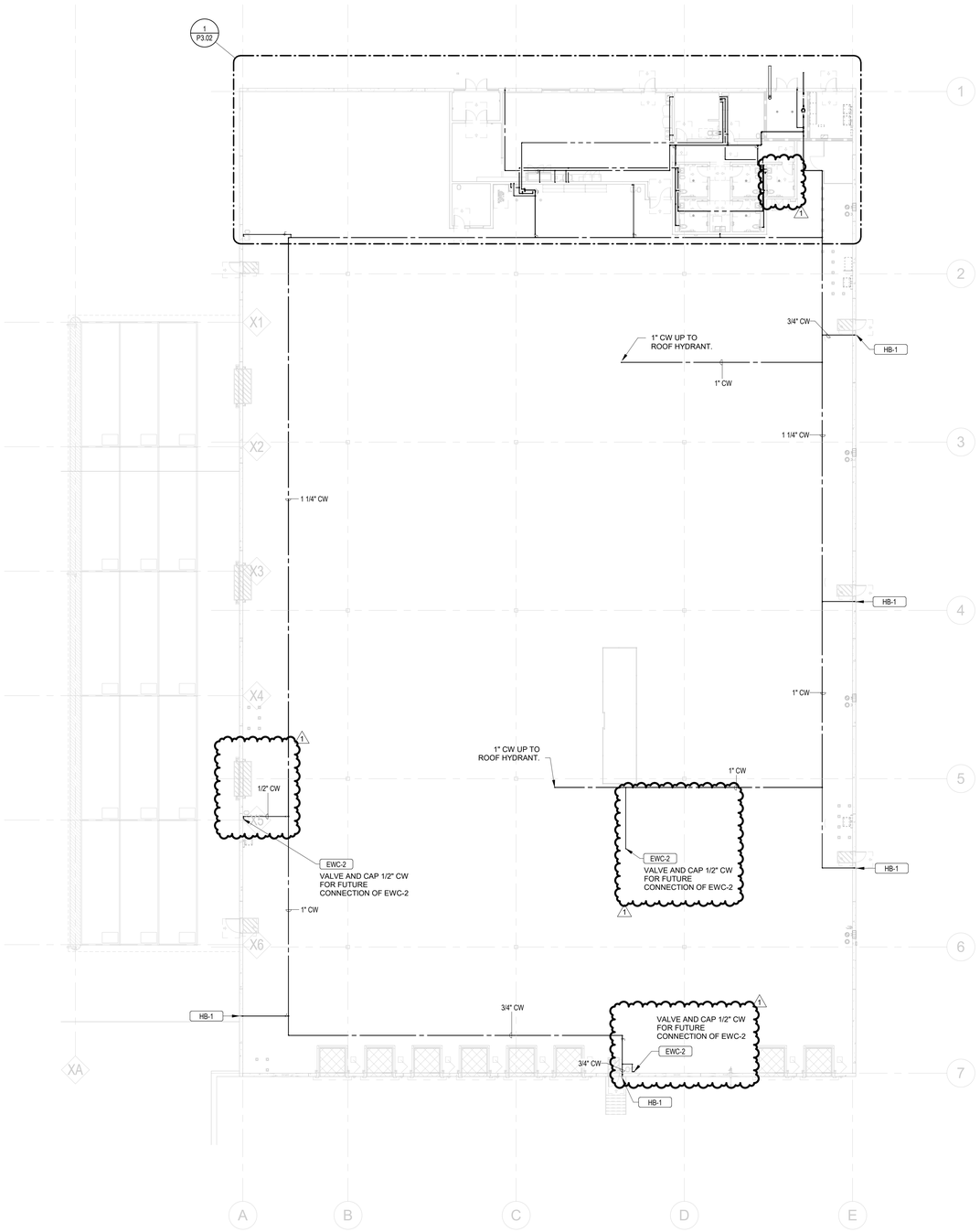
IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES

PROJECT #250428



TRUE NORTH

1 P1.01B LEVEL 1 PLUMBING PLAN
1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE, IV
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
LEVEL 1 SUPPLY PLAN

P1.01B

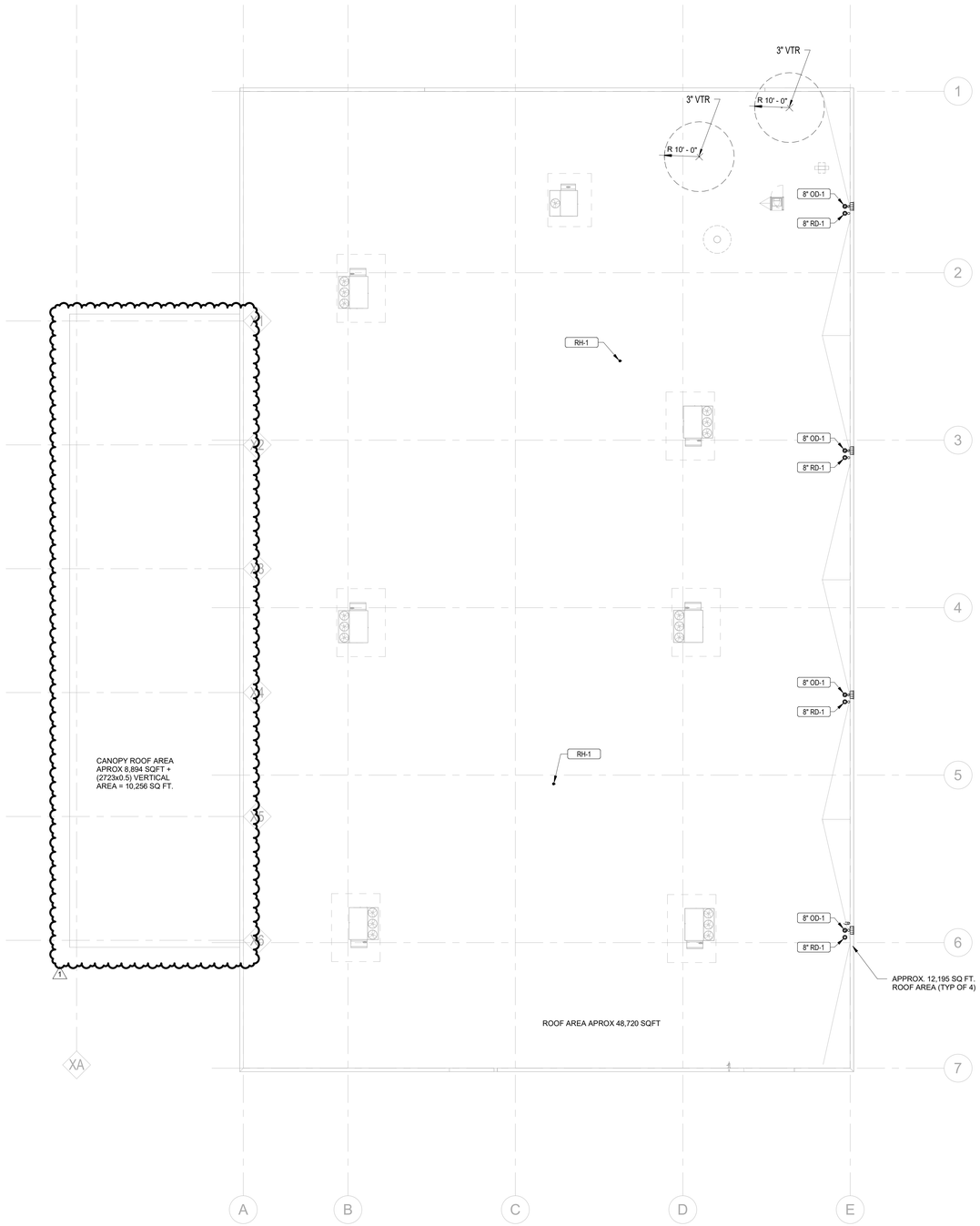
IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED, IN WHOLE OR IN PART, FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES

PROJECT #250428



TRUE NORTH

1 / P1.02 ROOF PLUMBING PLAN
1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE, IV
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

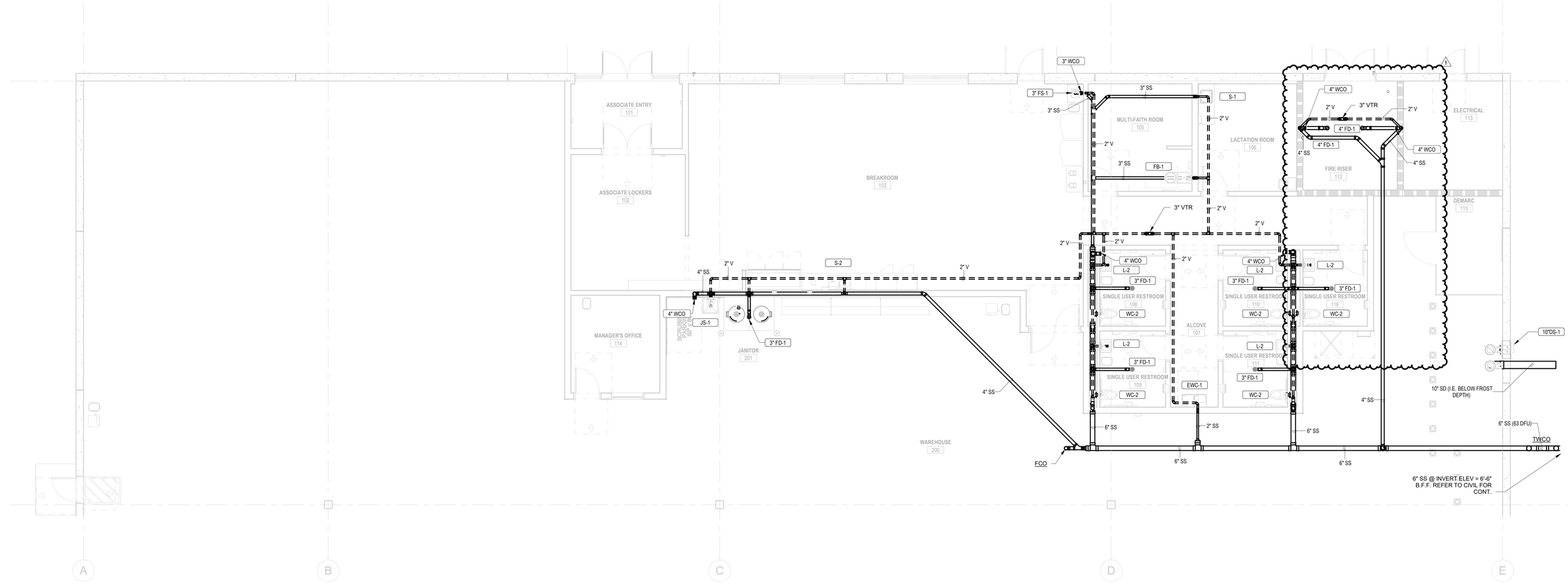
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING ROOF PLAN

P1.02

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



TRUE NORTH

1 P3.01 PLUMBING ENLARGED WASTE AND VENT PLAN
3/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DEWAIN W. HODGE, JR.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

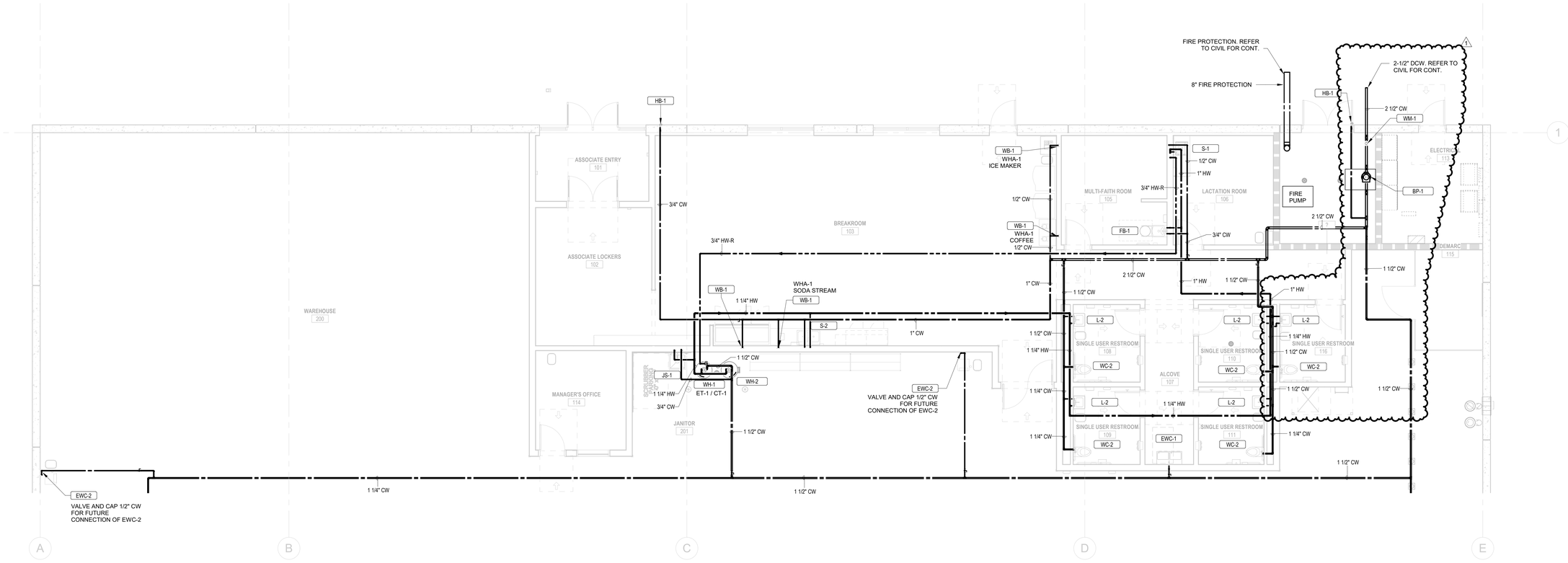
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING ENLARGED PLANS

P3.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



TRUE NORTH

1 P3.02 PLUMBING ENLARGED WATER PLAN
3/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DUSTIN W. HODGE, P.E.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

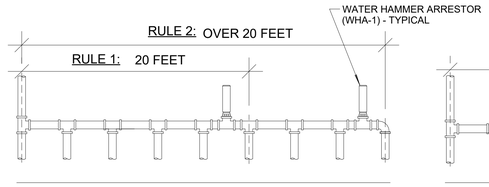
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

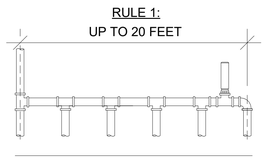
Sheet Title:
PLUMBING ENLARGED PLANS

P3.02

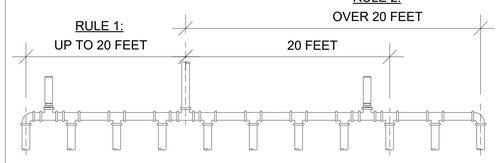
IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



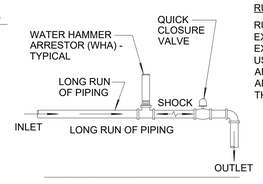
MULTIPLE FIXTURES FED FROM ONE SIDE (B)



MULTIPLE FIXTURES FED FROM ONE SIDE (A)



MULTIPLE FIXTURES FED FROM CENTRAL MAIN



REMOTE FIXTURES

SIZING AND PLACEMENT:

AS SHOWN IN THE DIAGRAMS, IT HAS BEEN ESTABLISHED THAT THE PREFERRED LOCATION FOR THE WATER HAMMER ARRESTOR IS AT THE END OF THE BRANCH LINE BETWEEN THE LAST TWO FIXTURES SERVED. THE LOCATION OF THE WATER HAMMER ARRESTOR SHOWN IN THE DIAGRAMS APPLIES TO BRANCH LINES THAT DO NOT EXCEED 20 FEET IN LENGTH, FROM THE START OF THE HORIZONTAL BRANCH LINE TO THE LAST FIXTURE SUPPLY ON THIS BRANCH LINE. WHEN THE BRANCH LINE EXCEEDS THE 20 FOOT LENGTH, AN ADDITIONAL WATER HAMMER ARRESTOR SHOULD BE USED. REFER TO THE TWO RULES LISTED TO COVER THE PLACEMENT OF WATER HAMMER ARRESTORS.

RULE 1:

RULE 1 COVERS MULTIPLE FIXTURE BRANCH LINES WHICH DO NOT EXCEED 20 FEET LENGTH.
EXPLANATION: - FIXTURE UNIT SIZING AND SELECTION TABLE IS USED TO SELECT THE REQUIRED PDI UNIT (WATER HAMMER ARRESTOR).

RULE 2:

RULE 2 COVERS MULTIPLE FIXTURE BRANCH LINES WHICH EXCEED 20 FEET IN LENGTH.
EXPLANATION: - FIXTURE UNIT SIZING AND SELECTION TABLE IS USED TO SELECT THE REQUIRED PDI UNIT (WATER HAMMER ARRESTOR). THE SUM OF THE FIXTURE UNIT RATING OF UNITS X AND Y SHALL BE EQUAL TO OR GREATER THAN THE DEMAND OF THE BRANCHES.

SELECTION FOR LONG PIPING RUNS:

THE MAJORITY OF SIZING AND SELECTION APPLICATIONS WILL INVOLVE SINGLE AND MULTIPLE FIXTURE BRANCH LINES. THESE ARE EASILY HANDLED WITH THE SIZING AND SELECTION TABLE. THE REMAINDER OF THE APPLICATIONS INVOLVE INDIVIDUAL RUNS OF PIPING TO A REMOTE ITEM OF EQUIPMENT. THE PROPERLY SIZED WATER HAMMER ARRESTOR FOR SUCH APPLICATIONS CAN BE DETERMINED BY THE TABLES BELOW.

IDEALLY, THE FLOW PRESSURE IN BRANCH LINES SERVING FIXTURES SHOULD NEVER EXCEED 55 PSI. PRESSURE REDUCING VALVES SHOULD BE INSTALLED TO MAINTAIN PROPER PRESSURE. WHEN FLOW PRESSURES ARE 65 TO 85 PSI THE NEXT SIZE WATER HAMMER ARRESTOR SHOULD BE SELECTED. REFER TO SIZING TABLE FOR WATER PRESSURE OVER 65 PSI.

ALL SIZING DATA IN THIS SECTION IS BASED ON FLOW VELOCITIES OF 10 FPS OR THE CERTIFICATION TESTING WAS CONDUCTED WITH A VELOCITY OF 10 FPS TO OFFER ASSURANCE THAT PDI APPROVED UNITS WERE CAPABLE OF HANDLING SHOCK OF MAXIMUM INTENSITY THAT MAY BE ENCOUNTERED.

WHEN LONG RUNS OF PIPING ARE EMPLOYED TO SERVE A REMOTE ITEM OF EQUIPMENT, THE WATER HAMMER ARRESTOR SHOULD BE LOCATED AS CLOSE AS POSSIBLE TO THE POINT OF QUICK CLOSURE. AT THIS LOCATION, THE WATER HAMMER ARRESTOR WILL CONTROL THE DEVELOPED ENERGY AND PREVENT THE SHOCK WAVE FROM SURGING THROUGH THE PIPING SYSTEM. A TYPICAL EXAMPLE OF PLACEMENT IS AS SHOWN.

TABLE A - FIXTURE UNIT SIZING INFORMATION

FIXTURE	TYPE OF SUPPLY CONTROL	WEIGHT IN FIXTURE UNITS					
		PUBLIC			PRIVATE		
		TOTAL	C.W.	H.W.	TOTAL	C.W.	H.W.
WATER CLOSET 1.66 PF	FLUSH VALVE	8	8	–	5	5	–
WATER CLOSET 1.66 PF	FLUSH TANK	5	5	–	2.5	2.5	–
PEDESTAL URINAL 1.06 PF	FLUSH VALVE	4	4	–	–	–	–
STALL OR WALL URINAL	FLUSH VALVE 1.06 PF	4	4	–	–	–	–
STALL OR WALL URINAL	FLUSH TANK 1.06 PF	2	2	–	–	–	–
LAVATORY	FAUCET	2	1.5	1.5	1	1	1
BATHTUB	FAUCET	4	2	3	2	1.5	1.5
SHOWER HEAD	MIXING VALVE	4	2	3	2	1	2
BATHROOM GROUP	FLUSH VALVE CLOSET	–	–	–	8	8	3
BATHROOM GROUP	FLUSH TANK CLOSET	–	–	–	6	6	3
SEPARATE SHOWER	MIXING VALVE	–	–	–	2	1	2
SERVICE SINK	FAUCET	3	3	3	–	–	–
LAUNDRY TUBS (1-3)	FAUCET	–	–	–	3	3	3
COMBINATION FIXTURE	FAUCET	–	–	–	3	3	3

TABLE B - SERIES 15M2 SIZING AND SELECTION

SIZE INCHES	CROSS FIXTURE UNITS	REFERENCE PDI STANDARDS*
1/2"	1-11	A
3/4"	12-32	B
1"	33-60	C
1-1/4"	61-113	D
1-1/2"	114-154	E
2"	155-330	F

*PDI STANDARDS (PLUMBING AND DRAINAGE INSTITUTE):
http://www.pdionline.org/certified-water-hammer-arreste/
https://law.resource.org/pub/us/code/bsc.ca.gov/sibr/org.pdi.PDI-WH-201-011810.pdf

GENERAL WHA NOTES:

LOCATE THE WHA IN A MULTIPLE FIXTURE SYSTEM AT THE END OF THE BRANCH LINE BETWEEN THE LAST TWO FIXTURES SERVED. FOR REMOTE INSTALLATIONS THE WHA SHOULD BE PLACED AS CLOSE TO THE POINT OF VALVE CLOSURE AS POSSIBLE. INSTALL WHA's APPROVED FOR SEALED-WALL INSTALLATION ON WATER LINES CONNECTED TO SOLENOID VALVES OR FLUSH VALVES. SIZE, LOCATE, AND INSTALL IN ACCORDANCE WITH PDI STANDARD WH 201. IDEALLY THE FLOW PRESSURE IN BRANCH LINES SERVING FIXTURES SHOULD NEVER EXCEED 55 P.S.I.G. PROVIDE ACCESS PANEL AT EACH LOCATION WHERE THERE IS NOT AN ACCESSIBLE CEILING. MINIMUM SIZE OF 8" x 8".

WATER HAMMER ARRESTORS

SIZE	WATTS MODEL
THREADED	
1/2"	15M2-A
3/4"	15M2-B
1"	15M2-C
1"	15M2-D
1"	15M2-E
1"	15M2-F
SOLDER	
1/2"	15M2-AS
3/4"	15M2-BS
1"	15M2-CS
1"	15M2-DS
1"	15M2-ES
1"	15M2-FS

MODELS ABOVE ARE WATTS AND IS A BASIS OF DESIGN. THE FOLLOWING MANUFACTURERS ARE ACCEPTED IN NAME ONLY:
SIOUX CHIEF, WATTS, PPI, PROFLO, ZURN-WILKINS

SIZING TABLE

FOR WATER PRESSURE UP TO 65 PSI

LENGTH OF PIPE (ft)	NOMINAL PIPE DIAMETER - IN.					
OF PIPE	1/2"	3/4"	1"	1.25"	1.5"	2"
25'	A	A	B	C	D	E
50'	A	B	C	D	E	F
75'	B	C	D	AE	F	EF
100'	C	D	E	F	CF	FF
125'	C	D	F	AF	EF	EFF
150'	D	E	F	DF	FF	FFF

OVER 65 PSI AND UP TO 85PSI

LENGTH OF PIPE (ft)	NOMINAL PIPE DIAMETER - IN.					
OF PIPE	1/2"	3/4"	1"	1.25"	1.5"	2"
25'	B	B	C	D	E	F
50'	B	C	D	E	F	CF
75'	C	D	E	F	CF	FF
100'	D	E	F	CF	EF	EFF
125'	D	E	CF	DF	FF	BFFF
150'	E	F	CF	FF	DFF	FFFF

SIZING AND SELECTION TABLE

SIZE (DN)	MODEL	ORDER CODE	MODEL	ORDER CODE	CROSS FIXTURE	REF. PDI STANDARD UNITS
IN	THREADED			SOLDER		
1/2"	15M2-A	0750140	15M2-AS	0750150	1-11	A
3/4"	15M2-B	0750141	15M2-BS	0750151	12-32	B
1"	15M2-C	0750142	15M2-CS	0750152	33-60	C
1"	15M2-D	0750143	15M2-DS	0750153	61-113	D
1"	15M2-E	0750144	15M2-ES	0750154	114-154	E
1"	15M2-F	0750145	15M2-FS	0750155	155-330	F

UPC-UNIFORM PLUMBING CODE

609.10 WATER HAMMER. ALL BUILDING WATER SUPPLY SYSTEMS IN WHICH QUICK-ACTING VALVES ARE INSTALLED SHALL BE PROVIDED WITH DEVICES TO ABSORB THE HAMMER CAUSED BY HIGH PRESSURES RESULTING FROM THE QUICK CLOSING OF THESE VALVES. THESE PRESSURE-ABSORBING DEVICES SHALL BE APPROVED MECHANICAL DEVICES. WATER PRESSURE-ABSORBING DEVICES SHALL BE INSTALLED AS CLOSE AS POSSIBLE TO QUICK-ACTING VALVES.

IPC-INTERNATIONAL PLUMBING CODE

604.9 WATER HAMMER. THE FLOW VELOCITY OF THE WATER DISTRIBUTION SYSTEM SHALL BE CONTROLLED TO REDUCE THE POSSIBILITY OF WATER HAM-MER. A WATER HAMMER ARRESTOR SHALL BE INSTALLED WHERE QUICK-CLOSING VALVES ARE UTILIZED. WATER HAMMER ARRESTORS SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFICATIONS. WATER HAMMER ARRESTORS SHALL CONFORM TO ASSE 1010.

FLUSHOMETER VALVE:
A VALVE ATTACHED TO A PRESSURIZED WATER SUPPLY PIPE AND SO DESIGNED THAT WHEN ACTIVATED TO OPENS THE LINE FOR DIRECT FLOW INTO THE FIXTURE AT A RATE AND QUANTITY TO OPERATE THE FIXTURE PROPERLY, AND THE GRADUALLY CLOSES TO RESEAL FIXTURE TRAPS AND AVOID WATER HAMMER.

QUICK-CLOSING VALVE:
A VALVE OR FAUCET THAT CLOSES AUTOMATICALLY WHEN RELEASED MANUALLY OR THAT IS CONTROLLED BY A MECHANICAL MEANS FOR FAST-ACTION CLOSING.

1 P4.01 221119 - WATER HAMMER ARRESTOR
SCALE: N.T.S.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
IRWIN W. HODGE JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING DETAILS

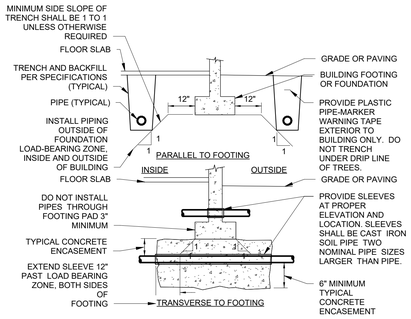
P4.01

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

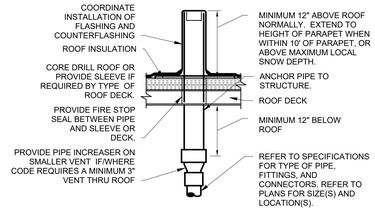
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



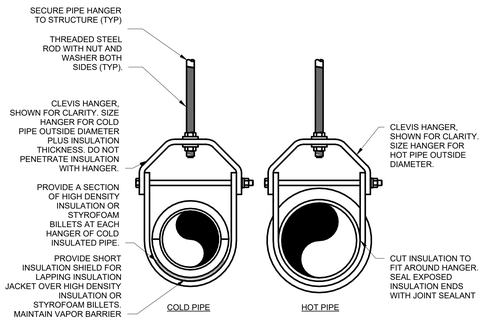
VERIFY EXCAVATION CONDITIONS (SOIL/ROCK) WITH GEOTECHNICAL REPORT AND/OR SITE INVESTIGATIONS. REFER TO SPECIFICATIONS FOR OTHER CONDITIONS. DO NOT INSTALL PIPES UNDER INTERIOR BUILDING SPREAD FOOTINGS OR PILE CAPS. COORDINATE WITH AFFECTED CONTRACTORS PRIOR TO THE START OF WORK.

4 PIPE AND TRENCH LOCATION
NTS



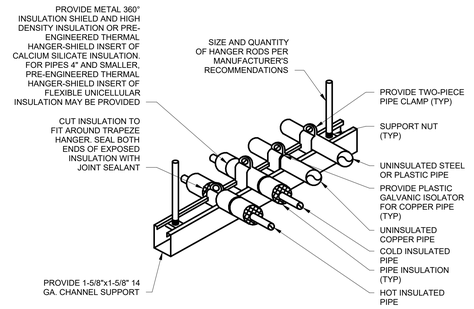
LOCATE VTR MINIMUM THREE FEET FROM PROPERTY LINE, TEN FEET HORIZONTAL OR THREE FEET VERTICAL ABOVE ANY BUILDING OPENING OR FRESH AIR INTAKE, TWENTY FIVE FEET FROM ANY OPENING OR FRESH AIR INTAKE IN MEDICAL FACILITIES AND ONE FOOT FROM ANY VERTICAL SURFACE. REFER TO LOCAL CODES FOR OTHER VENT TERMINATION REQUIREMENTS. LOCATE VTR MINIMUM 18" FROM ADJACENT WALL, PARAPET, EXPANSION JOINT, ROOF DRAIN, EQUIPMENT CURB, OR OTHER ROOF FEATURE. OFFSET IN CEILING SPACE WHERE REQUIRED TO MEET THESE CONDITIONS. INSULATE LAST SIX FEET OF VENT PIPE INSIDE BUILDING PER SPECIFICATIONS.

3 VENT THRU ROOF
NTS



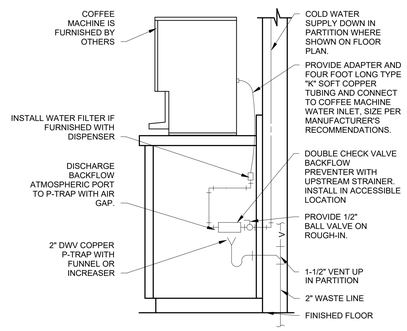
REFER TO SPECIFICATIONS FOR INSULATION TYPES, INSULATION THICKNESSES, HANGER TYPES, HANGER ROD CONNECTIONS TO STRUCTURE AND HANGER SPACING.

2 PIPE HANGER DETAIL
NTS



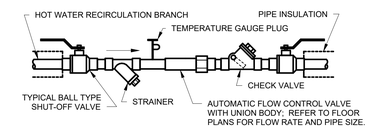
PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITONS, REFER TO SPECIFICATIONS FOR MORE INFORMATION. PIPE AND CONDUIT OF ALL TRADES MAY BE COMBINED ON THE SAME SUPPORT CHANNEL. COORDINATE SUPPORT CHANNEL LENGTH WITH PIPING AND CONDUIT TO BE SUPPORTED. SUPPORT CHANNEL SPACING SHALL BE DETERMINED BY SMALLEST PIPE TO BE SUPPORTED. CHANNEL SUPPORT MAY BE USED AS A WALL BRACKET. ATTACH TO WALL WITH ANCHOR BOLTS PER SPECIFICATIONS. FOR HORIZONTAL INSULATED PIPING, ATTACH CLAMPS AS INDICATED ABOVE, FOR VERTICAL INSULATED PIPING, ATTACH CLAMPS TO THE PIPE AND SEAL INSULATION AT BOTH CLAMP ENDS.

1 TRAPEZE PIPE HANGER
NTS



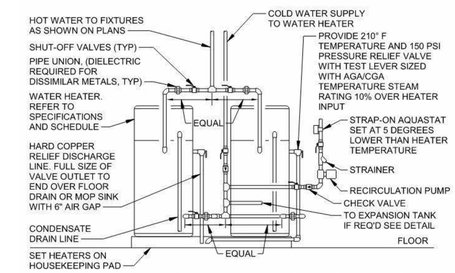
PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS. PROVIDE CONNECTIONS AS RECOMMENDED BY EQUIPMENT MANUFACTURER.

8 OVER COUNTER COFFEE MACHINE
NTS



REFER TO SPECIFICATIONS, SCHEDULES, AND NOTES FOR MORE INFORMATION. MAKE CONNECTIONS AND PROVIDE INSTALLATION PER MANUFACTURER'S RECOMMENDATIONS. ARRANGEMENT SHOWN IS SCHEMATIC. PROVIDE REDUCERS AND ADAPTERS AS REQUIRED.

6 AUTOMATIC FLOW CONTROL VALVE TRAIN
NTS



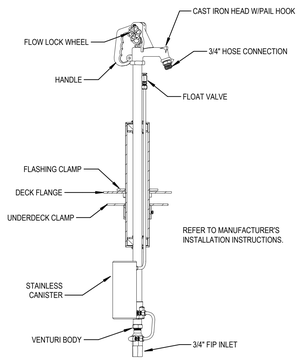
PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS. REFER TO FLOOR PLAN FOR PIPE SIZES. SET WATER HEATERS' THERMOSTAT AT 120° FAHRENHEIT. HOT AND COLD WATER BRANCH LINES SHALL BE SAME LENGTH TO EACH HEATER. PROVIDE SEISMIC STRAP OR BRACING AND FLEXIBLE CONNECTORS TO WATER CONNECTIONS IF/AS REQUIRED BY LOCAL AUTHORITIES.

REFER TO SPECIFICATIONS, SCHEDULES, AND NOTES FOR MORE INFORMATION. PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS. VERIFY CONNECTION SIZES AND LOCATIONS WITH WATER HEATER FURNISHED. REFER TO FLOOR PLANS FOR PIPE SIZES AND CONTINUATIONS. PROVIDE SEISMIC STRAP OR BRACING WHEN REQUIRED BY LOCAL AUTHORITIES. POWER WIRING AND DISCONNECT SWITCH ARE SPECIFIED BY ELECTRICAL. INTERLOCK OF AQUASTAT WITH RECIRCULATION PUMP IS SPECIFIED BY ELECTRICAL.

5 HYBRID HEAT PUMP WATER HEATER AND PUMP
NTS

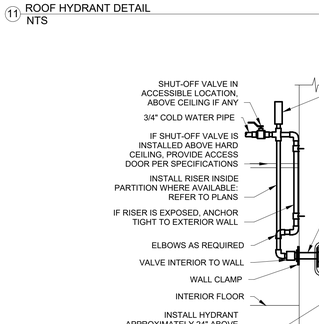
PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS. FOLLOW MANUFACTURER'S INSTRUCTIONS FOR INSTALLATION PROCEDURE. VERIFY PROPER OPERATION WHEN INSTALLED. PROVIDE SEISMIC STRAP OR BRACING WHEN REQUIRED BY LOCAL AUTHORITIES.

7 SMALL EXPANSION TANK
NTS



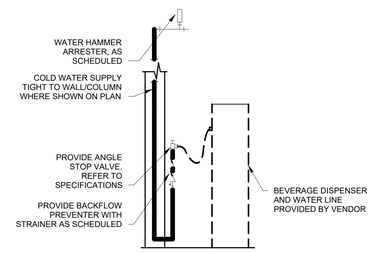
PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST AS REQUIRED TO SUIT ACTUAL INSTALLATION CONDITIONS. PROVIDE REDUCED PRESSURE ASSEMBLY OF MANUFACTURE APPROVED BY LOCAL AUTHORITIES. INSTALL WITH REQUIRED CLEARANCES, IN HORIZONTAL UPRIGHT POSITION, PER MANUFACTURER'S RECOMMENDATIONS. PROVIDE ANY REQUIRED CERTIFICATION OF TEST OF BACKFLOW PREVENTER TO LOCAL AUTHORITIES. ALL ITEMS SHALL BE APPROVED FOR DOMESTIC WATER SERVICE. INSTALL ENTIRE VALVE TRAIN SUPPORTED FROM WALL BRACKET OR FLOOR STAND. INSTALL SO THAT IT CAN BE EASILY SERVICED AND TESTED.

12 IRON PIPE DOMESTIC WATER SERVICE ENTRY
NTS



ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS. PROVIDE CONNECTIONS SHOWN IN EQUIPMENT MANUFACTURER'S INSTALLATION INSTRUCTIONS. REFER TO SPECIFICATIONS FOR PIPE AND FITTING MATERIALS AND INSTALLATION. PROVIDE DIELECTRIC UNION IF CONNECTING DISSIMILAR METALS. AT MOTORIZED EQUIPMENT ABOVE CEILING, PROVIDE NEOPRENE TUBE AND STAINLESS STEEL SCREW CLAMPS FOR FLEXIBLE CONNECTION. FOR PIPE SIZE(S) REFER TO FLOOR PLANS, OR CODE REQUIREMENTS FOR HVAC UNIT TONNAGE. PROVIDE HANGERS OR SUPPORTS PER SPECIFICATIONS. DO NOT COMBINE CONDENSATE DRAIN PIPES WITH NON-CONDENSATE INDIRECT DRAINS.

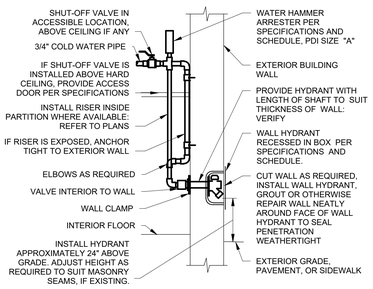
10 CONDENSATE DRAIN INSTALLATION
NTS



PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS AND EQUIPMENT MANUFACTURER'S INSTALLATION INSTRUCTIONS. AIR GAP ON INTERNAL WATER FILL DEVICE PROVIDES BACKFLOW PREVENTION. VERIFY IF LOCAL AUTHORITIES REQUIRE SUPPLEMENTAL PROTECTION.

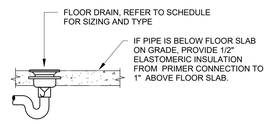
9 WATER DISPENSER CONNECTION
NTS

11 ROOF HYDRANT DETAIL
NTS



ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST AS REQUIRED TO SUIT FIELD CONDITIONS. INSTALL PER MANUFACTURER'S INSTRUCTIONS. IN NON-FREEZING CLIMATES, PIPE MAY BE INSTALLED CONCEALED IN EXTERIOR WALL RATHER THAN EXTERIOR TO WALL AS SHOWN. REFER TO PLANS FOR LOCATION.

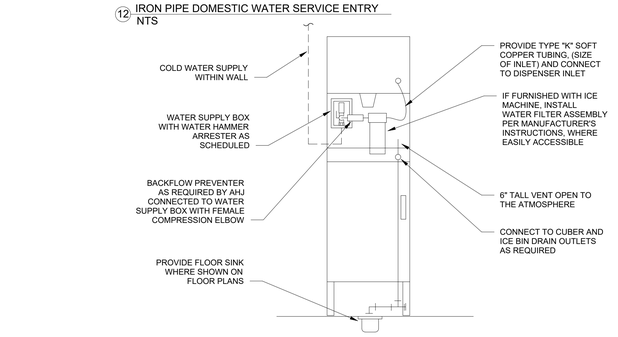
14 WALL HYDRANT INSTALLATION
NTS



PROVIDE TRAP GAURDS ON AL FLOOR DRAINS.

TO SUIT FIELD CONDITIONS. REFER TO SPECIFICATIONS AND PLUMBING FIXTURE

13 TRAP PRIMER IN/ON WALL
NTS



PIPING ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST AS REQUIRED TO SUIT ACTUAL INSTALLATION CONDITIONS AND MEET RECOMMENDATIONS OF EQUIPMENT MANUFACTURERS.

15 / P4.02 ICE MACHINE DETAIL
1/8" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
IRWIN W. HODGE JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

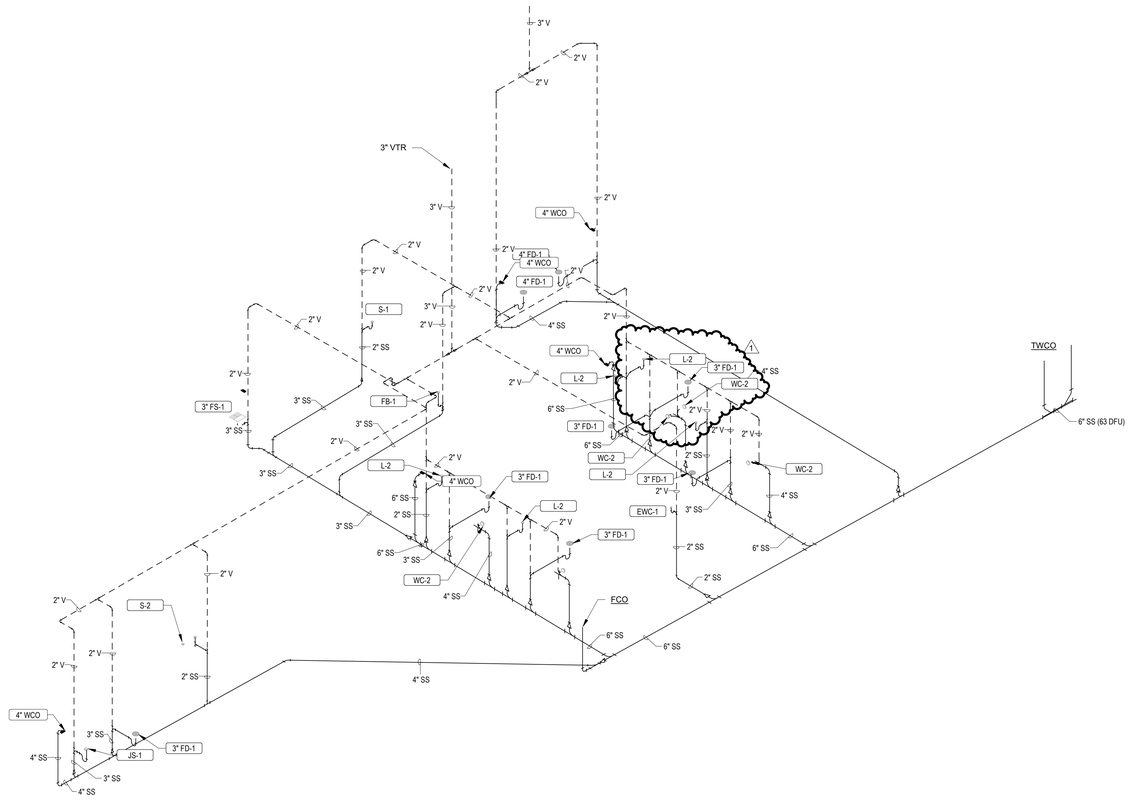
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING DETAILS

P4.02

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE SUITE 200
ROGERS, AR 72756
P: 479.899.6370
PROJECT #250428
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED IN WHOLE OR IN PART FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428



1 P5.01 WASTE & VENT RISER DIAGRAM

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DEWAIN W. HODGE, J.R.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	JDC
Checked By:	MSW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
PLUMBING DRAIN AND VENT RISER

P5.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

SEQUENCE OF OPERATIONS

RTU-1, 2 SEQUENCE OF OPERATIONS
PROVIDE ALL NECESSARY SENSORS, DAMPER ACTUATORS, CONTROL TRANSFORMERS WITH SECONDARY OVERLOAD PROTECTION, WIRING AND CONDUIT TO ACCOMPLISH THE FOLLOWING SEQUENCE OF OPERATION:

ROOFTOP UNIT
UNIT CONTROLLER SHALL BE SET TO DETERMINE OCCUPIED AND UNOCCUPIED HOURS OF OPERATION. HOURS SHALL BE COORDINATED WITH OWNER. SUPPLY FAN SHALL RUN CONTINUOUSLY AND OUTSIDE AIR DAMPER SHALL OPEN TO MINIMUM POSITION TO DELIVER SCHEDULED QUANTITY OF VENTILATION AIR. DAMPER SHALL MODULATE FROM SUPPLY FAN SPEED SHALL VARY AIRFLOW AS A FUNCTION OF LOAD. DURING NON-COOLING, FIRST STAGE COOLING, AND NON-HEATING TIMES, SUPPLY FAN SHALL RUN AT MINIMUM SPEED. DURING SECOND STAGE COOLING AND HEATING TIMES, SUPPLY FAN SHALL RUN AT FULL SPEED. OUTSIDE AIR DAMPER SHALL MODULATE POSITION TO MAINTAIN REQUIRED QUANTITY OF OUTSIDE AIR AS SUPPLY FAN SPEED VARIES.

COOLING
WHEN SPACE TEMPERATURE RISES ABOVE OCCUPIED COOLING SET POINT, PACKAGED DIRECT EXPANSION COOLING AND FAN SPEED SHALL BE ENERGIZED AND STAGED AS REQUIRED TO MAINTAIN SPACE TEMPERATURE.

ECONOMIZER
WHEN OUTSIDE AIR TEMPERATURE IS BELOW 60°F, ECONOMIZER SHALL MODULATE. BETWEEN ITS MINIMUM SET POINT AND FULL OPEN TO MAINTAIN SPACE COOLING SET POINT, SUBJECT TO A MIXED AIR TEMPERATURE LOW LIMIT CONTROLLER SET POINT OF 55°F. IF OUTDOOR TEMERATURE IS ABOVE COMPRESSOR LOCKOUT THERMOSTAT SETTING, MECHANICAL COOLING SHALL BE ENABLED AS SECOND STAGE OF COOLING.

DEHUMIDIFICATION:
WHEN SPACE HUMIDITY READING EXCEEDS 55%RH (ADJUSTABLE), REFRIGERATION SYSTEM SHALL OPERATE AND INITIATE REHEAT DEHUMIDIFICATION AS REQUIRED TO MAINTAIN SPACE HUMIDITY.

HEATING
WHEN SPACE TEMPERATURE FALLS 2 DEGREES OR MORE BELOW HEATING SETPOINT, COMPRESSORS SHALL BE ACTIVATED IN HEATING MODE. ONCE TEMPERATURE REACHES 2 DEGREES ABOVE SET POINT, COMPRESSORS SHALL BE DEACTIVATED. IF HEAT PUMP HEATING CANNOT MEET SPACE REQUIREMENTS, SCR CONTROLLER TO MODULATE HEAT AS REQUIRED TO MEET SPACE TEMPERATURE AND LIMIT MAX SUPPLY AIR TEMPERATURE TO 110F (ADJ)

AUTOMATIC SETBACK AND SHUTDOWN
CONTROLS SHALL BE CAPABLE OF STARTING AND STOPPING THE SYSTEM FOR SEVEN DIFFERENT DAILY SCHEDULES PER WEEK AND SHALL RETAIN THEIR PROGRAMMING AND TIME SETTING(S) DURING A LOSS OF POWER FOR AT LEAST 10 HOURS. CONTROLS SHALL HAVE OVERRIDE WHICH ALLOWS TEMPORARY OPERATION OF THE SYSTEM FOR UP TO TWO HOURS. THE OVERRIDE SHALL BE MANUAL AT THE CONTROLS, A MANUALLY OPERATED TIMER, OR AN OCCUPANCY SENSOR.

MORNING WARM-UP/COOL DOWN:
CONTROLS SHALL BE CAPABLE OF AUTOMATICALLY ADJUSTING THE DAILY START TIME OF THE UNIT IN ORDER TO BRING EACH SPACE TO DESIRED OCCUPIED TEMPERATURE IMMEDIATELY PRIOR TO SCHEDULED OCCUPANCY.

SMOKE DETECTOR SHUT DOWN
SMOKE DETECTOR SHAIL DE-ENERGIZE ROOFTOP UNIT SUPPLY FAN AND CLOSE OUTSIDE AIR DAMPER IN BOTH OCCUPIED AND UNOCCUPIED MODES WHENEVER SMOKE IS SENSED BY SMOKE DETECTORS.

RTU-3 THRU 8 SEQUENCE OF OPERATIONS
PROVIDE ALL NECESSARY SENSORS, DAMPER ACTUATORS, CONTROL TRANSFORMERS WITH SECONDARY OVERLOAD PROTECTION, WIRING AND CONDUIT TO ACCOMPLISH THE FOLLOWING SEQUENCE OF OPERATION:

ROOFTOP UNIT
UNIT CONTROLLER SHALL BE SET TO DETERMINE OCCUPIED AND UNOCCUPIED HOURS OF OPERATION. HOURS SHALL BE COORDINATED WITH OWNER. SUPPLY FAN SHALL RUN CONTINUOUSLY AND OUTSIDE AIR DAMPER SHALL OPEN TO MINIMUM POSITION TO DELIVER SCHEDULED QUANTITY OF VENTILATION AIR. DAMPER SHALL MODULATE FROM SUPPLY FAN SPEED SHALL VARY AIRFLOW AS A FUNCTION OF LOAD. DURING NON-COOLING, FIRST STAGE COOLING, AND NON-HEATINGTIMES, SUPPLY FAN SHALL RUN AT MINIMUM SPEED. DURING SECOND STAGE COOLING AND HEATING TIMES, SUPPLY FAN SHAL. RUN AT FULL SPEED. OUTSIDE AIR DAMPER SHALL MODULATE POSITION TO MAINTAIN REQUIRED QUANTITY OF OUTSIDE AIR AS SUPPLY FAN SPEED VARIES.

COOLING
WHEN SPACE TEMPERATURE RISES ABOVE OCCUPIED COOLING SET POINT, PACKAGED DIRECT EXPANSION COOLING AND FAN SPEED SHALL BE ENERGIZED AND STAGED AS REQUIRED TO MAINTAIN SPACE TEMPERATURE.

ECONOMIZER
WHEN OUTSIDE AIR TEMPERATURE IS BELOW 60°F, ECONOMIZER SHALL MODULATE. BETWEEN ITS MINIMUM SET POINT AND FULL OPEN TO MAINTAIN SPACE COOLING SET POINT, SUBJECT TO A MIXED AIR TEMPERATURE LOW LIMIT CONTROLLER SET POINT OF 55°F. IF OUTDOOR TEMERATURE IS ABOVE COMPRESSOR LOCKOUT THERMOSTAT SETTING, MECHANICAL COOLING SHALL BE ENABLED AS SECOND STAGE OF COOLING.

DEHUMIDIFICATION:
WHEN SPACE HUMIDITY READING EXCEEDS 55%RH (ADJUSTABLE), REFRIGERATION SYSTEM SHALL OPERATE AND INITIATE REHEAT DEHUMIDIFICATION AS REQUIRED TO MAINTAIN SPACE HUMIDITY.

HEATING
WHEN SPACE TEMPERATURE FALLS 2 DEGREES OR MORE BELOW HEATING SETPOINT, COMPRESSORS SHALL BE ACTIVATED IN HEATING MODE. ONCE TEMPERATURE REACHES 2 DEGREES ABOVE SET POINT, COMPRESSORS SHALL BE DEACTIVATED. IF HEAT PUMP HEATING CANNOT MEET SPACE REQUIREMENTS, SCR CONTROLLER TO MODULATE HEAT AS REQUIRED TO MEET SPACE TEMPERATURE AND LIMIT MAX SUPPLY AIR TEMPERATURE TO 110F (ADJ)

UNOCCUPPIED MODE
COOLING
UPON SIGNAL FROM THERMOSTAT, SUPPLY FAN SHALL BE DE-ENERGIZED AND OUTSIDE AIR DAMPER SHALL CLOSE. IF SPACE TEMPERATURE RISES 2 DEGREES OR MORE ABOVE UNOCCUPIED SETPOINT, OUTSIDE AIR DAMPER SHALL REMAIN CLOSED, SUPPLY FAN SHALL BE ACTIVATED AND DX COOLING SHALL BE STAGED AS REQUIRED. TO MAINTAIN UNOCCUPIED SPACE TEMPERATURE. WHEN TEMPERATURE FALLS 2 DEGREES BELOW SET POINT, COMPRESSOR SHALL BE DE-ENERGIZED AND SUPPLY FAN SHALL SHUT OFF. UPON SIGNAL FROM UNIT CONTROLLER, SUPPLY FAN SHALL BE DEENERGIZED AND OUTSIDE AIR DAMPER SHALL CLOSE. IF SPACE TEMPERATURE FALLS 2 DEGREES OR MORE BELOW SET POINT, OUTSIDE AIR DAMPER SHALL REMAIN CLOSED, FAN SHALL BE ACTIVATED AND HEAT PUMP HEATING SHALL BE ENERGIZED. IF SPACE TEMPERATURE CONTINUES TO DROP, ELECTRIC RESISTANCE HEATING SHALL BE ENERGIZED. HEATING SHALL OPERATE UNTIL UNOCCUPIED SPACE TEMPERATURE IS SATISFIED. WHEN TEMPERATURE RISES 2 DEGREES ABOVE SET POIN
HEATING
UPON SIGNAL FROM UNIT CONTROLLER, SUPPLY FAN SHALL BE DE-ENERGIZED AND OUTSIDE AIR DAMPER SHALL CLOSE. IF SPACE TEMPERATURE FALLS 2 DEGREES OR MORE BELOW SET POINT, OUTSIDE
AIR DAMPER SHALL REMAIN CLOSED, FAN SHALL BE ACTIVATED AND HEAT PUMP HEATING SHALL BE ENERGIZED. IF SPACE TEMPERATURE CONTINUES TO DROP, ELECTRIC RESISTANCE HEATING SHALL BE ENERGIZED. HEATING SHALL OPERATE UNTIL UNOCCUPIED SPACE TEMPERATURE IS SATISFIED. WHEN TEMPERATURE RISES 2 DEGREES ABOVE SET POINT, HEATING SHALL BE DISABLED AND FAN SHALL BE DE-ENERGIZED.

MORNING WARM-UP/COOL DOWN:
CONTROLS SHALL BE CAPABLE OF AUTOMATICALLY ADJUSTING THE DAILY START TIME OF THE UNIT IN ORDER TO BRING EACH SPACE TO DESIRED OCCUPIED TEMPERATURE IMMEDIATELY PRIOR TO SCHEDULED OCCUPANCY.

SMOKE DETECTOR SHUT DOWN
SMOKE DETECTOR SHAIL DE-ENERGIZE ROOFTOP UNIT SUPPLY FAN AND CLOSE OUTSIDE AIR DAMPER IN BOTH OCCUPIED AND UNOCCUPIED MODES WHENEVER SMOKE IS SENSED BY SMOKE DETECTORS.

BATHROOM EXHAUST
THE BATHROOM EXHAUST SHALL OPERATE CONTINUOUSLY DURING OCCUPIED HOURS. DURING UNOCCUPIED HOURS, THE FAN SHALL BE DISABLED. OCCUPANCY IS BASED UPON 7-DAY PROGRAMMABLE SCHEDULE.

PUMP ROOM EXHAUST
THE EXHAUST FAN SHALL BE ENABLED UPON REACHING SPACE COOLING SETPOINT OF 80 DEG. F (ADJ.). THE FAN SHALL RUN CONTINUOUSLY UNTIL SPACE TEMPERATURE IS 2 DEGREES BELOW SPACE SETPOINT.

THE INTAKE LOUVER AND EXHAUST LOUVER MOTORIZED DAMPERS SHALL BE OPENED WHENEVER THE FAN IS ENABLED. WHEN THE FAN IS DISABLED, THE INTAKE AND EXHAUST LOUVER DAMPERS SHALL CLOSE.

TEMPERATURE DESIGN CONDITIONS

COOLING/SUMMER – OFFICE AND ENCLOSED ASSOCIATE SPACE AREAS	75°F
COOLING/SUMMER – CONDITIONED WAREHOUSE SPACES	75.5°F
DEAD BAND – MINIMUM HEATING AND COOLING TEMPERATURE SETPOINT DIFFERENCE	5°F
HEATING/WINTER – OFFICE AND ENCLOSED ASSOCIATE SPACE AREAS	70°F
HEATING/WINTER – CONDITIONED WAREHOUSE SPACES	60°F

GENERAL NOTES

1. COORDINATE THE INSTALLATION OF THE MECHANICAL SYSTEMS WITH OTHER TRADES TO ENSURE A NEAT AND ORDERLY INSTALLATION. INSTALL DUCTWORK AND PIPING AS TIGHT TO STRUCTURE AS POSSIBLE. COORDINATE WITH OTHER TRADES TO AVOID CONFLICTS. COORDINATE INSTALLATION OF DUCTWORK AND PIPING TO AVOID CONFLICTS WITH ELECTRICAL PANELS, LIGHTING FIXTURES, ETC. ANY MODIFICATIONS REQUIRED DUE TO LACK OF COORDINATION WILL BE THE RESPONSIBILITY OF THE CONTRACTOR AT NO EXTRA COST TO THE OWNER.
2. PROVIDE TEMPORARY BARRIERS TO CONTAIN DUST AND DEBRIS RESULTING FROM THE PERFORMANCE OF THE WORK TO THE AREA WHERE WORK IS BEING PERFORMED.
3. ALL MECHANICAL EQUIPMENT SHOWN ON THE MECHANICAL PLANS SHALL BE PROVIDED BY DIVISION 23 UNLESS OTHERWISE NOTED.
4. NEW MECHANICAL EQUIPMENT, DUCTWORK AND PIPING ARE SHOWN AT APPROXIMATE LOCATIONS. FIELD MEASURE FINAL DUCTWORK AND PIPING LOCATIONS PRIOR TO FABRICATION AND MAKE ADJUSTMENTS AS REQUIRED TO FIT THE DUCTWORK AND PIPING WITHIN THE AVAILABLE SPACE. VERIFY THAT FINAL EQUIPMENT LOCATIONS MEET MANUFACTURER'S RECOMMENDATIONS REGARDING SERVICE CLEARANCE AND PROPER AIRFLOW CLEARANCE AROUND EQUIPMENT.
5. REFER TO ARCHITECTURAL DRAWINGS FOR RELATED CONSTRUCTION DETAILS AS APPLICABLE TO THE HVAC SYSTEM. VERIFY CHASES AND PENETRATIONS SHOWN ON ARCHITECTURAL DRAWINGS THAT ARE INTENDED FOR DUCTWORK AND PIPING MEET REQUIREMENTS.
6. COORDINATE LOCATION OF ROOF MOUNTED HVAC EQUIPMENT AND ROOF PENETRATIONS WITH THE ARCHITECTURAL AND STRUCTURAL DRAWINGS.
7. INDOOR AIR QUALITY MEASURES: PROTECT INSIDE OF (INSTALLED AND DELIVERED) DUCTWORK AND HVAC UNITS FROM EXPOSURE TO DUST, DIRT, PAINT AND MOISTURE. REPLACE INSULATION THAT HAS BECOME WET AT ANY TIME DURING CONSTRUCTION, DRYING THE INSULATION IS NOT ACCEPTABLE. SEAL ANY TEARS OR JOINTS OF INTERNAL FIBERGLASS INSULATION. REMOVE DEBRIS FROM CEILING/RETURN AIR PLENUM INCLUDING DUST. AN INDEPENDENT, PROFESSIONAL DUCT CLEANING COMPANY SHALL VACUUM CLEAN ANY DUCTWORK CONNECTED TO HVAC UNITS THAT WERE OPERATED DURING THE CONSTRUCTION PERIOD AFTER NEW FILTERS ARE INSTALLED AND PRIOR TO TURNING SYSTEM OVER TO THE OWNER. THE INTERNAL SURFACES AND ASSOCIATED COILS OF ANY HVAC UNITS THAT WERE OPERATED SHALL ALSO BE CLEANED.
8. INSTALL DUCTWORK AND PIPING PARALLEL TO BUILDING COLUMN LINES UNLESS OTHERWISE SHOWN OR NOTED.
9. OVERHEAD HANGERS AND SUPPORTS FOR EQUIPMENT, DUCTWORK AND PIPING SHALL BE FASTENED TO BUILDING JOISTS OR BEAMS. DO NOT ATTACH HANGERS AND SUPPORTS TO THE ABOVE FLOOR SLAB OR ROOF EXCEPT WHERE CONCRETE INSERTS IN CONCRETE SLABS ARE ALLOWED BY THE SPECIFICATIONS.
10. COORDINATE LOCATION OF EQUIPMENT SUPPORTS WITH LOCATION OF EQUIPMENT ACCESS PANELS/DOORS TO ENABLE SERVICE OF EQUIPMENT AND/OR FILTER REPLACEMENT.
11. SEAL PENETRATIONS THROUGH THE BUILDING COMPONENTS IN ACCORDANCE WITH THE CONTRACT SPECIFICATIONS. FIREPROOF PENETRATIONS THROUGH FIRE RATED COMPONENTS IN ACCORDANCE WITH U.L. REQUIREMENTS.
12. COORDINATE THE EXACT MOUNTING SIZE AND FRAME TYPE OF DIFFUSERS, REGISTERS AND GRILLES WITH THE SUPPLIER TO MEET THE CEILING, WALL AND DUCT INSTALLATION REQUIREMENTS.
13. ADJUST LOCATION OF CEILING DIFFUSERS, REGISTERS AND GRILLES AS REQUIRED TO ACCOMMODATE FINAL CEILING GRID AND LIGHTING LOCATIONS.
14. DUCTWORK CROSSING FIRE RATED WALLS OR OTHER FIRE RATED ASSEMBLIES SHALL BE MINIMUM 26 GAUGE SHEET METAL.
15. LOCATE AND SET THERMOSTATS AT LOCATIONS SHOWN ON PLANS. VERIFY EXACT LOCATIONS WITH ARCHITECT PRIOR TO INSTALLATION. INSTALL DEVICES WITH TOP OF DEVICE AT MAXIMUM 48" AFF TO MEET ADA REQUIREMENTS UNLESS NOTED OTHERWISE ON PLANS. PROVIDE INSULATED BACKING FOR THERMOSTATS MOUNTED ON EXTERIOR BUILDING WALLS. INSTALL WIRING IN CONDUIT PROVIDED BY DIVISION 26. AT A MINIMUM, PROVIDE CONDUIT IN THE WALL FROM THE JUNCTION BOX TO 6" ABOVE THE CEILING.
16. COORDINATE THE LOCATION AND ELEVATION OF WALL-MOUNTED DEVICES WITH PRESENTATION BOARDS, DISPLAY CABINETS, SHELVES OR OTHER COMPONENTS SHOWN ON THE ARCHITECTURAL DRAWINGS THAT ARE TO BE INSTALLED UNDER OTHER DIVISIONS. CONTRACTOR WILL NOT BE REIMBURSED FOR RELOCATION OF WALL-MOUNTED DEVICES CAUSED BY A LACK OF COORDINATION.
17. PROVIDE A MANUAL BALANCING DAMPER IN EACH DUCT TAKEOFF FROM SUPPLY, RETURN, OUTDOOR AND EXHAUST AIR DUCTS WHERE SHOWN ON PLAN.
18. PROVIDE A PREFABRICATED 45 DEGREE, HIGH EFFICIENCY, RECTANGULAR/ROUND BRANCH DUCT TAKEOFF FITTING FOR BRANCH DUCT CONNECTIONS AND TAKE-OFFS TO INDIVIDUAL DIFFUSERS, REGISTERS AND GRILLES. PROVIDE WITH INTEGRAL MANUAL BALANCING DAMPER AND LOCKING QUADRANT WHERE INDICATED ON PLANS.
19. BRANCH DUCTWORK TO AIR OUTLETS SHALL BE SAME SIZE AS OUTLET NECK SIZE UNLESS OTHERWISE NOTED.
20. REFER TO SPECIFICATIONS FOR DUCTWORK AND PIPING INSULATION REQUIREMENTS. DUCT SIZES ON MECHANICAL PLANS INDICATE CLEAR INSIDE AIRFLOW DIMENSIONS, INCREASE SHEET METAL SIZES ACCORDINGLY TO ACCOUNT FOR THICKNESS OF DUCT LINER WHERE SPECIFIED.
21. FLEXIBLE DUCTWORK SHALL NOT EXCEED 5'-0" IN LENGTH AND SHALL BE INSTALLED AND SUPPORTED TO AVOID SHARP BENDS AND SAGGING. REFER TO SPECIFICATIONS FOR ADDITIONAL REQUIREMENTS.
22. RIGIDLY SUSPEND UNIT HEATER FROM STRUCTURE WITH SUPPORTING ANGLES AND ALL-THREAD HANGING RODS IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS.
23. PROVIDE A NEW SET OF AIR FILTERS IN UNITS PRIOR TO TESTING, ADJUSTING AND BALANCING AND BEFORE TURNING SYSTEM(S) OVER TO OWNER.

MECHANICAL SYMBOLS

THIS IS A MASTER LEGEND AND NOT ALL SYMBOLS OR ABBREVIATIONS ARE USED. V2.06

STANDARD MOUNTING HEIGHT

THERMOSTATS (USER ADJUSTABLE)(TOP OF DEVICE)	48"
CONTROLS (TOP OF DEVICE)	48"

INSTALL DEVICES AT THE MOUNTING HEIGHTS SHOWN ABOVE UNO IN THE CONSTRUCTION DOCUMENTS. MOUNTING HEIGHTS LISTED ABOVE OR ELSEWHERE IN THE CONSTRUCTION DOCUMENTS ARE AFF OR AFG TO BOTTOM OF DEVICE UNO. ALL DEVICES SHALL BE INSTALLED IN COMPLIANCE WITH CURRENT ADA AND LOCAL REQUIREMENTS.

ANNOTATION

- (1) MECHANICAL PLAN NOTE CALLOUT
- (CU / 1) MECHANICAL EQUIPMENT DESIGNATION (CONTRACTOR FURNISHED AND INSTALLED UNLESS NOTED OTHERWISE)
- CONNECTION POINT OF NEW WORK TO EXISTING
- (1 / M1) DETAIL REFERENCE. UPPER NUMBER INDICATES DETAIL NUMBER LOWER NUMBER INDICATES SHEET NUMBER
- (1 / M1) SECTION CUT DESIGNATION

ABBREVIATIONS

A/C	AIR CONDITIONING
ACC	AIR COOLED CHILLER
ACCU	AIR COOLED CONDENSING UNIT
AFC	ABOVE FINISHED CEILING
AFF	ABOVE FINISHED FLOOR
AFG	ABOVE FINISHED GRADE
AHJ	AUTHORITY HAVING JURISDICTION
AHU	AIR HANDLING UNIT
AI	ANALOG INPUT
AO	ANALOG OUTPUT
APD	AIR PRESSURE DROP
AWG	AMERICAN WIRE GAUGE
BAS	BUILDING AUTOMATION SYSTEM
BD	BACKDRAFT DAMPER
BFC	BELOW FINISHED CEILING
BFF	BELOW FINISHED FLOOR
BFG	BELOW FINISHED GRADE
BHP	BRAKE HORSEPOWER
BI	BINARY INPUT
BO	BINARY OUTPUT
BOD	BOTTOM OF DUCT
BOS	BOTTOM OF STRUCTURE
BTU	BRITISH THERMAL UNIT
CFM	CUBIC FEET PER MINUTE
CLG	COOLING
CP	CONDENSATE PUMP
CPT	CONTROL POWER TRANSFORMER
CRU	COMPUTER ROOM UNIT
CU	CONDENSING UNIT
DB	DECIBELS
DBA	DECIBEL AVERAGE
DDC	DIRECT DIGITAL CONTROL
DI	DIGITAL INPUT
DISC	DISCONNECT
DX	DIRECT EXPANSION
(E)	EXISTING
EA	EXHAUST AIR
EAT	ENTERING AIR TEMPERATURE
EDB	ENTERING DRY BULB
EF	EXHAUST FAN
EFF	EFFICIENCY
EMS	ENERGY MANAGEMENT SYSTEM
ESP	EXTERNAL STATIC PRESSURE
ETR	EXISTING TO REMAIN
EWB	ENTERING WET BULB
FCU	FAN COIL UNIT
FF	FINISHED FLOOR
FPI	FINS PER INCH
FPM	FEET PER MINUTE
GC	GENERAL CONTRACTOR
GPM	GALLONS PER MINUTE
HP	HORSEPOWER
HTG	HEATING
IN WC	INCHES OF WATER COLUMN
LAT	LEAVING AIR TEMPERATURE
LDB	LEAVING DRY BULB
LP	LOW PRESSURE
LWB	LEAVING WET BULB
MAU	MAKE-UP AIR UNIT
MAX	MAXIMUM
MBH	1000 BTU PER HOUR
MD	MOTORIZED DAMPER
MFR	MANUFACTURER
MIN	MINIMUM
N/A	NOT APPLICABLE
N/C	NORMALLY CLOSED
N/O	NORMALLY OPEN
NOM	NOMINAL
NC	NOISE CRITERIA
NF	NON-FUSED
NIC	NOT IN CONTRACT
OA	OUTSIDE AIR
PROVIDE	FURNISH AND INSTALL
QTY	QUANTITY
RA	RETURN AIR
RC	ROOM CRITERIA
REA	RELIEF AIR
RF	RETURN FAN
RFR	REFRIGERANT
RH	RELATIVE HUMIDITY
RH	ROOF HOOD
RPM	REVOLUTIONS PER MINUTE
RTU	ROOFTOP UNIT
SA	SUPPLY AIR
SCP	STEAM CONDENSATE PUMP
SD	SMOKE DUCT DETECTOR
SF	SUPPLY FAN
SH	SENSIBLE HEAT CAPACITY
SOW	SCOPE OF WORK
SP	STATIC PRESSURE
TBD	TO BE DETERMINED
TF	TRANSFER FAN
TFA	TO FLOOR ABOVE
TFB	TO FLOOR BELOW
TH	TOTAL HEAT CAPACITY
TSP	TOTAL STATIC PRESSURE
TYP	TYPICAL
UH	UNIT HEATER
UNO	UNLESS NOTED OTHERWISE
VAV	VARIABLE AIR VOLUME
VEL	VELOCITY
VFD	VARIABLE FREQUENCY DRIVE
VRF	VARIABLE REFRIGERANT FLOW
W/	WITH
W/O	WITHOUT
WB	WET BULB
WC	WATER COLUMN

LINETYPE LEGEND

THROUGHOUT THE DRAWINGS DIFFERENT LINETYPES ARE USED IN COMBINATION WITH THE SYMBOLS TO INDICATE THE STATUS OF ITEMS AS EXISTING, TO BE DEMOLISHED, TO BE INCLUDED AS PART OF NEW WORK AND/OR ITEMS WHICH ARE ANTICIPATED TO BE PROVIDED IN THE FUTURE. THE STATUS OF ITEMS USING THESE LINETYPES ARE RELATIVE TO THE VIEW IN WHICH THEY APPEAR. PHASING SHOWN IN DRAWINGS IS NOT INTENDED TO FULLY DESCRIBE ALL NECESSARY CONSTRUCTION PHASING, WHICH IS DETERMINED BY THE CONTRACTOR AS PART OF THEIR RESPONSIBILITIES. ANY SUCH PHASES DESCRIBED IN THE CONSTRUCTION DOCUMENTS ARE GENERAL AND ONLY INTENDED TO INDICATE A BROAD ORDER FOR THE SAKE OF DESCRIBING THE PROJECT. THE FOLLOWING LINETYPES MAY BE USED ON ANY DEVICE, EQUIPMENT, NOTE, LINE, SHAPE, ETC.

EXISTING	NEW
DEMOLISH	FUTURE

HVAC DUCTWORK AND ACCESSORIES

- LINEAR SLOT DIFFUSER
- INSULATED FLEXIBLE DUCT (MAX. 5'-0" LONG)
- BRANCH DUCT WITH 45° RECTANGLE-ROUND BRANCH FITTING AND MANUAL VOLUME DAMPER
- ELBOW WITH TURNING VANES
- BRANCH DUCT WITH BELL-MOUTH FITTING & MANUAL VOLUME CONTROL DAMPER
- RETURN, EXHAUST, OR OUTSIDE AIR DUCT UP
- RETURN, EXHAUST, OR OUTSIDE AIR DUCT DOWN
- SUPPLY AIR DUCT UP
- SUPPLY AIR DUCT DOWN
- EQUIPMENT WITH FLEXIBLE DUCT CONNECTION
- 10" (NECK SIZE) CSD-1 (TYPE) 300 CFM (CFM OF SUPPLY DIFFUSER OR REGISTER)
- 24x24 (NECK SIZE) CEG-1 (TYPE) 800 CFM (CFM OF EXHAUST GRILLE)
- MANUAL VOLUME DAMPER
- SQUARE TO ROUND TRANSITION
- (RD) DUCT MOUNTED SMOKE DETECTOR (SD=SUPPLY/RD=RETURN)
- XX" ø ROUND DUCT TAG INDICATING DIAMETER
- XX" x XX" RECTANGULAR DUCT TAG INDICATING INTERNAL DUCT DIMENSIONS.
- XX' / XX" FLAT OVAL DUCT TAG INDICATING INTERNAL DUCT DIMENSIONS
- (#) RISER DESIGNATION
- (FD) FIRE DAMPER
- (FSD) FIRE SMOKE DAMPER
- (SD) SMOKE DAMPER
- (VD) VOLUME DAMPER
- (MD) MOTORIZED DAMPER
- (BD) BACKDRAFT DAMPER

ALL DUCT DIMENSIONS SHOWN ON DRAWINGS ARE INSIDE DIMENSIONS. REFER TO DUCTWORK SPECIFICATIONS FOR DUCTWORK INSULATION AND LINER INFORMATION.

HVAC CONTROL DEVICES

- (H) HUMIDISTAT
- (T) THERMOSTAT
- (CO) CARBON MONOXIDE SENSOR
- (CO2) CARBON DIOXIDE SENSOR
- (DP) DIFFERENTIAL PRESSURE SENSOR
- (HS) HUMIDITY SENSOR
- (SP) STATIC PRESSURE
- (TS) TEMPERATURE SENSOR
- (NO2) NITROGEN DIOXIDE SENSOR
- (PA) POLLUTANT ALARM

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DARWIN W. HODGE, JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
MECHANICAL LEGEND

M0.01

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

GRILLE, REGISTER AND DIFFUSER SCHEDULE

MARK	MANUFACTURER	MODEL	FACE TYPE	MOUNTING LOCATION	FACE SIZE (IN)	NOTES
E-1	TITUS	50F	PERFORATED	CEILING	12"x12"	A-D
R-1	TITUS	50F	PERFORATED	LAY IN	24"x24"	A-E
R-2	TITUS	50F	PERFORATED	CEILING	12"x12"	A-D
S-1	TITUS	OMNI	PLAQUE	LAY IN	24"x24"	A-D
S-2	TITUS	OMNI	PLAQUE	CEILING	12"x12"	A-D
S-3	KEES	DBD-44-LL	DRUM	DUCT	-	A-C

MODEL NUMBERS SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER AND MODEL NUMBERS ONLY. REVIEW THE COMPLETE DESCRIPTION, NOTES AND SPECIFICATIONS TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE MANUFACTURERS LISTED ARE THE BASIS FOR THE DESIGN.
NOTES:

A. 4-WAY THROW PATTERN UNLESS OTHERWISE INDICATED BY FLOW ARROWS ON DRAWINGS.
B. NECK SIZE SHOWN ON DRAWINGS. PROVIDE BRANCH DUCT TO MATCH NECK SIZE UNLESS OTHERWISE SHOWN ON DRAWINGS.
C. BAKED ENAMEL FINISH, WHITE TO MATCH CEILING COLOR.
D. FRAME TYPE TO MATCH CEILING/WALL CONSTRUCTION, COORDINATE WITH ARCHITECTURAL REFLECTED CEILING/WALL PLAN.
E. PROVIDE OPPOSED BLADE DAMPER INTEGRAL TO DIFFUSER ADJUSTABLE FROM FACE OF DEVICE.

HEAT PUMP ROOFTOP UNIT SCHEDULE (WITH AUX. ELECTRIC HEAT)

					SUPPLY FAN					POWERED EXHAUST FAN		COOLING COIL					HEAT PUMP HEATING COIL				AUXILIARY HEATING COIL	EMERGENCY HEATING CAPACITY	ELECTRICAL					
														EAT		LAT												
ID	MANUFACTURER	MODEL	EER (EER2)	IEER (SEER2)	CFM	OA	ESP (IN)	HP	ECONOMIZER	EF CFM	EF HP	TOTAL CAPACITY (MBH)	SENSIBLE CAPACITY	(°F DB)	(°F WB)	(°F DB)	(°F WB)	REFR TYPE	TOTAL HEATING CAPACITY (MBH)	AMBIENT (DB)	EAT (°F DB)	LAT (°F DB)	NOM (KW)	NOM (KW)	V/PH	MCA	MOCP	WEIGHT (LBS)	NOTES
RTU 1	AAON	RNA-008	10.7	14.1	1900	600	1.00	2.0	YES	1900	1	89.6	62.2	82.7	67.0	49.6	49.6	R-454B	67.1	9.0	55.0	73.0	10.0	20	460/3	40	45	1500	A-P
RTU 2	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P
RTU 3	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P
RTU 4	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P
RTU 5	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P
RTU 6	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P
RTU 7	AAON	RNA-15	10.7	13.5	5335	500	1.00	5.0	YES	5000	3	169.5	130.8	77.6	64.0	54.0	52.0	R-454B	409.5	2.0	45.4	94.8	20.0	60	460/3	88	100	2500	A-P

MODEL NUMBERS AND NOMINAL TONS LISTED SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER, MODEL NUMBERS, OR NOMINAL TONS ONLY. REVIEW THE COMPLETE DESCRIPTION, NOTES AND SPECIFICATIONS TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE MANUFACTURERS LISTED ARE THE BASIS FOR THE DESIGN.

NOTES:

A. REFER TO ROOFTOP UNIT CONTROL MATRIX FOR CONTROL FEATURES, MODULES, AND ACCESSORIES THAT SHALL BE PROVIDED WITH THE EQUIPMENT.
B. EQUIPMENT SIZED FOR 95 DB AMBIENT TEMPERATURE.
C. PROVIDE 2 INCH MERV 13, EFFICIENT PLEATED THROWAWAY AIR FILTERS.
D. PROVIDE FACTORY MOUNTED DISCONNECT INSTALLED ON SERVICE SIDE OF UNIT.
E. WHERE NOT SPECIFIED AND PROVIDED WITH A VFD, PROVIDE STARTERS FOR ALL MOTORS SHALL BE FURNISHED INTEGRAL WITH UNIT.
F. PROVIDE SINGLE POINT POWER CONNECTION.
G. COORDINATE SIZE OF CONDUCTOR TERMINATION LUGS WITH CONDUCTOR SIZES SHOWN ON ELECTRICAL DRAWINGS.
H. PROVIDE 125 VAC, 20 AMP DUPLEX CONVENIENCE RECEPTACLE MOUNTED TO UNIT READY FOR FIELD WIRING WITH A COVER UL LISTED FOR WET AND DAMPER LOCATIONS WHEN IN USE.
I. SPECIFIED FAN ESP ACCOUNTS FOR DUCT LOSSES EXTERNAL TO UNIT.
J. PROVIDE MOTOR HORSEPOWER TO OVERCOME INTERNAL UNIT STATIC PRESSURE DROP PLUS SPECIFIED EXTERNAL STATIC PRESSURE DROP. NOMINAL MOTOR HP SHALL BE NO LARGER THAN THE FIRST AVAILABLE NOMINAL MOTOR SIZE GREATER THAN THE REQUIRED BHP.
K. PROVIDE INSULATED ROOF CURB WITH MINIMUM HEIGHT REQUIRED TO MAINTAIN BOTTOM OF EQUIPMENT A MINIMUM OF 16 INCHES ABOVE FINISHED ROOF SURFACE. PROVIDE SLOPED CURB IF NEEDED TO MATCH ROOF SLOPE. COORDINATE WITH ROOF INSULATION THICKNESS AND ROOF TAPER AT INSTALLED LOCATION. COORDINATE CURB TYPE WITH DRAWINGS.
L. SCHEDULED WEIGHT IS THE MAXIMUM ALLOWABLE OPERATING WEIGHT OF THE EQUIPMENT ALONG WITH AN ESTIMATED CURB WEIGHT ADDED.
M. COOLING COIL LAT IS LEAVING AIR TEMPERATURE OF COIL.
N. AUXILIARY ELECTRIC HEATING COIL SIZED FOR FULL BACKUP ELECTRIC HEAT. FOR USE WHEN HEAT PUMP ENTERS DEFROST MODE. AMBIENT DESIGN TEMPERATURE FOR AUXILIARY HEAT SIZING SHALL BE -22 DEG. F
O. TOTAL HEATING CAPACITY INCLUDES THE HEAT PUMP HEATING COIL CAPACITY AT THE AMBIENT DRY BULB TEMPERATURE LISTED. HEAT PUMP HEATING COIL MINIMUM EFFICIENCY IS CALCULATED AT 47°F.
P. PROVIDE WITH MODULATING HOT-GAS REHEAT.

FAN SCHEDULE

MARK	MANUFACTURER	MODEL	FAN TYPE	DRIVE (BELT/DIRECT)	CFM	ESP (IN)	NOM HP	FAN RPM	ELECTRICAL V/PH	FLA (AMPS)	MCA	MOCP	WEIGHT (LBS)	NOTES
EF 1	GREENHECK	G-098-VG	ROOFTOP	DIRECT	360	0.75	0.10	1428	115/1	3.8	4.8 A	15.0 A	50	A,B,D-H
EF 2	GREENHECK	SQ-160-VG	INLINE	DIRECT	4670	0.35	2.00	1725	460/3	3.4	4.2 A	15.0 A	160	C-G

MODEL NUMBERS SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER AND MODEL NUMBERS ONLY. REVIEW THE COMPLETE DESCRIPTION, NOTES AND SPECIFICATIONS TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE MANUFACTURERS LISTED ARE THE BASIS FOR THE DESIGN.
NOTES:
A. PROVIDE INSULATED ROOF CURB WITH MINIMUM HEIGHT REQUIRED TO MAINTAIN BOTTOM OF EQUIPMENT A MINIMUM OF 16 INCHES ABOVE FINISHED ROOF SURFACE. PROVIDE SLOPED CURB IF NEEDED TO MATCH ROOF SLOPE. COORDINATE WITH ROOF INSULATION THICKNESS AND ROOF TAPER AT INSTALLED LOCATION. COORDINATE CURB TYPE WITH DRAWINGS.
B. PROVIDE FACTORY INSTALLED BIRDSCREEN AND GRAVITY BACKDRAFT DAMPER.
C. PROVIDE RUBBER IN SHEAR ISOLATION AND ALL-THREAD HANGING RODS.
D. PROVIDE FACTORY MOUNTED DISCONNECT SWITCH.
E. PROVIDE WITH MANUFACTURER'S FAN SPEED CONTROLLER FOR BALANCING PURPOSES.
F. PROVIDE WITH MANUFACTURER'S ELECTRONICALLY COMMUTATED (EC) MOTOR.
G. NOMINAL MOTOR HP SHALL BE NO LARGER THAN THE FIRST AVAILABLE NOMINAL MOTOR SIZE GREATER THAN THE BHP.
H. FAN TO RUN CONTINUOUSLY DURING OCCUPIED HOURS.

CIRCULATION FAN SCHEDULE

MARK	MANUFACTURER	MODEL	FAN TYPE	DRIVE (BELT/DIRECT)	CFM	ESP (IN)	NOM HP	FAN RPM	ELECTRICAL V/PH	FLA (AMPS)	MCA	MOCP	WEIGHT (LBS)	NOTES
CF 1	DAYTON	1RWB4	CIRCULATION	DIRECT	4650		0.25	1100	120/1	2.9		15.0 A		A, B

MODEL NUMBERS SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER AND MODEL NUMBERS ONLY. REVIEW THE COMPLETE DESCRIPTION, NOTES AND SPECIFICATIONS TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE MANUFACTURERS LISTED ARE THE BASIS FOR THE DESIGN.
NOTES:
A. FAN MOUNTED TO COLUMN, INCLUDE ANY HARDWARE NESSISARY. MOUNT AT 9' UNLESS OTHERWISE COORDINATED WITH ARCH/OWNER.
B. PROVIDE WITH MANUFACTURER'S FAN SPEED CONTROLLER FOR BALANCING PURPOSES.

LOUVER SCHEDULE

ID	MANUFACTURER	MODEL NO.	MATERIAL	TYPE	FREE AREA	FREE AREA VELOCITY	PD	DIMENSIONS WIDTH	DIMENSIONS HEIGHT	NOTES
L-1	RUSKIN	EME520DD	ALUMINUM	WIND-DRIVEN	8.6 SF	546 FPM	0.10 in-wg	6' - 4"	3' - 0"	1, 2, 3
L-2	RUSKIN	EME520DD	ALUMINUM	WIND-DRIVEN	8.6 SF	546 FPM	0.10 in-wg	6' - 4"	3' - 0"	1, 2, 3

NOTES:
1. COORDINATE COLOR OF KYNAR WITH ARCHITECT.
2. PROVIDE WITH EXTENDED SILL AND BIRD SCREEN.
3. PROVIDE WITH 24VAC TWO POSITION MOTORIZED DAMPERS INTERLOCKED WITH EF-2

HVLS FAN SCHEDULE

MARK	MANUFACTURER	MODEL	MOUNTING	NOM HP	FAN RPM	DRIVE (BELT/DIRECT)	VFD (Y/N)	ELECTRICAL V/PH	ELECTRICAL MCA	ELECTRICAL MOCP	WEIGHT (LBS)	NOTES
HVLS 1	GREENHECK	DS-6-20	BEAM	0.75	78	DIRECT	Yes	480/3	4.0 A	15.0 A	280	A-G

MODEL NUMBERS SHALL NOT BE CONSIDERED COMPLETE AND MATERIAL SHALL NOT BE ORDERED BY MANUFACTURER AND MODEL NUMBERS ONLY. REVIEW THE COMPLETE DESCRIPTION, NOTES AND SPECIFICATIONS TO DETERMINE THE EXACT MATERIAL AND ACCESSORIES TO BE ORDERED. THE MANUFACTURERS LISTED ARE THE BASIS FOR THE DESIGN.
NOTES:
A. PROVIDE FACTORY MOUNTED VFD.
B. PROVIDE FACTORY MOUNTED NEMA 3R DISCONNECT SWITCH. INSTALL SWITCH OUTSIDE OF FAN RADIUS.
C. PROVIDE WITH MANUFACTURER STANDARD MOUNTING KIT.
D. PROVIDE WITH OVERHEAD FAN ADVANCED TOUCHSCREEN CONTROL WITH BACNET COMPATIBLE SPEED CONTROLLER, MOUNTING KIT, AND PRE-TERMINATED CONTROL WIRE AT LENGTHS REQUIRED FOR INSTALLATION PER MANUFACTURER INSTALLATION INSTRUCTIONS.
E. PROVIDE WITH MANUFACTURER STANDARD WINGLETS.
F. PROVIDE 48 INCH EXTENSION ROD MOUNTED TO STRUCTURE TO MAINTAIN MINIMUM 3 FEET VERTICAL CLEARANCE BETWEEN FIRE SPRINKLER DEFLECTOR PLATES AND FAN BLADES.
G. PROVIDE WITH AUXILIARY CONTACTS FOR SHUTDOWN UPON NOTIFICATION FROM FIRE ALARM SYSTEM.

ELECTRIC UNIT HEATER SCHEDULE

ID	MANUFACTURER	MODEL NO.	HEATING ELEMENT POWER	UNIT DIMENSIONS AFF ELEVATION	UNIT WEIGHT	FLA	VOLT	PH	NOTES
UH-1	QMARK	IUH-2548	25.0 kW	19' - 0"	75 lb	31.1 A	480 V	3	1, 2, 4
UH-2	QMARK	IUH-2548	25.0 kW	19' - 0"	75 lb	31.1 A	480 V	3	1, 2, 4
UH-3	QMARK	IUH-2548	25.0 kW	19' - 0"	75 lb	31.1 A	480 V	3	1, 2, 4
UH-4	QMARK	IUH-2548	25.0 kW	19' - 0"	75 lb	31.1 A	480 V	3	1, 2, 4
UH-5	QMARK	MUH0581	5.0 kW	9' - 0"	30 lb	24.0 A	208 V	1	1, 2, 4
UH-6	QMARK	MUH0581	5.0 kW	9' - 0"	30 lb	24.0 A	208 V	1	1, 2, 4
UH-7	QMARK	CWH3404F	1.5 kW	1' - 0"	25 lb	12.5 A	208 V	1	1, 3

NOTES:
1. PROVIDE INTERNAL SINGLE STAGE THERMOSTAT 55° SET-POINT, INTERGAL DISCONNECT SWITCH.
2. PROVIDE MANUFACTURE'S HANGING BRACKET FOR MOUNTING UNIT AT DESIRED HEIGHT.
3. PROVIDE EXTENSION SLEEVE FOR FULL SURFACE MOUNTING
4. 45 DEGREE THROW

INDOOR UNIT HEAT PUMP SCHEDULE

ID	MANUFACTURER	MODEL NO.	SEER	AIR FLOW (CFM)	DX COOLING COIL EAT F (DB/WB)	DX COOLING COIL TOTAL (BTU/HR)	DX COOLING COIL SENSIBLE (BTU/HR)	VOLTAGE	PHASE	UNIT WEIGHT	INTERLOCK ID	NOTES
FCU-1	MITSUBISHI	PKA-A24KA7	21.4	700 CFM	80/67	24,000	18,000	208 V	1	50 lb	CU-1	1-7

NOTES:
1. REFER TO SPECIFICATIONS FOR ALTERNATE MANUFACTURERS.
2. PROVIDE SERVICE DISCONNECT SWITCH.
3. SEVEN DAY PROGRAMMABLE THERMOSTAT WITH EXTERNAL CONTACTOR, CAPABILITY OF OA DAMPER CONTROL WITH OCC/UNOCC MODES.
4. ROUTE CONDENSATE TO NEAREST MOP SINK OR CONDENSATE BOX.
5. IF CONDENSATE PUMP IS NECESSARY, PROVIDE MODEL TO MATCH VOLTAGE OF INDOOR UNIT OR TRANSFORMER IF NECESSARY.
6. INDOOR UNIT POWERED BY OUTDOOR.
7. PROVIDE WITH DELUXE WIRED REMOTE CONTROLLER.

OUTDOOR UNIT HEAT PUMP SCHEDULE

ID	MANUFACTURER	MODEL NO.	TOTAL (BTU/HR)	SEER	AMBIENT OAT F (DB)	HEAT PUMP HEAT OUTPUT @ 17F	HEAT PUMP HEAT OUTPUT @ 47F	HSPF	PHYSICAL DATA NO. OF FANS	PHYSICAL DATA NO. OF COMP.	ELECTRICAL MCA	ELECTRICAL MOCP	ELECTRICAL VOLT	ELECTRICAL PH	ELECTRICAL UNIT WEIGHT	INTERLOCK ID	NOTES
CU-1	MITSUBISHI	PUZ-A24NHA7	24000 Btu/h	21.4	100	9000	26000	8.2	1	1	19.0 A	25.0 A	208 V	1	160 lb	FCU-1	1-5

NOTES:
1. INDOOR UNIT POWERED BY THE OUTDOOR UNIT.
2. PROVIDE LIQUID LINE SIGHT GLASS, MOISTURE INDICATOR AND FILTER DRYER FOR EACH CIRCUIT.
3. PROVIDE WIND BAFFLE FOR LOW AMBIENT OPERATION DOWN TO 0° F.
4. PROVIDE 5 MINUTE TIME DELAY ON COMPRESSOR RESTART.
5. DISCONNECT SWITCH PROVIDED BY ELECTRICAL CONTRACTOR.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
BRIAN W. HODGE, JR.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME
TRAMMELL CROW
2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
MECHANICAL SCHEDULES

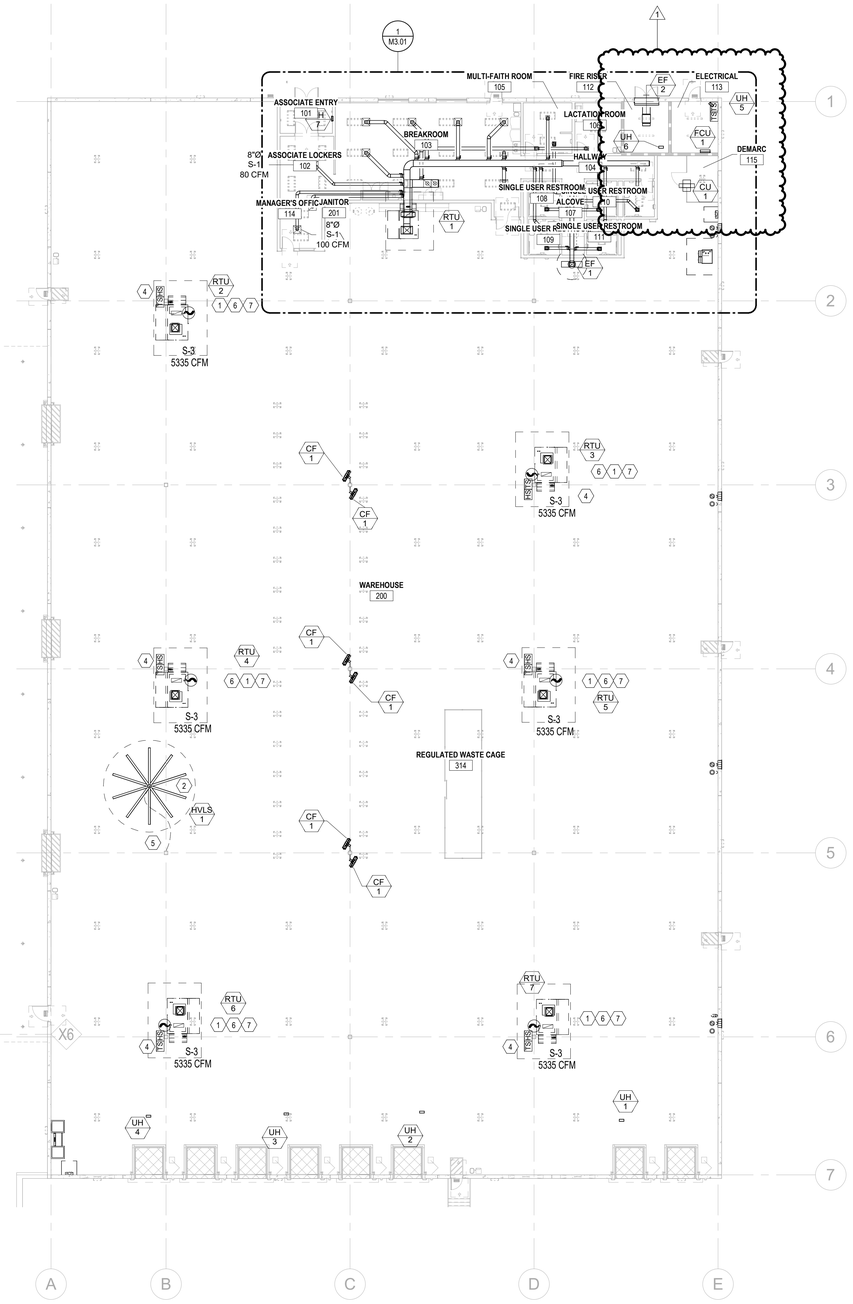
M0.02

IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON, AND DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

KEYNOTES

1. PROVIDE DROPBOX DIFFUSER. SEE DETAIL ON SHEET M4.01 FOR MORE INFORMATION. MOUNT BOTTOM OF DIFFUSER APPROXIMATELY 3'-0" BELOW LOWEST STRUCTURE. POSITION DROP BOX DIFFUSER LOUVERS AT 15 DEGREES DOWN.
2. ATTACH TO STRUCTURE WHERE SHOWN. COORDINATE EXACT PLACEMENT WITH STRUCTURE AND LIGHTING PRIOR TO INSTALLATION. ENSURE THAT A MINIMUM 3'-0" CLEARANCE IS MAINTAINED ON ALL SIDES. ENSURE A MINIMUM 3'-0" VERTICAL CLEARANCE FROM FAN TO SPRINKLER DEFLECTOR IS MAINTAINED. ENSURE THAT A MINIMUM 8'-0" CLEARANCE FROM FAN TO DROP CORDS IS MAINTAINED. REFER TO SCHEDULE FOR MOUTING ROD LENGTH.
3. PROPOSED LOCATION OF BAS PANEL. COORDINATE EXACT LOCATION IN FIELD WITH CONTROLS AND ELECTRICAL CONTRACTORS.
4. PROVIDE COMBINATION TEMPERATURE AND HUMIDITY SENSOR ON COLUMN. COMBINATION SENSOR SHALL BE COMPATIBLE WITH UNIT CONTROLLER AND BMS. MOUNT BOTTOM OF SENSOR AT 84" ABOVE FINISHED FLOOR.
5. PROVIDE FAN CONTROL POWER SWITCH ON COLUMN. MOUNT FAN CONTROL POWER SWITCH 48" ABOVE FINISHED FLOOR.
6. DUCT MOUNTED SMOKE DETECTOR FURNISHED BY FIRE ALARM CONTRACTOR AND INSTALLED IN DUCT BY MECHANICAL CONTRACTOR. INTERLOCK WIRING BETWEEN FIRE ALARM SYSTEM RELAY AND UNIT SHUTDOWN CONTACT SHALL BE PROVIDED BY MECHANICAL CONTRACTOR. ALL OTHER WIRING BY FIRE ALARM CONTRACTOR. UPON DETECTION OF SMOKE, UNIT SHALL SHUT DOWN UPON SIGNAL FROM FIRE ALARM SYSTEM.
7. PROVIDE RETURN AIR BOOT WITH ACOUSTICAL DUCT LINER. LINER SHALL BE 1" THICK 2 PCF DENSITY, LONG TEXTILE TYPE FIBER, WITH SURFACE CLEANABLE PER NAIMA DUCT CLEANING GUIDELINES. INSTALL LINER IN ACCORDANCE WITH SMACNA DUCT CONSTRUCTION STANDARDS. LAMINATE LINER TO INTERNAL SURFACES OF DUCT IN ACCORDANCE WITH LINER MANUFACTURER'S INSTRUCTIONS, AND FASTEN WITH MECHANICAL FASTENERS.



1 M1.01 LEVEL 1 HVAC PLAN
1/16" = 1'-0"

PROJECT NORTH

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE, I.V.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
LEVEL 1 HVAC PLAN

M1.01

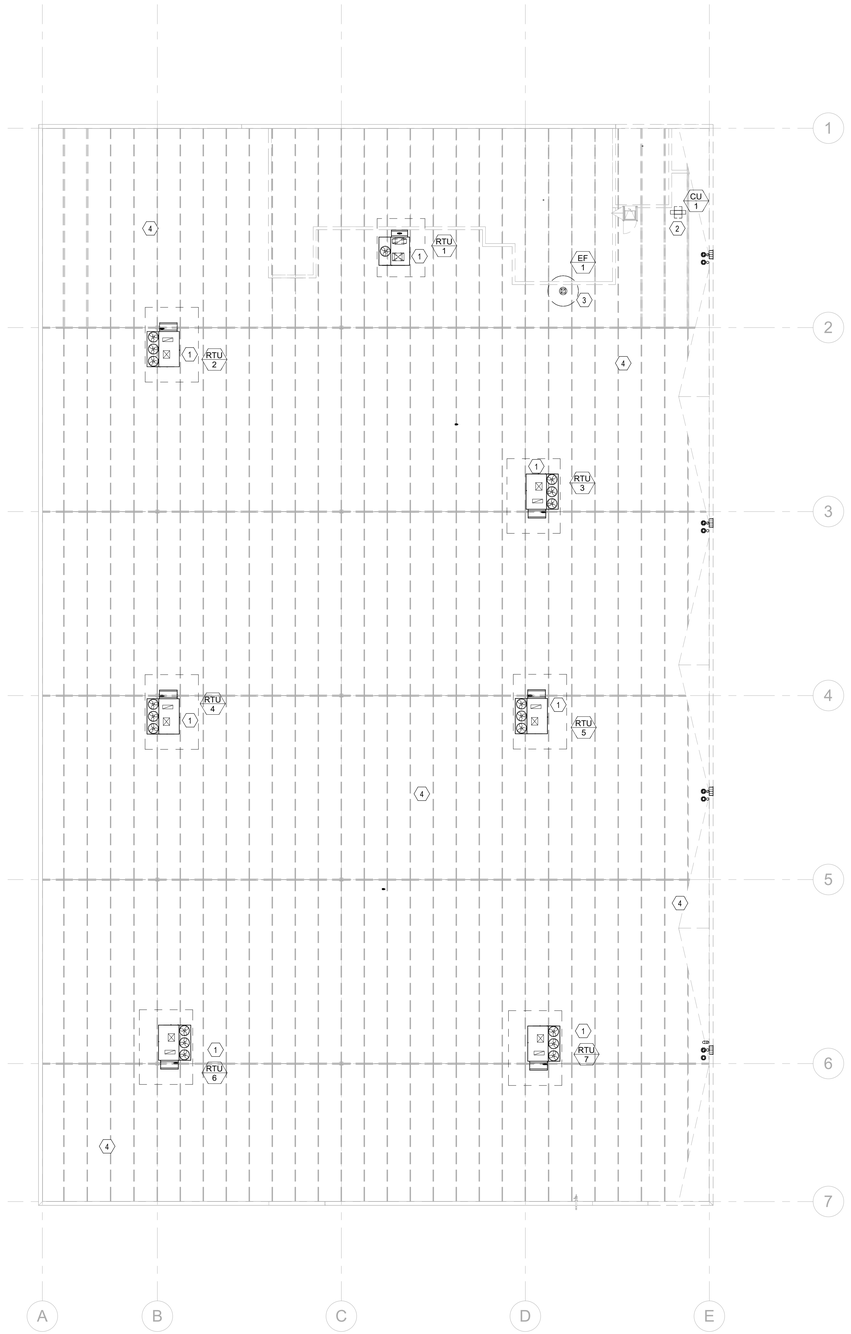
IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

KEYNOTES

1. PROVIDE HEAT PUMP ROOFTOP UNIT AND CURB. LOCATE UNIT IN CENTER OF JOIST BAY. COORDINATE UNIT WITH STRUCTURE. SHIM UNIT AND CURB LEVEL FOR PROPER CONDENSATE DRAINAGE. PROVIDE FLEXIBLE CONNECTORS ON SUPPLY AND RETURN AIR DUCT CONNECTIONS.
2. PROVIDE HEAT PUMP CONDENSING UNIT AND EQUIPMENT SUPPORT RAILS FOR MOUNTING ON ROOF. PROVIDE MANUFACTURER'S RECOMMENDED TYPE AND SIZE OF REFRIGERANT PIPING FROM AIR HANDLING UNIT TO HEAT PUMP CONDENSING UNIT. PROVIDE PIPE CURB PENETRATIONS AND SUPPORTS. INSULATE PIPING WITH 1" THICK ARMAFLEX AP. PAINT INSULATION LOCATED OUTDOORS WITH ARMAFLEX WB FINISH. TRAP AND SLOPE LINES PER MANUFACTURER'S RECOMMENDATIONS.
3. PROVIDE ROOF MOUNTED EXHAUST FAN AND CURB.
4. STRUCTURE BELOW SHOWN FOR CLARITY



1 / M1.02 ROOF MECHANICAL PLAN
1/16" = 1'-0"

PROJECT NORTH

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DARWIN W. HODGE, P.E.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ROOF MECHANICAL PLAN

M1.02

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

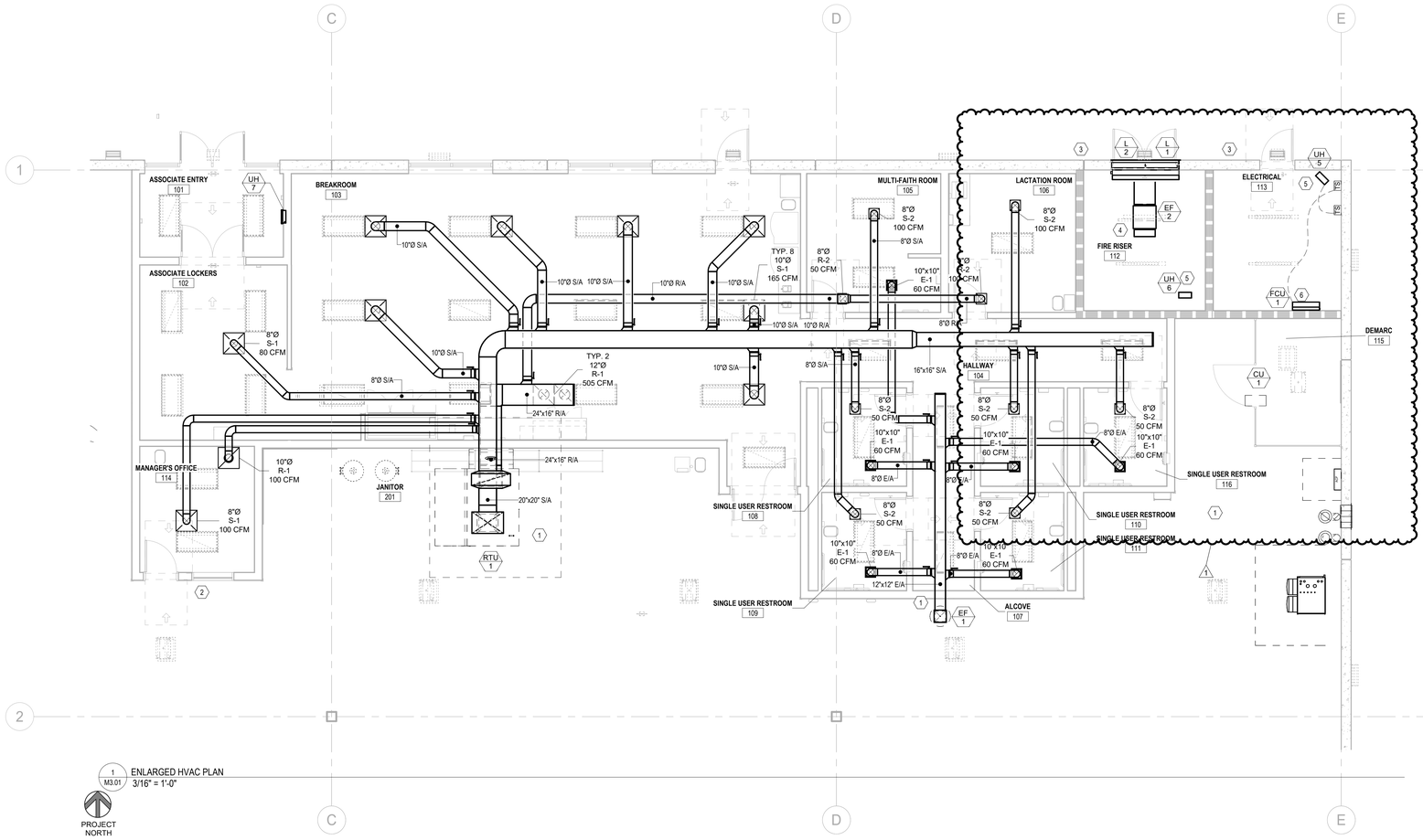
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES

KEYNOTES

1. EQUIPMENT ON ROOF SHOWN FOR CLARITY
2. PROPOSED LOCATION OF BAS PANEL. COORDINATE EXACT LOCATION IN FIELD WITH CONTROLS AND ELECTRICAL CONTRACTORS.
3. PROVIDE LOUVERS IN WALL. COORDINATE WITH ARCHITECTURAL DRAWINGS FOR EXACT MOUNTING HEIGHT.
4. PROVIDE INLINE EXHAUST FAN. SUPPORT FAN FROM STRUCTURE ABOVE WITH STEEL CHANNEL AND THREADED ROD WITH VIBRATION ISOLATORS. PROVIDE FLEXIBLE CONNECTORS ON THE INLET AND DISCHARGE DUCT CONNECTIONS. COORDINATE MOUNTING HEIGHT WITH ARCHITECTURAL PLANS.
5. PROVIDE UNIT HEATER. MOUNT HEATER 9'-0" ABOVE FINISHED FLOOR FROM STRUCTURE ABOVE PER MANUFACTURER'S INSTALLATION INSTRUCTIONS. SUSPEND FROM STRUCTURE WITH STEEL CHANNEL AND THREADED ROD.
6. PROVIDE WALL MOUNTED DUCTLESS SPLIT SYSTEM AIR HANDLING UNIT. INSTALL UNIT LEVEL FOR PROPER CONDENSATE DRAINAGE. PROVIDE WITH CONDENSATE PAN AND OVERFLOW SWITCH. ROUTE CONDENSATE THROUGH WALL LOW TO OUTSIDE. PROVIDE SPLASHBLOCK AT GROUND LEVEL.



1 M3.01 ENLARGED HVAC PLAN
3/16" = 1'-0"

PROJECT NORTH

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
ERWIN W. HODGE, JR.
2026-06-11

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

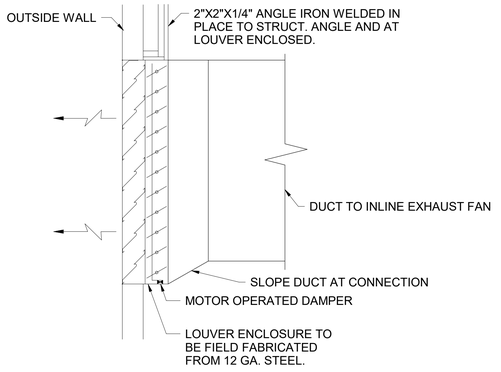
Sheet Title:
MECHANICAL ENLARGED PLANS

M3.01

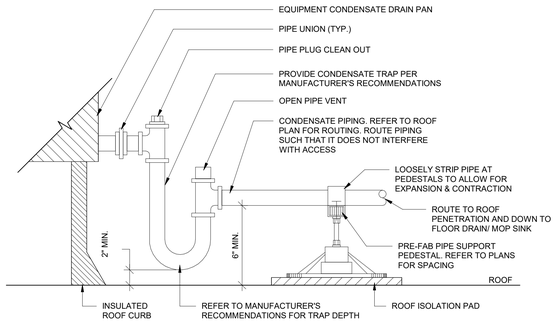
IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

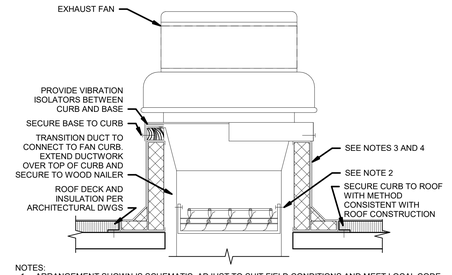
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



11 M4.01 EXHAUST LOUVER- WALL MOTOR OPERATED DAMPER
NOT TO SCALE



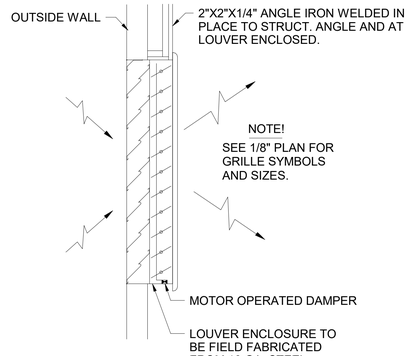
4 M4.01 P_EXTERIOR CONDENSATE P-TRAP
NOT TO SCALE



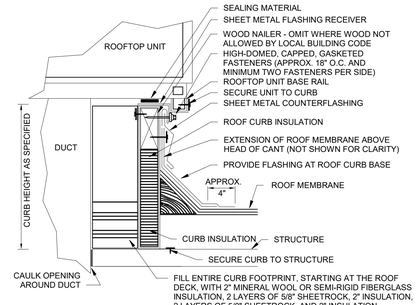
NOTES:
1. ARRANGEMENT SHOWN IS SCHEMATIC. ADJUST TO SUIT FIELD CONDITIONS AND MEET LOCAL CODE.
2. IF DAMPER IS SPECIFIED IN EQUIPMENT SCHEDULE, INSTALL DAMPER AT BASE OF CURB AND SECURE FROM ABOVE TO ALLOW SERVICE THROUGH TOP OF CURB.
3. PREFABRICATED INSULATED ROOF CURB WITH TREATED WOOD NAILER, CANT, AND STEP AS REQUIRED TO ACCOMMODATE ROOF INSULATION. FRAME AND SECURE CURB TO ROOF WITH METHOD CONSISTENT WITH ROOF CONSTRUCTION. ROOF CURB SHALL BEAR ON ROOF STRUCTURE. REFER TO ARCHITECTURAL DRAWINGS AND CURB MANUFACTURER'S DETAILS FOR MORE INFORMATION.
4. FOR SLOPED ROOFS, PROVIDE CURB WITH DIMENSIONS CAPABLE OF COMPENSATING ROOF SLOPE TO ENSURE FAN IS INSTALLED LEVEL.

HIGH WIND STRAPPING: PROVIDE STAINLESS STEEL STRAPS OF LENGTH, WIDTH, THICKNESS, AND SPACING SUFFICIENT TO SECURE FAN TO CURB TO WITHSTAND WIND SPEED REQUIREMENTS PER LOCAL CODE. WRAP STRAPS OVER FAN AND SECURELY ATTACH TO OPPOSITE SIDE OF THE CURB.

10 M4.01 ROOF MOUNTED DOWNBLAST FAN DETAIL
NOT TO SCALE

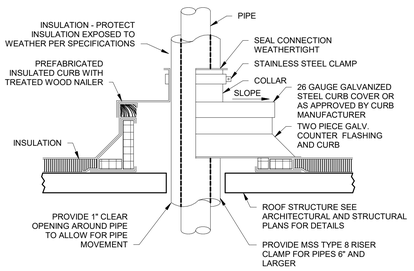


13 M4.01 233300 LOUVER- WALL MOTOR OPERATED DAMPER
NOT TO SCALE

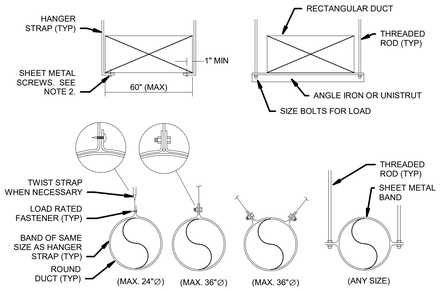


NOTES:
1. CUT METAL DECKING TO ALLOW CURB INSTALLATION ON STEEL FRAMING. AFTER CURB IS SET IN PLACE, TRIM REMAINING METAL DECKING AND INSTALL WITHIN CURB. TACK WELD DECKING TO SUPPORT STEEL. DO NOT WELD INTERIOR DECKING TO ROOF CURB. PROVIDE ADDITIONAL CROSS FRAMING TO SUPPORT INTERIOR DECKING AND FILL MATERIAL AS REQUIRED.
2. REFER TO SPECIFICATIONS FOR ADDITIONAL REQUIREMENTS FOR ROOF CURBS, ANCHORING AND SEISMIC/WIND RESISTANCE.

9 M4.01 ROOF CURB DETAIL
NOT TO SCALE

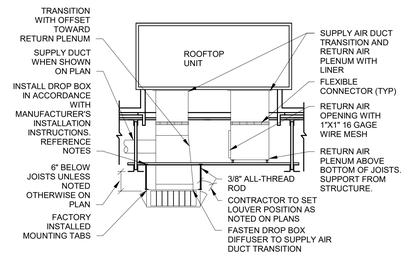


8 M4.01 PIPE ROOF PENETRATION DETAIL
NOT TO SCALE



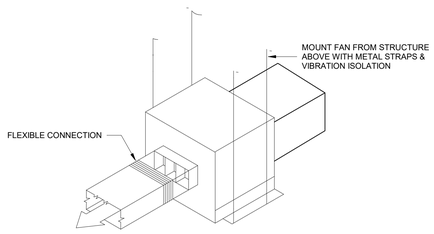
NOTES:
1. USE THREADED ROD FOR RECTANGULAR DUCTS LARGER THAN 60" WIDE.
2. OMIT SHEET METAL SCREWS IF HANGER STRAP IS CONTINUOUS AND LOOPS UNDER ENTIRE RECTANGULAR DUCT.
3. FOR ROUND DUCTS LARGER THAN 36"∅, USE TWO HANGER RODS TO SUPPORT DUCT FROM EACH SIDE.
4. HANGERS MUST NOT DEFORM DUCT SHAPE.

6 M4.01 DUCT HANGER LOWER ATTACHMENT DETAILS
NOT TO SCALE



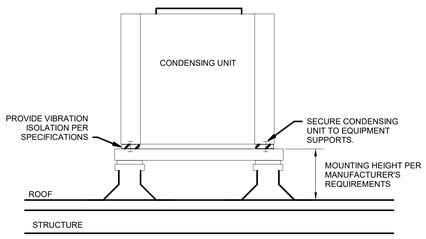
NOTES:
1. PROVIDE SUPPORT MATERIAL (ANGLES, UNISTRUT, BOLTS, NUTS, WASHERS AND PRE-CUT ALL-THREAD) FOR INSTALLATION.
2. INSTALL DROP BOX SUPPORTS PARALLEL TO MOUNTING TABS ON DROP BOX.
3. SUPPORTS SHALL SPAN BETWEEN ADJACENT JOISTS. PROVIDE ADDITIONAL SUPPORT MATERIAL AS REQUIRED IF OBSTRUCTIONS PREVENT INSTALLATION SHOWN.

5 M4.01 DROP BOX DIFFUSER DETAIL
NOT TO SCALE



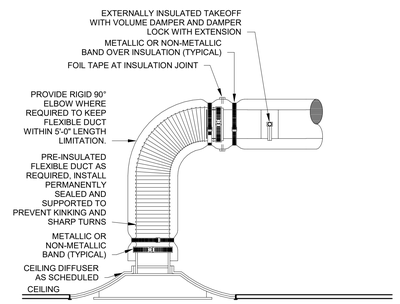
CONNECT TO LOUVER AS PER LOUVER DETAIL.

12 M4.01 INLINE EXHAUST FAN
N.T.S



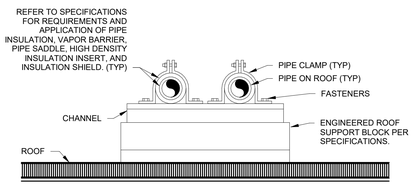
NOTES:
1. SUPPORT AND ANCHOR OUTDOOR UNITS IN COMPLIANCE WITH LOCAL SEISMIC AND WIND RESTRAINT REQUIREMENTS.
2. SEE MECHANICAL EQUIPMENT ANCHORS AND SUPPORT SPECIFICATIONS FOR ADDITIONAL REQUIREMENTS.
3. MOUNT OUTDOOR UNIT WITH A BOTTOM ELEVATION HEIGHT EQUAL TO THE AVERAGE ANNUAL SNOWFALL IN INCHES PLUS AN ADDITIONAL HEIGHT IN COMPLIANCE WITH MANUFACTURER'S INSTALLATION REQUIREMENTS.

3 M4.01 CONDENSING UNIT SUPPORT DETAIL
NOT TO SCALE



NOTES:
1. FLEXIBLE DUCT LENGTH MAY NOT EXCEED 5'-0". EXTEND RIGID DUCT AS REQUIRED.
2. REFER TO SPECIFICATIONS FOR FLEXIBLE DUCTWORK INSTALLATION REQUIREMENTS.

2 M4.01 CEILING DIFFUSER DETAIL
NOT TO SCALE



NOTES
1. PROVIDE PIPING SUPPORT SPACING AS REQUIRED BY LOCAL AUTHORITY.
2. REFER TO SPECIFICATIONS FOR ADDITIONAL REQUIREMENTS FOR PIPING SUPPORTS, ANCHORING, AND SEISMIC/WIND RESISTANCE.
3. STAGGER PIPE CLAMPS ON SUPPORTS AS REQUIRED TO FIT PIPES WITH INSULATION PER LAYOUT ON PLANS.

1 M4.01 ROOF PIPE SUPPORT BLOCK DETAIL
NOT TO SCALE

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

ARKANSAS
REGISTERED PROFESSIONAL ENGINEER
No. 9536
DARWIN W. HODGE, JR.
2025-11-21

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	EB
Checked By:	BW
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
MECHANICAL DETAILS

M4.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #205428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #205428

ELECTRICAL SHEET INDEX

E0.01	ELECTRICAL LEGEND
E1.01	OVERALL POWER PLAN
E1.02	ROOF EQUIPMENT POWER PLAN
E1.03	ENLARGED OFFICE ELECTRICAL PLANS
E2.01	OVERALL LIGHTING PLAN
E2.02	INTERIOR LIGHTING PHOTOMETRICS
E3.01	ELECTRICAL RISER AND SCHEDULES
E3.02	ELECTRICAL SCHEDULES
E3.03	ELECTRICAL SCHEDULES
E3.04	ELECTRICAL SCHEDULES
E4.01	ELECTRICAL DETAILS
E4.02	ELECTRICAL DETAILS
E4.03	ELECTRICAL DETAILS
E4.04	ELECTRICAL ARC FLASH RELAY DETAIL
E4.05	FIRE ALARM DETAILS AND NOTES
E4.06	FIRE ALARM SPECIFICATIONS
E4.07	ELECTRICAL DETAILS
E5.01	ELECTRICAL SITE PLAN
E5.02	SITE PHOTOMETRICS

ABBREVIATIONS

AC	ABOVE COUNTER	IG	ISOLATED GROUND
AFF	ABOVE FINISHED FLOOR	MCC	MOTOR CONTROL CENTER
CB	CIRCUIT BREAKER	NEC	NATIONAL ELECTRICAL CODE
E	EXISTING	NEMA	NATIONAL ELECTRICAL MANUFACTURERS ASSOC.
EC	ELECTRICAL CONTRACTOR	NIC	NOT IN CONTRACT
EP	EXPLOSION PROOF	NL	NIGHT LIGHT
GFI	GROUND FAULT CIRCUIT INTERRUPTER	UG	UNDERGROUND
GR	GROUND	UON	UNLESS OTHERWISE NOTED
HP	HORSE POWER	WP	WEATHERPROOF WHILE IN USE
		WR	WEATHER RESISTANT

SWITCHES LEGEND

$* SWITCH MOUNTED AT +48"; SINGLE POLE UON.
LOWER CASE LETTER, WHEN PRESENT, INDICATES FIXTURES CONTROLLED.

* ABBREVIATIONS FOR SWITCH
3 3-WAY SWITCH
OS DUAL TECHNOLOGY OCCUPANCY SENSOR
OSD OCCUPANCY SENSOR/DIMMER COMBO
VAC/O VACANCY SENSOR/DIMMER

(M) CEILING MOUNTED DUAL TECHNOLOGY VACANCY SENSOR WITH SPARE DRY CONTACTS.
(OS) CEILING MOUNTED DUAL TECHNOLOGY OCCUPANCY SENSOR WITH SPARE DRY CONTACTS.

RECEPTACLES LEGEND

- DUPLEX RECEPTACLE (NEMA 5-20R)
- GFI DUPLEX RECEPTACLE (NEMA 5-20R), SELF-TEST TYPE
- EMERGENCY DUPLEX RECEPTACLE (NEMA 5-20R)
- SPLIT WIRED DUPLEX RECEPTACLE (NEMA 5-20R)
- QUADRUPLEX RECEPTACLE (TWO NEMA 5-20R)
- GFI QUADRUPLEX RECEPTACLE (TWO NEMA 5-20R), SELF-TEST TYPE
- EMERGENCY QUADRUPLEX RECEPTACLE (TWO NEMA 5-20R)
- IG (ALL RECEPTACLE TYPES) ISOLATED GROUND RECEPTACLE
- U (ALL RECEPTACLE TYPES) WITH USB CHARGING PORTS
- (ALL RECEPTACLE TYPES) MOUNTED 8" ABOVE COUNTERTOP
- SINGLE RECEPTACLE (NEMA 5-20R)

- SPECIAL RECEPTACLE: VERIFY NEMA TYPE WITH MANUFACTURER
- FLOOR BOX WITH DATA: LEGRAND WIREMOLD SERIES RFB4E-OG OR RFB6E-OG WITH EVOLUTION COVER. ROUTE (2)1" FOR DATA FROM FLOOR BOX TO NEAREST ACCESSIBLE CEILING SPACE. ON FLOOR LEVELS WITH ACCESSIBLE SPACE BELOW, USE POKE-THRU STYLE FLOOR BOXES: LEGRAND 6AT SERIES. SEE ARCHITECTURAL PLANS FOR LOCATION UON.
- F FURNITURE FEED FLOOR BOX: LEGRAND WIREMOLD EVOLUTION POKE THRU WITH FF COVER ASSEMBLY.
- TV A/V TELEVISION: PROVIDE THREE INDIVIDUAL DEVICE BOXES WITH 1/2" CONDUIT FOR POWER AND 1" CONDUIT (WITH PULL STRINGS) FOR A/V AND DATA ROUTED TO ACCESSIBLE CEILING SPACE. PROVIDE CONNECTIONS FOR POWER, DATA, COAX, AND HDMI. MOUNT AT +84" AFF UNO. CONFIRM HEIGHTS WITH ARCHITECT PRIOR TO ROUGH-IN.
- DIRECT EQUIPMENT CONNECTION: VERIFY CONNECTION DETAILS WITH MANUFACTURER
- FLOOR MOUNTED DUPLEX RECEPTACLE (NEMA 5-20R): STANDARD TYPE UON.
- CEILING MOUNTED DUPLEX RECEPTACLE (NEMA 5-20R)
- CEILING MOUNTED GFI DUPLEX RECEPTACLE (NEMA 5-20R), SELF-TEST TYPE
- CEILING MOUNTED EMERGENCY DUPLEX RECEPTACLE (NEMA 5-20R) FLOOR BOX: HUBBELL 3SFBSS WITH 3SFBC COVER. EC SHALL ROUTE A 1"C FOR FLOOR BOX TO NEAREST ACCESSIBLE CEILING SPACE. ON FLOOR LEVELS WITH ACCESSIBLE SPACE BELOW, USE POKE-THRU STYLE FLOOR BOXES. HUBBELL PT2X2 SERIES. SEE ARCHITECTURAL PLANS FOR LOCATION UON.

PANELS AND MISCELLANEOUS LEGEND

- LIGHT OR POWER PANEL
- J 4x4 JUNCTION BOX.
- UNFUSED EQUIPMENT DISCONNECT: INTERIOR DISCONNECTS SHALL BE NEMA 1 TYPE. EXTERIOR DISCONNECTS SHALL BE NEMA 3R TYPE. SIZE AS INDICATED IN THE PLANS AND PER NAMEPLATE RATING
- FUSED EQUIPMENT DISCONNECT: INTERIOR DISCONNECTS SHALL BE NEMA 1 TYPE. EXTERIOR DISCONNECTS SHALL BE NEMA 3R TYPE. SIZE AS INDICATED IN THE PLANS AND PER NAMEPLATE RATING
- PHONE/DATA: PROVIDE 4"X4", 30-1/4 CUBIC INCH OUTLET BOX AT 8" ABOVE COUNTER (UON) WITH (2) 3/4" CONDUITS (WITH PULL STRINGS) ROUTED TO ACCESSIBLE CEILING SPACE. PROVIDE SINGLE GANG MUD RING WITH BLANK COVER. PROVIDE PLASTIC BUSHINGS ON EXPOSED CONDUIT ENDS. WIRING BY OTHERS.
- PHONE/DATA: PROVIDE 4"X4", 30-1/4 CUBIC INCH OUTLET BOX AT +18" (UON) WITH (2) 3/4" CONDUITS (WITH PULL STRINGS) ROUTED TO ACCESSIBLE CEILING SPACE. PROVIDE SINGLE GANG MUD RING WITH BLANK COVER. PROVIDE PLASTIC BUSHINGS ON EXPOSED CONDUIT ENDS. WIRING BY OTHERS.
- PHONE/DATA: PROVIDE 4"X4", 30-1/4 CUBIC INCH OUTLET BOX IN CEILING. PROVIDE SINGLE GANG MUD RING WITH BLANK COVER. WIRING BY OTHERS.

- S CEILING MOUNTED SPEAKER
- SECURITY CAMERA: DOUBLE GANG BOX AND 3/4"C TO ABOVE CEILING.
- CR CARD READER: REFER TO SYSTEM PLANS AND SPECIFICATIONS. AT EACH DOOR WITH A CARD READER PROVIDE ALL ELECTRICAL CONNECTIONS FOR DOOR HARDWARE SYSTEMS AS REQUIRED TO MAKE A COMPLETE OPERATIONAL SYSTEM. WHERE REQUIRED, BACK TO BACK 2"X4" BOXES ARE ALLOWED FOR CARD READER AND PUSH TO EXIT SWITCH. PROVIDE POWER TO THE LOCK SYSTEM IN THE I.T. ROOM WHERE NEEDED BY CONTRACTOR INSTALLING SYSTEM.

- AUTOMATIC DOOR OPENER. PROVIDE SINGLE GANG BACK BOX AND 3/4"C TO ABOVE CEILING. EQUIPMENT AND CABLING BY OTHERS.

GENERAL LIGHTING NOTES

1 WHERE RECESSED LIGHTING FIXTURES ARE INDICATED IN A FIRE RATED CEILING, PROVIDE A ONE HOUR RATED "TENT" FOR FIXTURE
2 PROVIDE ALL MOUNTING AND SUPPORT HARDWARE FOR LIGHT FIXTURES TO MEET SPECIFIED MOUNTING HEIGHTS. REFER TO ARCHITECTURAL ELEVATIONS FOR EXACT MOUNTING HEIGHTS OF FIXTURES.
3 CONNECT "UN-SWITCHED" HOT CONDUCTOR FROM CIRCUIT SERVING SPACE LIGHTING TO EACH EXIT SIGN, EMERGENCY LIGHT, AND ANY FIXTURE DESIGNATED AS NIGHT LIGHT SERVING THE SPACE.
4 COORDINATE ALL DEVICES AND WALL-MOUNTED LIGHT FIXTURE LOCATIONS WITH THE ARCHITECTURAL WALL FINISHES AND ELEVATIONS. SPECIAL ATTENTION AND COORDINATION OF WALL TYPES AND FINISHES IS REQUIRED PRIOR TO ROUGH-IN. EXACT LOCATION OF DEVICES SHALL BE COORDINATED WITH THE ARCHITECT PRIOR TO ROUGH-IN TO AVOID INSTALLATION ON SPECIAL ARCHITECTURAL WALL FINISHES. DEVICES NOT PROPERLY COORDINATED WITH THE SPECIAL WALL FINISHES INDICATED IN THE CONSTRUCTION DOCUMENTS PRIOR TO ROUGH-IN SHALL BE RELOCATED AT NO ADDITIONAL COST TO THE OWNER.
5 ELECTRICAL CONTRACTOR SHALL VERIFY CHEVRON DIRECTIONS OF ALL EXIT SIGNS PRIOR TO ORDERING.
6 FOR BATTERY FED EMERGENCY LIGHTS: PROVIDE EMERGENCY BALLAST. PROVIDE "HOT" WIRE TO EMERGENCY BALLAST. SWITCH FIXTURE AS INDICATED ON PLANS.
7 COORDINATE AND PROVIDE DIMMER SWITCHES RATED FOR AND COMPATABLE WITH INTENDED LIGHT FIXTURE(S) TO BE CONTROLLED. CIRCUITS CONTROLLED WITH LINE-VOLTAGE DIMMER SWITCHES SHALL NOT SHARE NEUTRAL CONDUCTORS.

GENERAL LOW VOLTAGE NOTES

1 PROVIDE 4' WIDE X 8' TALL X 3/4" FIRE RATED, PAINTED CDX PLYWOOD BACKBOARD WHERE SHOWN ON DRAWINGS OR AS REQUIRED FOR TELEPHONE, CATV, ALARM SYSTEM EQUIPMENT, ECT. COORDINATE EXACT LOCATION(S) WITH RESPONSIBLE CONTRACTOR(S).
2 PROVIDE (1) 1/2" CONDUIT, AND 4" SQUARE BOX WITH SINGLE GANG DEVICE RING FOR ALL THERMOSTAT LOCATIONS INDICATED ON THE MECHANICAL DRAWINGS. ROUTE CONDUIT FROM BOX TO ACCESSIBLE CEILING CAVITY. PROVIDE PLASTIC BUSHINGS ON EXPOSED CONDUIT ENDS. PROVIDE PULL STRING IN ALL EMPTY CONDUIT SYSTEMS. COORDINATE EXACT LOCATIONS AND MOUNTING HEIGHTS WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN.
3 PROVIDE CABLE HOOKS ABOVE CEILING ON 6' CENTERS IN ALL CORRIDORS. MOUNT 6 INCHES ABOVE CEILING.
4 PROVIDE ROUGH-IN OF ALL BACK BOXES, CONDUITS (WITH BUSHINGS AND PULL STRINGS) AND OTHER WIRE WAYS AS REQUIRED FOR LOW VOLTAGE SYSTEMS, COORDINATE ALL REQUIRED LOCATIONS WITH OWNER AND RESPONSIBLE CONTRACTOR(S).
5 FURNISH AND INSTALL A TELEPHONE SERVICE CONDUIT(S) PER TELEPHONE SERVICE PROVIDER SPECIFICATIONS. STUB UP AT DESIGNATED EQUIPMENT BOARD +12" ABOVE FLOOR AND CAP. INSTALL 2- 4" CONDUITS UNDERGROUND TO TELEPHONE COMPANY SERVICE LOCATION.
6 FURNISH AND INSTALL ONE #6 COPPER INSULATED GROUND WIRE FROM THE ELECTRICAL SERVICE GROUND TO THE TELEPHONE EQUIPMENT BOARD. LEAVE 36" EXTRA WIRE AT FREE END.
7 FURNISH AND INSTALL A CABLE TV SERVICE CONDUIT(S) PER CABLE TV PROVIDER SPECIFICATIONS. STUB UP AT DESIGNATED EQUIPMENT BOARD +12" ABOVE FINISH FLOOR AND CAP. INSTALL 2- 4" CONDUITS UNDERGROUND TO CABLE TV COMPANY SERVICE LOCATION.
8 REFER TO SITE UTILITIES PLAN AND COORDINATE ENTIRE INSTALLATION WITH CABLE TV SERVICE PROVIDER.
9 PROVIDE BACK BOX AND CONDUIT TO ABOVE THE ACCESSIBLE CEILING AS REQUIRED FOR THE HVAC BUILDING AUTOMATION SYSTEM DEVICES. COORDINATE EXACT LOCATIONS AND OTHER REQUIREMENTS WITH RELATIVE MEP DRAWINGS AND THE CONTROLS CONTRACTOR PRIOR TO ROUGH-IN. THERMOSTATS, TEMPERATURE SENSORS, STATIC PRESSURE SENSORS, HUMIDISTATS, ETC. SHALL BE INSTALLED AT THE SAME ELEVATION AS THE LIGHT SWITCHES UNLESS REQUIRED OTHERWISE.
10 REFER TO SITE UTILITIES PLAN AND COORDINATE ENTIRE INSTALLATION WITH PHONE SERVICE PROVIDER.

GENERAL POWER NOTES

1 ALL RECEPTACLES SHALL BE GROUNDING TYPE.
2 ALL RECEPTACLES INSTALLED IN BATHROOMS, OUTDOORS AND KITCHENS SHALL HAVE GROUND-FAULT CIRCUIT INTERRUPTER PROTECTION AS REQUIRED BY THE NATIONAL ELECTRIC CODE.
3 COORDINATE MECHANICAL EQUIPMENT CONNECTION REQUIREMENTS WITH MECHANICAL CONTRACTOR PRIOR TO ROUGH-IN. LOCATE FEEDERS, DISCONNECTS AND MAINTENANCE RECEPTACLES SO THAT THEY WILL NOT INTERFERE WITH OPERATION OR MAINTENANCE OF MECHANICAL EQUIPMENT.
4 PROVIDE POWER TO MECHANICAL, PLUMBING, AND ALL OTHER EQUIPMENT AS REQUIRED FOR PROPER OPERATION, COORDINATE AND VERIFY EACH PIECE OF EQUIPMENTS POWER/CONTROL REQUIRMENTS PRIOR TO ORDERING RELATED ELECTRICAL EQUIPMENT. REFER TO RELATED MECHANICAL, PLUMBING, AND OTHER RELATED DOCUMENTS FOR LOCATIONS OF EQUIPMENT AND REQUIRED CLEARANCES AROUND EQUIPMENT.
5 COORDINATE EXACT MOUNTING HEIGHT OF EACH ABOVE COUNTER RECEPTACLE WITH ARCHITECT AND OWNER PRIOR TO ROUGH-IN.
6 ALL OUTLETS LOCATED IN AREAS REQUIRING GROUND-FAULT CIRCUIT INTERRUPTER PROTECTION PER NEC-210 SHALL CONSIST OF A GFCI PROTECTED DEVICE, EVEN IF NOT SPECIFICALLY INDICATED IN THE DRAWINGS. THE GROUND-FAULT CIRCUIT INTERRUPTER SHALL BE INSTALLED IN A READILY ACCESSIBLE LOCATION AS DEFINED IN THE NEC. ALL RECEPTACLES SUPPLIED THROUGH A GROUND-FAULT CIRCUIT INTERRUPTER SHALL BE MARKED "GFCI PROTECTED."
7 COORDINATE EXACT LOCATION OF ALL FLOOR BOXES WITH ARCHITECT AND OWNER PRIOR TO ROUGH-IN. VERIFY EACH TYPE OF FLOOR BOX WITH INTENDED USE AND INSTALLATION, COORDINATE THIS WITH THE CONSTRUCTION OF FLOOR TYPE TO BE INSTALLED IN PRIOR TO ROUGH-IN SO AS TO ENSURE A CLEAN AND PROPER INSTALLATION. FOR INSTALLATIONS IN CONTRETE SLAB WITH OVERLAY OF CARPET, WOOD, AND/OR OTHER SIMILAR MATERIALS. LEAVE A 48"X48" BLOCK OUT WHEN FLOOR IS POURED SO THAT FINAL LOCATION OF FLOOR BOX MAY BE DETERMINED IN THE FIELD.

VERIFICATION AND TESTING OF LIGHTING CONTROL DEVICES AND CONTROL SYSTEMS SHALL BE TESTED IN ACCORDANCE WITH ASHRAE 90.1 4.2.5.1.

THE ENERGY PERFORMANCE OF THE LIGHTING SYSTEMS SHALL BE COMMISSIONED IN ACCORDANCE WITH ASHRAE 90.1 SECTION 4.2.5.23 AND REPORTING SHALL COMPLY WITH SECTION 4.2.5.2.2.

GENERAL ELECTRICAL NOTES

1 DRAWINGS ARE DIAGRAMMATIC ONLY AND REPRESENT THE GENERAL SCOPE OF THE WORK. REVIEW ALL GENERAL NOTES, SPECIFICATIONS AND PLANS FOR ADDITIONAL REQUIREMENTS THAT MAY NOT BE SPECIFICALLY CALLED OUT IN THIS PORTION OF THE CONSTRUCTION DOCUMENTS.
2 SPECIAL ATTENTION SHALL BE GIVEN TO ALL RACEWAYS WITHIN FINISHED AREAS WITHOUT CEILINGS AND EXPOSED TO STRUCTURE. IN GENERAL, ALL RACEWAYS SHALL BE CONCEALED WITHIN WALLS, ABOVE STRUCTURE FINISH, OR BELOW FLOOR SLABS WHEN SPECIFIED. WHERE EXPOSED CONDITIONS ARE NECESSARY OR UNAVOIDABLE DUE TO OTHER CONDITIONS, THE BID SHALL INCLUDE ANY REASONABLE MEANS TO MINIMIZE THE AMOUNT OF SURFACE MOUNTED EQUIPMENT. PRIOR TO ROUGH-IN, COORDINATE ALL EXPOSED RACEWAY AND BOX CONDITIONS WITH ARCHITECT PRIOR TO CONSTRUCTION OF WALLS, ROOF DECK, OR FLOOR SLABS. ATTACHMENT TO ROOF DECK OR JOIST WEBBINGS IS NOT ALLOWED, MAINTAIN A MINIMUM SPACING OF 1-1/2" FROM CONDUIT TO ROOF DECK. IN AREAS WHERE EXPOSED RACEWAYS ARE REQUIRED, INSTALL SYSTEMS SQUARE AND TIGHT TO STRUCTURE AND PAINT TO MATCH THE STRUCTURE PER ARCHITECT AND/OR OWNER SPECIFICATIONS. FAILURE TO PROPERLY COORDINATE THE ROUTING OF EXPOSED RACEWAYS MAY RESULT IN RELOCATION OF SUCH RACEWAYS AT NO ADDITIONAL COST TO THE OWNER.
3 OPENINGS AROUND ELECTRICAL PENETRATIONS THROUGH FIRE-RESISTANT-RATED WALLS, PARTITIONS, FLOORS OR CEILINGS SHALL BE FIRESTOPPED USING APPROVED METHODS TO MAINTAIN THE FIRE RESISTANCE RATING. PROVIDE PENETRATION FIRE STOPPING WITH RATINGS DETERMINED PER ASTM E 814 OR UL 1479. FIRE STOPPING SHALL NOT BE LESS THAN FIRE RESISTANCE RATING OF CONSTRUCTED PENETRATIONS.
4 FIELD MOUNTED DEVICES SUCH AS SWITCHES, MOTOR STARTERS, RECEPTACLES, ETC., ARE SHOWN IN THEIR APPROXIMATE LOCATION. SWITCH MOUNTING HEIGHT SHALL BE 48" ABOVE FINISHED FLOOR AND RECEPTACLE MOUNTING HEIGHT SHALL BE 18" ABOVE FINISHED FLOOR UON. REFER TO THE TYPICAL MOUNTING HEIGHT DETAIL.
5 INSTALL EQUIPMENT IN A MANNER TO REMAIN ACCESSIBLE WITH REASONABLE MEANS BY THE OWNER FOLLOWING COMPLETION OF WORK. SPECIAL ATTENTION AND ADDITIONAL COORDINATION IS EXPECTED IN AREAS OF THE BUILDING WHERE THE CEILING AND STRUCTURE HEIGHTS HAVE SIGNIFICANT DIFFERENT ELEVATIONS. EQUIPMENT REQUIRING POSSIBLE FUTURE ACCESS SHALL BE INSTALLED SUCH THAT IT MAY BE SAFELY ACCESSED FROM A STANDARD STEP LADDER OR PERSONNEL LIFT SUITABLE FOR THE LOCATION AND CEILING HEIGHT, WITHOUT REMOVING OR DAMAGING THE CEILING GRID STRUCTURE.
6 COORDINATE ALL CEILING MOUNTED ELECTRICAL ITEMS WITH OTHER DISCIPLINES, WITH CEILING, AND STRUCTURE. REFER TO ARCHITECTURAL REFLECTED CEILING PLAN.
7 FIELD VERIFY LOCATIONS OF EXISTING ELECTRICAL EQUIPMENT, INCLUDING POWER POLES, TELEPHONE PEDESTALS, OVERHEAD AND UNDERGROUND FEEDERS, METERS, PANELS, DEVICES, ETC. PROVIDE FOR COORDINATION WITH EXISTING EQUIPMENT.
8 ROOM NAMES/NUMBERS SHOWN IN PANELBOARD SCHEDULES ARE PER ARCHITECTURAL FLOOR PLANS. CONTRACTOR SHALL PROVIDE FINALIZED PANELBOARD SCHEDULES AT COMPLETION OF PROJECT WITH OWNER PROVIDED ROOM NAMES/NUMBERS.
9 CONDUCTORS FOR BRANCH CIRCUITS AS DEFINED IN ARTICLE 100, SHALL BE SIZED TO PREVENT A VOLTAGE DROP EXCEEDING 3% AT THE FARTHEST LOAD, AND WHERE THE MAXIMUM TOTAL VOLTAGE DROP ON BOTH FEEDERS AND BRANCH CIRCUITS TO THE FARTHEST LOAD DOES NOT EXCEED 5%.
10 ALL WORK IS TO BE PERFORMED IN STRICT COMPLIANCE WITH THE NATIONAL ELECTRICAL CODE, STATE LAWS, ALL AUTHORITIES HAVING JUISDICTION, AND ALL OTHER REGULATIONS GOVERNING WORK OF THIS NATURE.
11 THE CONTRACTOR IS RESPONSIBLE FOR ALL WORK, MATERIAL, AND LABOR TO SATISFY A COMPLETE AND WORKING SYSTEM WHETHER SPECIFIED OR IMPLIED.
12 CONTRACTOR TO CONFIRM EXACT LOCATION OF EXISTING AND NEW EQUIPMENT.
13 THE CONTRACTOR SHALL FURNISH AND INSTALL ALL GROUNDING SYSTEMS (AS REQUIRED) IN ACCORDANCE WITH THE NATIONAL ELECTRIC CODE.
14 ALL ELECTRIC MATERIALS AND EQUIPMENT FOR THE PROJECT SHALL BE NEW AND U.L. OR EQUALLY LISTED.
15 SUBMIT TO THE OWNER CERTIFICATES OF INSPECTIONS IN DUPLICATE FROM AN APPROVED INSPECTION AGENCY UPON COMPLETION.
16 THE CONTRACTOR SHALL SECURE ALL PERMITS OR APPLICATIONS AND PAY ANY AND ALL FEES AS REQUIRED,
17 THE CONTRACTOR SHALL FURNISH ALL INSTRUMENTS AND QUALIFIED PERSONNEL OR FIRM TO PERFORM ALL REQUIRED TESTS.
18 NO EQUIPMENT SHALL BE ENERGIZED UNTIL ALL TEST AND ADJUSTMENTS HAVE BEEN MADE. THREE COPIES OF ALL TEST RESULTS SHALL BE DELIVERED TO THE OWNER
19 ALL ELECTRICAL WORK SHALL BE COORDINATED WITH THE MECHANICAL WORK AS CALLED FOR IN MECHANICAL SPECIFICATIONS AND PLANS.
20 JUNCTION BOXES LOCATED ABOVE GRID CEILINGS SHALL BE LOCATED NO GREATER THAN 4-FEET ABOVE THE CEILING IN A LOCATION ACCESSIBLE VIA A LADDER FROM THE ROOM BELOW.
21 ALL WIRING DEVICE COVERPLATES SHALL INDICATE PANELBOARD AND CIRCUIT SERVING THE DEVICE. UTILIZE CLEAR VINYL (BLACK LETTERING) IDENTIFICATION LABLES MANUFACTURED BY 3M COMPANY (OR APPROVED EQUIVALENT).
22 THE TYPE OF CONDUIT SHALL BE AS FOLLOWS FOR ALL FEEDERS AND DISTRIBUTION CIRCUITS, UNLESS OTHERWISE SPECIFIED.

APPLICATION - TYPE OF CONDUIT

BURIED IN CONCRETE OR OUTDOORS - PVC WITH RIGID GALVANIZED STEEL ELBOWS

SERVICE ENTRANCE - GALVANIZED RIGID STEEL OR SERVICE UTILITY SPECIFICATIONS.

23 UNLESS NOTED OTHERWISE PROVIDE MINIMUM #8 AWG CONDUCTORS IN 1" CONDUIT(S) FOR ALL UNDERGROUND SITE POWER AND LIGHTING CIRCUITS. INCREASE CONDUCTOR AND RELATED CONDUIT SIZE AS NOTED OR OTHERWISE REQUIRED TO LIMIT VOLTAGE DROP TO LESS THAN 5% FOR THE ENTIRE LENGTH OF SYSTEM.
24 UNDERGROUND UTILITIES/FEEDERS/BRANCH CIRCUITS/ETC. SHALL NOT BE ROUTED THROUGH OR WITHIN 25 FEET OF ANY AREAS DEDICATED FOR FUTURE BUILDING ADDITION.
25 DESIGNATED SPARE CIRCUIT BREAKERS SHALL BE PLACED IN THE OFF POSITION
26 PROVIDE SPD AS REQUIRED FOR OWNER PROVIDED EQUIPMENT, INCLUDING BUT NOT LIMITED TO THE FOLLOWING: ACCESS CONTROL SYSTEM, COMMUNICATION SYSTEM, DATA SYSTEM, SECURITY SYSTEM.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
RYAN D. MORRIS
No. 15418
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL LEGEND

E0.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

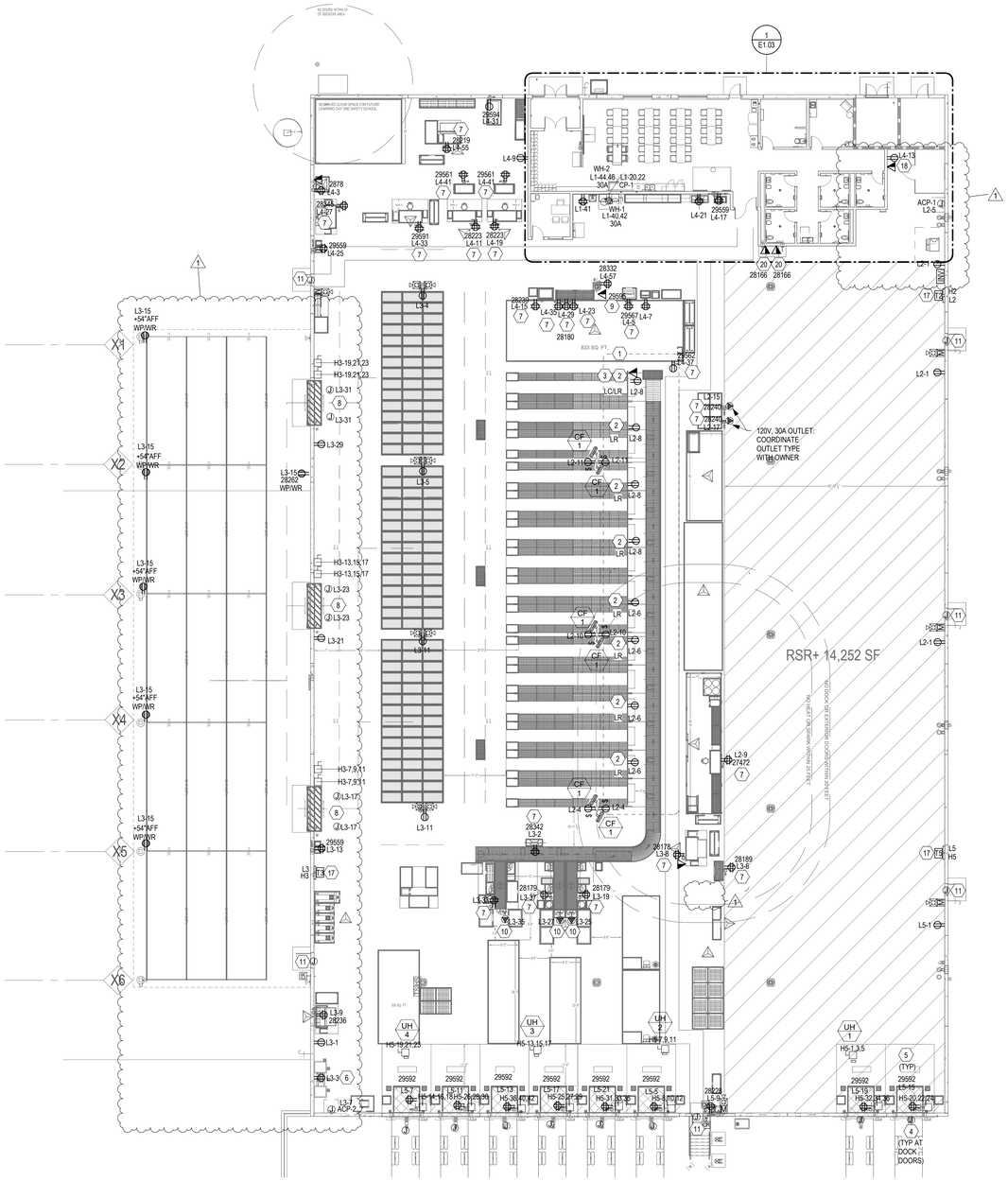
KEYNOTES

1. STOW-BY-LIGHT SYSTEM: REFER 2/4.01
2. PROVIDE DUPLEX RECEPTACLE FOR CONNECTION OF SBL EQUIPMENT (PROVIDED AND INSTALLED BY OTHERS). RECEPTACLES WITH A 'LC/LR' SUBSCRIPT ARE FOR CONNECTION OF THE LED CONTROLLER (50VA) AND LED RECEIVER (80VA). RECEPTACLES WITH 'LR' SUBSCRIPT ARE TO CONNECTION OF A SINGLE LED RECEIVER (80VA). REFER TO SBL OVERHEAD INSTALLATION DETAIL FOR MOUNTING AND SPACING REQUIREMENTS OF RECEPTACLES AND SBL EQUIPMENT.
3. PROVIDE ¾"CONDUIT (FOR INSTALLATION OF CAT6 ETHERNET CABLE) FROM LED CONTROLLER LOCATION ON UNISTRUT, UP THE THREADED ROD SUPPORTING THE UNISTRUT CHANNEL TO 18" BELOW CEILING. REFER TO SBL OVERHEAD INSTALLATION DETAIL FOR MORE INFORMATION.
4. PROVIDE JUNCTION BOXES FOR EXTERIOR DOCK DOOR CONNECTIONS. COORDINATE EXACT REQUIREMENTS WITH MANUFACTURER SPECIFICATIONS PRIOR TO BID.
5. TYPICAL DOCK DOOR. REFER 5/E4.03
6. IDF: PROVIDE RECEPTACLE AND (3)2" CONDUITS TO 1'-6" BELOW ROOF STRUCTURE FOR INTRA BUILDING BACKBONE AND HORIZONTAL CABLING FOR IDF. VERIFY EXACT LOCATION AND REQUIREMENTS WITH SECURITY AND TELECOM DRAWINGS PRIOR TO INSTALLATION. REFER TO 2/E4.03.
7. REFER 3/E4.03
8. POWER FOR FABRIC AND COIL DOOR MOTORS AND CONTROLS. PROVIDE (2) JUNCTION BOXES FOR 120V CONNECTION OF DOOR CONTROLS. PROVIDE (2) DISCONNECTS FOR 480V, 3PH CONNECTION OF DOOR MOTORS. COORDINATE FINAL ELECTRICAL REQUIREMENTS WITH DOOR MANUFACTURER PRIOR TO INSTALLATION. REFER 6/E4.03.
9. PROVIDE DATA CONNECTION WITH (3) DATA DROPS AT 10'-0" AFF, JUNCTION BOX AT 5'-0" AFF AND ¾" CONDUIT BETWEEN ITEMS FOR HEAT INDEX SENSOR. PROVIDE ¾" CONDUIT WITH PULL STRINGS FROM DATA DROP TO LOCATION DETERMINED BY OWNER. REFER 1/E4.02
10. PROVIDE NEMA L5-30R AND (2) #10 & (1) #10G FOR MATERIAL HANDLING EQUIPMENT (MHE). COORDINATE NEMA CONFIGURATION WITH MHE VENDOR.
11. PROVIDE ALL REQUIRED ELECTRICAL CONNECTIONS (120V CONNECTIONS, JUNCTION BOXES AND CONDUIT) FOR SECURED DOOR. PROVIDE 120V CONNECTION FROM NEAREST RECEPTACLE CIRCUIT. REFER TO 'DOOR ACCESS WITH CARD READER DETAIL ON 4/E4.02 FOR MOUNTING OF DEVICES. COORDINATE QUANTITY AND TYPE OF OF DEVICES REQUIRED AND ANY ASSOCIATED CONDUITS REQUIRED FOR EACH DOOR TYPE WITH SECURITY SYSTEMS VENDOR. FIELD COORDINATE LOCATION OF ALL SECURED DOORS WITH OWNERS REPRESENTATIVE PRIOR TO ROUGH-IN.
12. PROVIDE SO CORD DROP FOR AIR QUALITY INDEX MONITOR. MOUNT 6' TO 10' AFF AND VERIFY FINAL LOCATION WITH OWNER'S REPRESENTATIVE.
17. REFER 7/E4.01.
18. BAS COMPUTER. COORDINATE EXACT LOCATION WITH ARCHITECT AND OWNER PRIOR TO ROUGH-IN.
20. DATA OUTLET FOR TIME CLOCK. COORDINATE EXACT MOUNTING HEIGHT AND LOCATION WITH ARCHITECT.

GENERAL NOTES

1. PROVIDE (30) NEMA L5-30R TWIST LOCK RECEPTACLES FOR THE MHE SYSTEM. TWIST LOCK RECEPACTACLES TO BE LOCATED EVERY 50' ALONG THE MHE SYSTEM. COORDINATE FINAL CONVEYOR POWER DROP LOCATIONS WITH THE MHE PLANS. PROVIDE ASSOCIATED FEEDER AND 30A BREAKERS TO PANELBOARD L4.
2. REFER TO E3.02 FOR MODULE EQUIPMENT CONNECTION SCHEDULE.
3. UH ARE PROVIDED WITH FACTORY INSTALLED INTEGRAL DISCONNECT, TYP.

EMERGENCY LIGHTING CENTRAL INVERTER SHALL BE 480V MEYERS ILLUMINATOR HYPERNOVA SYSTEM, FAST CHARGE OR APPROVED EQUALAND SIZED FOR THE KVA OF INVERTER PANEL. INPUT VOLTAGE 480V, 3PHASE, OUTPUT VOLTAGE 480/277V, 12 HOUR BATTERY RECHARGE, FACTORY STARTUP PROGRAM, NORMALLY ON OUTPUT CIRCUIT BREAKERS. UNIT SHALL HAVE A MINIMUM OF (10) 277V-1P CIRCUIT BREAKERS. COORDINATE FINAL INSTALLATION REQUIREMENTS WITH MANUFACTURER.



N

1 E1.01 OVERALL POWER PLAN

Scale: 1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
Ryan D. Morris
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

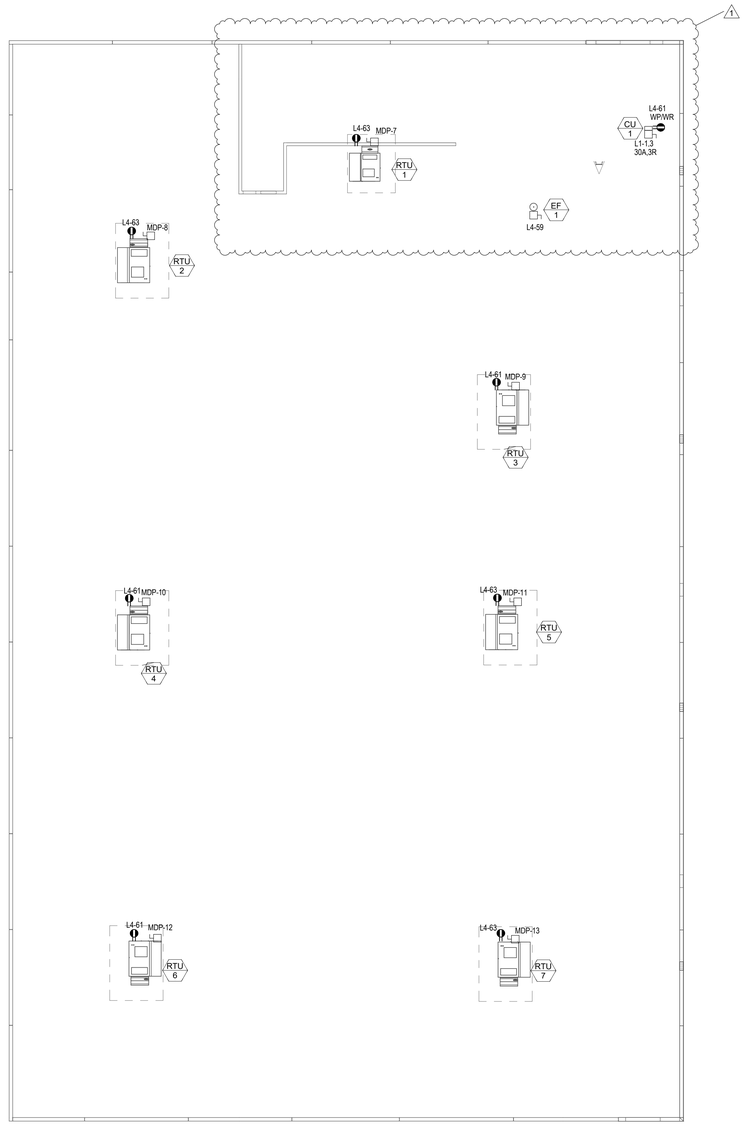
Sheet Title:
OVERALL POWER PLAN

E1.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

GENERAL NOTES

1. RTU AND EXHAUST FAN DISCONNECTS ARE FACTORY INSTALLED
2. RTU RECEPTACLES ARE FACTORY INSTALLED.
3. PROVIDE CONDUCTORS, CONDUIT, AND CONNECTIONS FROM OUTDOOR UNIT TO CORRESPONDING INDOOR UNIT PER MANUFACTURER'S INSTRUCTIONS.



N

1 / E1.02 ROOF EQUIPMENT POWER PLAN

Scale: 1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 16416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:

ROOF EQUIPMENT POWER PLAN

E1.02

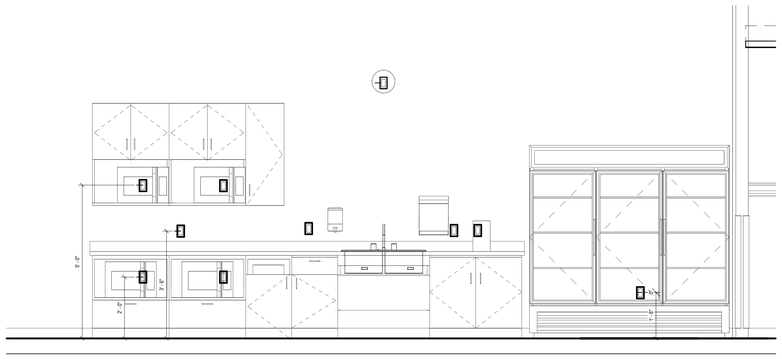
IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegceso.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

GENERAL NOTES

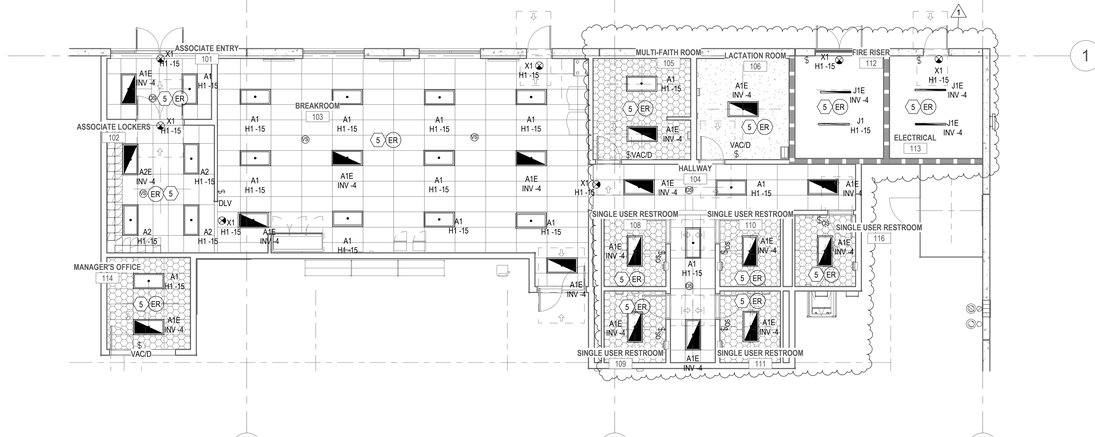
1. PROVIDE CONDUCTORS, CONDUIT, AND CONNECTIONS FROM OUTDOOR UNIT TO CORRESPONDING INDOOR UNIT PER MANUFACTURER'S INSTRUCTIONS.
2. COORDINATE EXACT REQUIREMENTS OF JOCKEY PUMP WITH INSTALLER
3. UH ARE PROVIDED WITH FACTORY INSTALLED INTEGRAL DISCONNECT. TYP.
4. EF-2 HAS AN INTEGRAL DISCONNECT PROVIDED WITH THE UNIT.

KEYNOTES

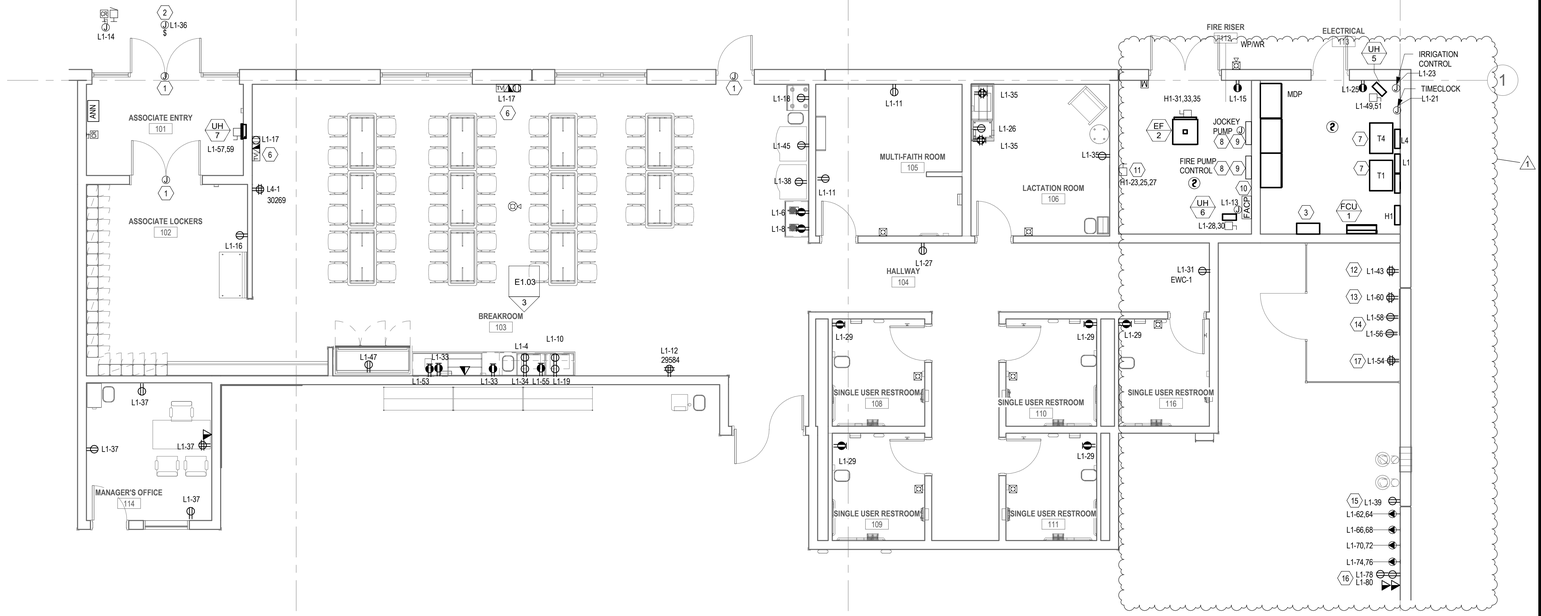
1 PROVIDE ALL REQUIRED ELECTRICAL CONNECTIONS (120V CONNECTIONS, JUNCTION BOXES AND CONDUIT) FOR SECURED DOOR. PROVIDE 120V CONNECTION FROM NEAREST RECEPTACLE CIRCUIT. REFER TO 'DOOR ACCESS WITH CARD READER DETAIL ON 4/E4.02 FOR MOUNTING OF DEVICES. COORDINATE QUANTITY AND TYPE OF OF DEVICES REQUIRED AND ANY ASSOCIATED CONDUITS REQUIRED FOR EACH DOOR TYPE WITH SECURITY SYSTEMS VENDOR. FIELD COORDINATE LOCATION OF ALL SECURED DOORS WITH OWNERS REPRESENTATIVE PRIOR TO ROUGH-IN.
2 PROVIDE WEATHERPROOF JUNCTION BOX AND PULLSTRING FOR EXTERIOR SIGNAGE. COORDINATE EXACT LOCATION WITH OWNER PRIOR TO INSTALLATION.
3 ARC FLASH RELAY AND UPS. REFER TO 5/E4.02
4 DATA OUTLET FOR TIME CLOCK. COORDINATE EXACT MOUNTING HEIGHT AND LOCATION WITH ARCHITECT.
5 PROVIDE RELAY EQUAL TO WATTSTOPPER #ELCU-200. RELAY SHALL BE CONNECTED AS 'CONTROL' DEVICE WHERE THE EMERGENCY LIGHTS WILL BE CONTROLLED IN THE SAME MANNER AS THE LOCAL NORMAL LIGHTS. REFER 2/E4.02
6 REFER TO RECEPTACLE LEGEND ON E0.01 FOR MOUNTING HEIGHT.
7 REFER 7/E4.01
8 COORDINATE EXACT LOCATION WITH FIRE SPRINKLER CONTRACTOR.
9 COORDINATE ELECTRICAL REQUIREMENTS WITH FIRE SPRINKLER CONTRACTOR.
10 TAMPER AND FLOW SWITCHES: COORDINATE EXACT LOCATION WITH FIRE SPRINKLER CONTRACTOR.
11 DOMESTIC BOOSTER PUMP
12 PROVIDE QUAD RECEPTACLE AND (2) 2" CONDUITS FROM BACKBOARD UP TO 1'-6" BELOW ROOF STRUCTURE FOR FIBER DEMARCATION EXTENSION CABLING FOR DEMARC AS SHOWN. VERIFY EXACT LOCATION WITH PROJECT MANAGER AND REQUIREMENTS WITH MANUFACTURER PRIOR TO INSTALLATION.
13 TELECOMMUNICATIONS BACKBOARD. COORDINATE REQUIREMENTS WITH I.T. SYSTEMS INSTALLER/PROJECT CONSTRUCTION MANAGER. BACKBOARD SHALL BE PAINTED ON ALL SIDES WITH FIRE RETARDANT PAINT, GRAY FINISH.
14 PROVIDE TELECOMMUNICATION EQUIPMENT GROUND BAR WITH #6 BONDING CONDUCTOR TO BUILDING STEEL. BOND TO NEAREST ADJACENT PANEL WITH #6 GROUND WIRE. COORDINATE EXACT GROUND BAR REQUIREMENTS WITH OWNERS DEPARTMENT. REFER 1/E4.01
15 IDF: PROVIDE RECEPTACLE AND (4)2" CONDUITS TO 1'-6" BELOW ROOF STRUCTURE FOR INTRA BUILDING BACKBONE AND HORIZONTAL CABLING FOR IDF. VERIFY EXACT LOCATION AND REQUIREMENTS WITH SECURITY AND TELECOM DRAWINGS PRIOR TO INSTALLATION. REFER TO 2/E4.03.
16 REFER 6/E4.01
17 REFER 1/E4.07



3 E1.03 BREAKROOM ELEVATION
Scale: 1/2" = 1'-0"



2 E1.03 ENLARGED OFFICE LIGHTING PLAN
Scale: 1/8" = 1'-0"



1 E1.03 ENLARGED OFFICE POWER PLAN
Scale: 3/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 16416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ENLARGED OFFICE ELECTRICAL PLANS

E1.03

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

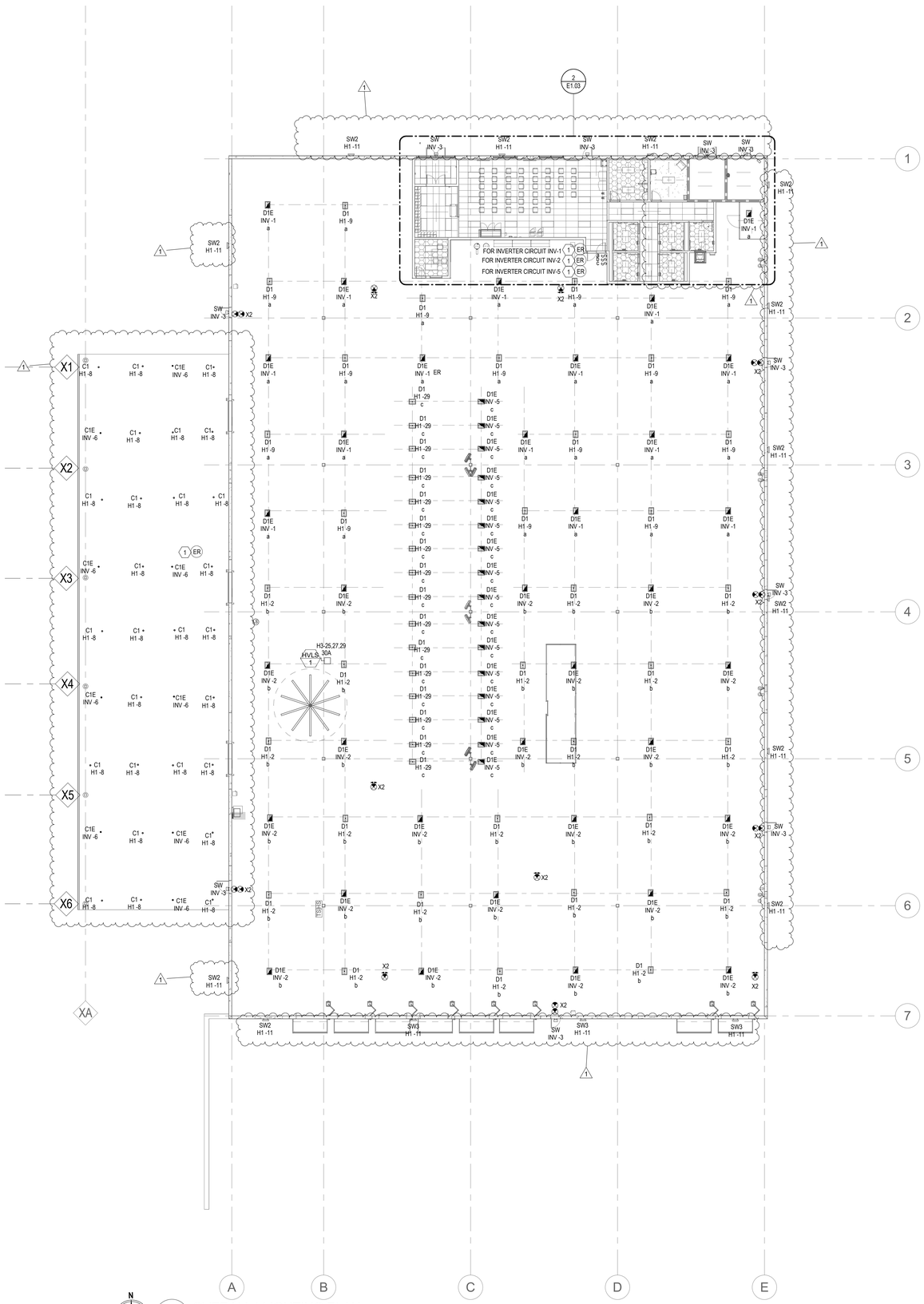
0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

GENERAL NOTES

1. CANOPY AND EXTERIOR BUILDING MOUNTED LIGHTING CONTROLLED VIA ASTRONOMICAL TIMECLOCK.
2. CONNECT HVLS FANS TO FIRE ALARM SYSTEM. HVLS FANS SHALL SHUT DOWN WHEN FIRE ALARM SYSTEM IS ACTIVATED.
3. COORDINATE LOCATION OF HVLS CONTROLLER WITH MECHANICAL PLANS.
4. PROVIDE ONE EXIT SIGN MOUNTED SO THAT THE BOTTOM IS 6" ABOVE DOOR FRAME AND A SECOND EXIT SIGN ABOVE IT ON THE WALL AT 15'-0" AFF. TYP OF ALL EGRESS DOORS IN WAREHOUSE.

KEYNOTES

1 PROVIDE RELAY EQUAL TO WATTSPROPPER #ELCU-200. RELAY SHALL BE CONNECTED AS "CONTROL" DEVICE WHERE THE EMERGENCY LIGHTS WILL BE CONTROLLED IN THE SAME MANNER AS THE LOCAL NORMAL LIGHTS. REFER 2/E4.02.



N

1 E2.01 OVERALL LLIGHTING PLAN
Scale: 1/16" = 1'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

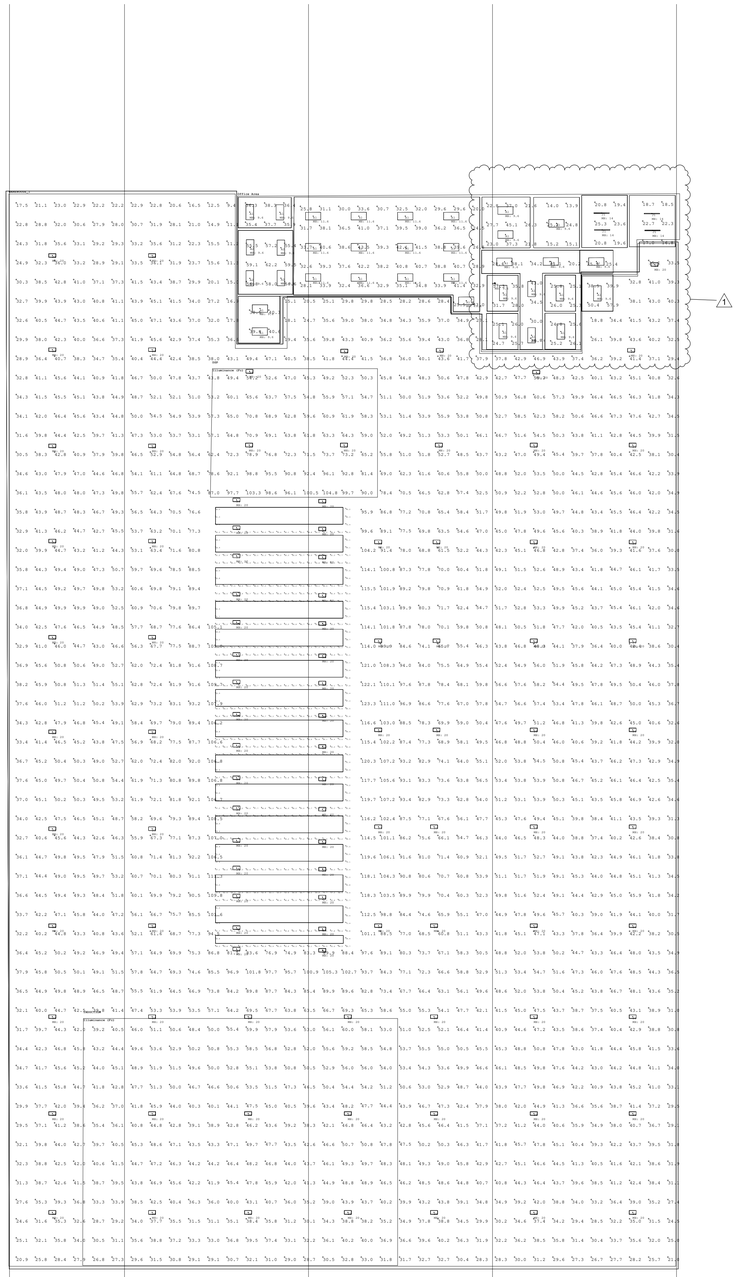
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
OVERALL LIGHTING PLAN

E2.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



1 / E2.02 INTERIOR LIGHTING PHOTOMETRIC PLAN
Scale: 1/16" = 1'-0"

Calculation Summary							
Label	CalcType	Units	Avg	Max	Min	Avg/Min	Max/Min
Breakroom_Workplane	Illuminance	Fc	35.00	43.5	20.0	1.75	2.18
Electrical_1_Workplane	Illuminance	Fc	25.65	25.9	25.4	1.01	1.02
Electrical_Workplane	Illuminance	Fc	19.33	22.7	16.8	1.15	1.35
Entry_Workplane	Illuminance	Fc	36.67	38.3	35.4	1.04	1.08
Fire Riser_Workplane	Illuminance	Fc	21.58	25.3	19.4	1.11	1.30
Hallway_Workplane	Illuminance	Fc	34.24	43.0	20.2	1.70	2.13
LActation_Workplane	Illuminance	Fc	18.03	25.2	13.9	1.30	1.81
Locker_Workplane	Illuminance	Fc	57.81	62.2	55.4	1.04	1.12
Manager_Workplane	Illuminance	Fc	39.60	40.6	38.5	1.03	1.05
MultiFaith_Workplane	Illuminance	Fc	29.18	45.1	21.6	1.35	2.09
New Bathroom_Workplane	Illuminance	Fc	46.68	57.9	38.5	1.21	1.50
RACKING _1	Illuminance	Fc	52.17	80.8	18.3	2.85	4.42
RR 1_Workplane	Illuminance	Fc	38.20	57.3	28.0	1.36	2.05
RR 2_Workplane	Illuminance	Fc	25.38	26.0	24.7	1.03	1.05
RR 3_Workplane	Illuminance	Fc	25.55	26.0	25.1	1.02	1.04
RR 4_Workplane	Illuminance	Fc	25.43	26.1	24.8	1.03	1.05
Warehouse_Workplane	Illuminance	Fc	51.00	123.3	9.4	5.43	13.12
DSP	Illuminance	Fc	71.60	104.8	45.3	1.58	2.31
INDUCTION	Illuminance	Fc	43.47	60.0	26.8	1.62	2.24

LPD Area Summary			
Label	Area	Total Watts	LPD
Office Area	3347	1274.76	0.381
WAREHOUSE_1	45198	15052.66	0.333

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 16416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
INTERIOR LIGHTING PHOTOMETRICS

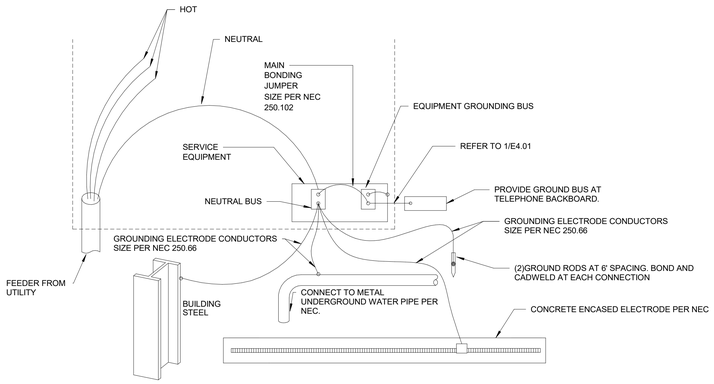
E2.02

N

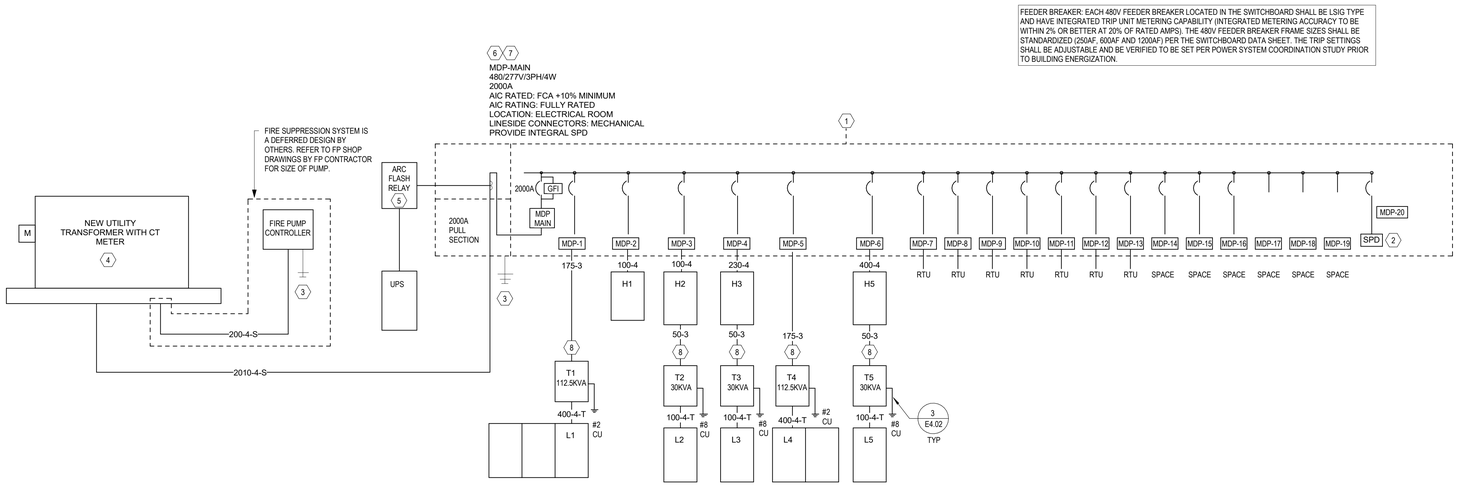
IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



1 E3.01 SERVICE GROUNDING DETAIL
Scale: NTS



2 E3.01 RISER DIAGRAM
Scale: NTS

ELECTRICAL SERVICE NOTES

1. THE ELECTRICAL CONTRACTOR SHALL VERIFY ALL SERVICE AND METERING REQUIREMENTS WITH THE UTILITY COMPANY PRIOR TO BID AND SHALL BE RESPONSIBLE FOR PROVIDING AND INSTALLING ALL MATERIAL AS REQUIRED BY THE SERVING UTILITY AS WELL AS COST INCURRED BY SERVING UTILITY.
2. ALUMINUM SERVICE CONDUCTORS ARE NOT RECOMMENDED AND SHOULD ONLY BE USED WHERE ABSOLUTELY NECESSARY OR REQUIRED BY THE OWNER. CONTRACTOR TO CONTACT ENGINEER FOR SIZING. WHERE ALUMINUM CONDUCTORS ARE USED, THE OWNER SHALL PROVIDE ANNUAL MAINTENANCE OF ALL TERMINATIONS TO ENSURE SECURE CONNECTIONS. ALUMINUM WIRE WILL EXPAND AND CONTRACT AND OVER TIME MAY BECOME BRITTLE. THE OWNER SHALL ASSUME RESPONSIBILITY FOR USING ALUMINUM CONDUCTORS WITHOUT PROPER INSTALLATION, CARE, AND MAINTENANCE.
3. COORDINATE ALL SERVICE AND METERING DETAILS INCLUDING ANY RELOCATION OF EXISTING UTILITY LINES WITH POWER COMPANY.
4. CONTRACTOR TO CONFIRM EXACT LOCATION OF METERS WITH ELECTRIC UTILITY.
5. PAY ANY POWER COMPANY FEES CHARGED TO OWNER FOR SERVICE AND UTILITY LINE WORK ASSOCIATED WITH THIS PROJECT. THESE COSTS SHALL BE INCLUDED IN BIDS.
6. FURNISH AND INSTALL MATERIALS FOR A TEMPORARY CONSTRUCTION SERVICE AS REQUIRED.
7. FURNISH AND/OR INSTALL ALL REQUIRED MATERIAL AND LABOR IN COMPLIANCE WITH POWER COMPANY REQUIREMENTS TO PROVIDE A COMPLETE ELECTRICAL SERVICE, INCLUDING TRENCHING AND BACK FILLING, PRIMARY CONDUIT, CONCRETE TRANSFORMER PAD, SECONDARY CONDUITS AND CABLES, C.T. CABINET, METERING AND GROUNDING SYSTEM.

ELECTRICAL FEEDERS

GENERAL NOTES:
1. CONDUIT SIZE IS BASED ON CONDUIT AND CONDUCTOR PROPERTIES LISTED IN THE NEC, CHAPTER 9. OTHER CONDITIONS MAY REQUIRE A LARGER CONDUIT.
• TABLE 4, EMT WITH 40% FILL.
• TABLE 5, THHN/THWN WIRE FOR COPPER CONDUCTORS.
• TABLE 9A, XHHW-2 WIRE FOR ALUMINUM CONDUCTORS.
2. EQUIPMENT GROUNDING CONDUCTOR SIZE IS BASED ON NEC TABLE 250.122.
3. FOR SEPARATELY DERIVED SYSTEMS, INDICATED WITH -T, THE SUPPLY SIDE BONDING JUMPER SIZE IS BASED ON NEC TABLE 250.102(C)(1).
4. CONDUCTOR SIZES ARE BASED ON NEC TABLE 310.16, 60°C FOR FEEDERS 100A AND LESS, AND 75°C FOR FEEDERS OVER 100A.

CALLOUT	COPPER
50-3	3/4"C.,3#8,1#10 GR
100-4	1 - 1 1/4"C.4#3,1#8 GR
100-4-T	1 - 1 1/4"C.4#3,1#8 GR
175-3	1 - 1 1/2"C.,3#2/0,1#6 GR
200-4-S	2"C.4#3/0
230-4	1 - 2 1/2"C.4#4/0,1#4 GR
400-4	2 - 2"C.4#3/0,1#3 GR EACH
400-4-T	2 - 2"C.4#3/0,1#2 GR EACH
2010-4-S	6 - 3"C.4-400KCMIL EACH

KEYNOTES

1. PROVIDE EXTERNAL SCHNEIDER ELECTRIC PM8000 POWER METER.
2. SURGE PROTECTION DEVICE (SPD) UNIT MOUNTED ABOVE PANEL. CONTRACTOR SHALL KEEP CONNECTION DISTANCE AS SHORT AS POSSIBLE. MAXIMUM DISTANCE 18". SPD SHALL BE UL 1449 FOURTH EDITION RATED, TYPE 2 WITH A MINIMUM NOMINAL DISCHARGE CURRENT OF 20KA, AN AUDIBLE ALARM AND (1) SET OF DRY CONTACTS. (LEA #SP200). PROVIDE (4)#3, (1)#8G, IN 1-1/4"C.
3. PROVIDE NEW GROUNDING PER 1/E3.01
4. NEW UTILITY METER LOCATED ON NEW UTILITY TRANSFORMER. COORDINATE REQUIREMENTS AND INSTALLATION WITH UTILITY COMPANY.
5. PROVIDE SCHWEITZER ENGINEERING LABORATORIES SEL-751A FEEDER PROTECTION RELAY WITH ARC-FLASH PROTECTION OPTION (PART # SEL75100IACA0X7781B00). RELAY TO BE LOCATED WITHIN TEN FEET OF SWITCHBOARD. REFER TO ARC FLASH RELAY DETAIL ON SHEET E4.04 FOR ADDITIONAL INFORMATION
6. MANUFACTURER TO PROVIDE A SHORT CIRCUIT-STUDY, SELECTIVE COORDINATION STUDY AND ARC FLASH ANALYSIS FOR THE ELECTRICAL DISTRIBUTION SYSTEM. ADJUST TRIP SETTINGS ON CIRCUIT BREAKERS & MODIFY SHORT CIRCUIT RATINGS OF ELECTRICAL EQUIPMENT PER THE RESULTS. OVERCURRENT PROTECTIVE DEVICES SHALL BE SELECTIVELY COORDINATED FOR DISTRIBUTION SYSTEMS.
7. PROVIDE METERING SYSTEM AS REQUIRED BY ASHRAE 90.1 8.4.3.1
8. SUB-METER AS RECEPTACLE LOAD PER ASHRAE 90.1 8.4.3.1

EQUIPMENT LABELS

ALL SWITCHBOARDS AND PANELBOARDS SHALL HAVE A LABEL, APPLIED TO WARN OF POTENTIAL ARC FLASH HAZARDS

WARNING

ARC FLASH AND SHOCK HAZARD. APPROPRIATE PERSONAL PROTECTIVE EQUIPMENT (PPE) REQUIRED.

NOTES:

A. ALL SWITCHBOARDS AND PANELBOARDS SHALL HAVE A COMMERCIALLY PRODUCED PERMANENT LABEL APPLIED, SIMILAR TO THE ABOVE, TO WARN OF POTENTIAL ARC FLASH HAZARDS, IN ACCORDANCE WITH NEC 110.16 AND NFPA 70E.

B. LABELING MAY BE COMPLETED BY EQUIPMENT MANUFACTURER, EQUIPMENT VENDOR/SUPPLIER, OR THE CONTRACTOR. THE CONTRACTOR SHALL VERIFY THAT ALL SWITCHBOARDS AND PANELBOARDS ARE PROPERLY LABELED IN THE FIELD.

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL RISER AND SCHEDULES

E3.01

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

LIGHTING CONTROL DEVICE SCHEDULE

LINE-VOLTAGE LIGHTING CONTROL SYSTEMS

LINE-VOLTAGE WALL SWITCH OCCUPANCY SENSORS

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	COVERAGE (W x D)	VOLTAGE	NOTES
H-OS $OS $VAC	COOPER	ACUITY HUBBELL GE	WALL MOUNT DUAL TECHNOLOGY OCCUPANCY SENSOR, INTEGRAL MANUAL OVERRIDE SWITCH, SINGLE RELAY, LINE-VOLTAGE. SAME DEVICE, CONFIGURED IN VACANCY MODE	PIR MAJOR 30' x 35' PIR MINOR 15' x 20' ULT MAJOR 20' x 20' ULT MINOR 15' x 15'	120/277	A

LINE-VOLTAGE DIMMING WALL SWITCH OCCUPANCY SENSORS

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	COVERAGE (W x D)	VOLTAGE	NOTES
H-OS D $OSD $VACD	COOPER	ACUITY HUBBELL GE	WALL MOUNT DUAL TECHNOLOGY OCCUPANCY SENSOR, MULTI-WAY, INTEGRAL MANUAL OVERRIDE SWITCH, SINGLE RELAY, LINE-VOLTAGE, 0-10V DIMMING. SAME DEVICE, CONFIGURED IN VACANCY MODE	PIR MAJOR 30' x 35' PIR MINOR 15' x 20' ULT MAJOR 20' x 20' ULT MINOR 15' x 15'	120/277	A

LOW-VOLTAGE LIGHTING CONTROL SYSTEMS

LOW-VOLTAGE OCCUPANCY SENSORS

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	COVERAGE (W x D)	VOLTAGE	NOTES
OS OS VS	COOPER	ACUITY HUBBELL GE	CEILING MOUNT DUAL TECHNOLOGY OCCUPANCY SENSOR 360 DEGREE COVERAGE, LOW-VOLTAGE, ISOLATED RELAY SAME DEVICE, CONFIGURED IN VACANCY MODE	PIR MAJOR 36' Ø PIR MINOR 25' Ø ULT 36' x 36'	24	A

LOW-VOLTAGE POWER PACKS

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	VOLTAGE	NOTES
PP	COOPER	ACUITY HUBBELL GE	POWER PACK FOR LOW-VOLTAGE OCCUPANCY SENSORS, MANUAL AND AUTO-ON MODES, PROVIDE SWITCHING POWER PACKS WHERE SPACES ARE PROVIDED WITH ON/OFF SWITCH, PROVIDE DIMMING POWER PACKS WHERE SPACES PROVIDED WITH DIMMING SWITCHES.	120/277	A

DAYLIGHT SENSORS

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	VOLTAGE	NOTES
D	COOPER	ACUITY HUBBELL GE	CEILING MOUNT DAYLIGHT SENSOR.	24	A

LOW-VOLTAGE SWITCHES

SYMBOL TAG	MANUFACTURER MODEL/SERIES	ALTERNATE MANUFACTURER	DEVICE DESCRIPTION	VOLTAGE	NOTES
$ LV	COOPER	ACUITY HUBBELL GE	MOMENTARY 1-BUTTON DECORA SWITCH FOR MANUAL ON/OFF CONTROL OF STAND-ALONE LOW-VOLTAGE OCCUPANCY SENSORS, INTEGRAL LED ILLUMINATES WHEN LOAD IS ON.	120/277	A
$ DLV	COOPER	ACUITY HUBBELL GE	DIGITAL MULTI-BUTTON SWITCH FOR MANUAL ON/OFF AND DIMMING CONTROL. EACH BUTTON HAS INTEGRAL LED THAT ILLUMINATES WHEN LOAD IS ON.	120/277	A
$ SC	COOPER	ACUITY HUBBELL GE	DIGITAL MULTI-BUTTON SWITCH FOR MANUAL ON/OFF AND SCENE CONTROL. EACH BUTTON HAS INTEGRAL LED THAT ILLUMINATES WHEN LOAD IS ON.	120/277	A

GENERAL NOTES:

A. PROVIDE SHOP DRAWINGS FOR ENGINEER AND ARCHITECT REVIEW THAT INCLUDE PRODUCT CUTSHEETS AND PROJECT SPECIFIC LAYOUTS. LAYOUTS MUSH INCLUDE SENSOR LOCATION, HEIGHTS, ORIENTATION, AND COVERAGE AREAS. SHOW COORDINATION WITH ALL CEILING DEVICES INCLUDING BUT NOT LIMITED TO HVAC SUPPLY AND RETURN GRILLES, SPRINKLERS, LIGHT FIXTURES, AND OTHER OWNER-PROVIDED CEILING MOUNTED DEVICES SUCH AS SPEAKERS, SECURITY CAMERAS, PROJECTORS, ETC. (SENSORS MAY BE ADVERSELY AFFECTED IF LOCATED TOO CLOSE TO OTHER CEILING MOUNTED DEVICES), ALSO PROVIDE SCHEMATICS AND SCHEDULES WHEN APPLICABLE.
B. LIGHTING CONTROLS PRICING SHALL BE COMPLETELY SEPARATE OF ANY LIGHT FIXTURE PRICING.
C. VERIFY COLOR(S) FOR ALL WALL AND CEILING MOUNTED DEVICES WITH ARCHITECT.
D. ALL WALL SWITCH AND CEILING SENSORS SHALL HAVE AN ADJUSTABLE TIME DELAY RANGE OF 0-30 MIN. UNLESS NOTED OTHERWISE. CONFIRM SENSOR SETTINGS WITH SEQUENCE OF OPERATIONS AND OWNER PRIOR TO SYSTEM COMMISSIONING.
E. PROVIDE COPIES OF OPERATION AND MAINTENANCE INSTRUCTIONS FOR ALL DEVICES TO OWNER.
F. PROVIDE A NEUTRAL CONDUCTOR TO ALL WALL SWITCH LOCATIONS PER NEC REQUIREMENTS.
G. DO NOT SHARE NEUTRAL CONDUCTOR ON LOAD SIDE OF DIMMERS.

LIGHTING FIXTURE SCHEDULE

GENERAL NOTES:
1.EC SHALL PROVIDE A SUBMITTAL PACKAGE INCLUDING CUTSHEETS FOR EACH FIXTURE.
2.EC SHALL PROVIDE ALL ACCESSORIES FOR A COMPLETE ASSEMBLY INCLUDING MOUNTING HARDWARE.
3.THE MOUNTING TYPE OF EACH FIXTURE SHALL BE COMPATIBLE WITH INSTALLATION SURFACE OF EACH FIXTURE.
4.ALL FINISHES SHALL BE COORDINATED WITH ARCHITECT AND DOCUMENTED ON SUBMITTALS.

TYPE	DESCRIPTION	MOUNTING	LAMP	DIMMING	VOLTAGE	WATTS	MFR	CATALOG NUMBER	NOTE
A1	2X4 RECESSED, 4000K, 4000LM	LAY-IN	LED	0-10V	277	32 W	LITHONIA	2BLT4 40L ADP GZ10 LP840	--
A1E	2X4 RECESSED, 4000K, 4000LM	LAY-IN	LED	0-10V	277	32 W	LITHONIA	2BLT4 40L ADP GZ10 LP840	--
A2	2X4 RECESSED, 4000K, 4800LM	LAY-IN	LED	0-10V	277	38 W	LITHONIA	2BLT4 48L ADP GZ10 LP840	--
A2E	2X4 RECESSED, 4000K, 4800LM	LAY-IN	LED	0-10V	277	38 W	LITHONIA	2BLT4 48L ADP GZ10 LP840	--
C1	CANOPY LIGHT, INTEGRAL MOTION SENSOR	PENDANT	LED	0-10V	277	60 W	COOPER	RPGC25-MS/DIM-L20-FSIR-100	PENDANT MOUNT 14' AFF
C1E	CANOPY LIGHT, INTEGRAL MOTION SENSOR	PENDANT	LED	0-10V	277	60 W	COOPER	RPGC25-MS/DIM-L20-FSIR-100	PENDANT MOUNT 14' AFF
D1	LED HIGHBAY, UNV VOLTAGE, 5000K, WIDE DIST., INTEGRAL OCC SENSOR	LAY-IN	LED	0-10V	277	149 W	LITHONIA	CPHB-24000LM-HEF-GCL-WD-MVOLT-GZ1 0-50K-80CRI-LSXR6ADC-DWH-IBAC120M1 00	MOUNT 20' AFF
D1E	LED HIGHBAY, UNV VOLTAGE, 5000K, WIDE DIST., INTEGRAL OCC SENSOR, EMERGENCY	LAY-IN	LED	0-10V	277	149 W	LITHONIA	CPHB-24000LM-HEF-GCL-WD-MVOLT-GZ1 0-50K-80CRI-LSXR6ADC-DWH-IBAC120M1 00 LAXR6 ADC ER	MOUNT 20' AFF
F1	4' 1500LM LED RECESSED DOWNLIGHT, 3500K, 80CRI, UNV VOLTAGE	RECESSED	LED	0-10V	277	21 W	LITHONIA	LDN4-35/15-L04AR-LSS-MVOLT-GZ10	--
F1E	4' 1500LM LED RECESSED DOWNLIGHT, 3500K, 80CRI, UNV VOLTAGE	RECESSED	LED	0-10V	277	21 W	LITHONIA	LDN4-35/15-L04AR-LSS-MVOLT-GZ10	--
J1	4' LED STRIP W FROSTED LENS COVER, 4000K, 5000LM, UNV VOLTAGE	SURFACE	LED	NA	277	47 W	METALUX	4SNLED-LD5-50SL-LW-UNV-L840-CD1-U	--
J1E	4' LED STRIP W FROSTED LENS COVER, 4000K, 5000LM, UNV VOLTAGE	SURFACE	LED	NA	277	47 W	METALUX	4SNLED-LD5-50SL-LW-UNV-L840-CD1-U	--
SL1	AREA LIGHT, HEAD MOUNT AT 25'	SQUARE POLE	LED	NA	277	165 W	LITHONIA	DSX1 LED P8 50K 70CRI T3M HS	--
SL2	AREA LIGHT,(2) HEADS BACK-TO-BACK, HEAD MOUNT AT 25'	SQUARE POLE	LED	NA	277	330 W	LITHONIA	DSX1 LED P8 50K 70CRI T4M	--
SL4	AREA LIGHT, HEAD MOUNT AT 25'	SQUARE POLE	LED	NA	277	165 W	LITHONIA	DSX1 LED P8 50K 70CRI T4M HS	--
SW	EXTERIOR WALL PACK, INTEGRAL MOTION SENSOR	WALL	LED	NA	277	50 W	LITHONIA	WST-LED-P3-40K-VF-MVOLT-NLTAIR2PIR	WALL MOUNT PER ARCHITECTURAL ELEVATIONS
SW2	EXTERIOR SURFACE MOUNT, INTEGRAL MOTION SENSOR	SURFACE WALL HORIZONTAL	LED	NA	277	77 W	LITHONIA	WDGE3 LED P3 50K 70CRI R4	SURFACE MOUNT AT 16'AFG
SW3	EXTERIOR SURFACE MOUNT, INTEGRAL MOTION SENSOR	SURFACE WALL HORIZONTAL	LED	NA	277	73 W	LITHONIA	WDGE4 LED P1 50K 70CRI R2	SURFACE MOUNT 20'AFG
X1	EXIT SIGN THERMOPLASTIC, UNIV SIDE, UNIV CHEVRON, UNIV MOUNT, RED LETTERS	CEILING	LED	NA	277	5 W	SURELITES	APX7R	
X2	EXIT SIGN, THERMOPLASTIC, UNIV SIDE, UNIV CHEVRON, PENDANT MOUNT, RED LETTERS	PENDANT	LED	NA	277	5 W	SURELITES	LPX7/LPX18PKWH	PENDANT MOUNT

NEW SWITCHBOARD: MDP

Location: ELECTRICAL 116
Supply From: UTILITY
Mounting: SURFACE
Enclosure: NEMA 1
Volts: 480Y/277
Phases: 3
Wires: 4
Panel Notes:
A.I.C. Rating: Note (7) Fully Rated
Mains Type: MCB
Mains Rating: 2000.0 A

CKT	Circuit Description	Load Class	# of Poles	Trip Rating	Load	Notes
1	T1 (8)(16)	R; K; ...	3	175.0 A	70833 VA	
2	H1 (8)	L; P; H	3	100.0 A	42112 VA	
3	H2 (8)	R; P	3	100.0 A	9768 VA	
4	H3 (8)	R; P; H	3	225.0 A	82230 VA	
5	T4 (8)(16)	R; P; H	3	175.0 A	97776 VA	
6	H5 (8)	R; P; H	3	400.0 A	216032 VA	
7	RTU-1(13)	H	3	45.0 A	33216 VA	#6
8	RTU-2 (13)	H	3	100.0 A	73075 VA	#1
9	RTU-3 (13)	H	3	100.0 A	73075 VA	#1
10	RTU-4 (13)	H	3	100.0 A	73075 VA	#1
11	RTU-5 (13)	H	3	100.0 A	73075 VA	#1
12	RTU-6 (13)	H	3	100.0 A	73075 VA	#1
13	RTU-7 (13)	H	3	100.0 A	73075 VA	#1
14	SPACE	--	1	--	--	
15	SPACE	--	1	--	--	
16	SPACE	--	1	--	--	
17	SPACE	--	1	--	--	
18	SPACE	--	1	--	--	
19	SPACE	--	1	--	--	
20	SPD	--	3	100.0 A	0 VA	
				Total Load:	990.42	kVA
				Total Amps	1191.3	Amps

Load Classification	Connected Load	Demand Factor	Estimated Demand	Panel Totals	
Spare	86400 VA	100.00%	86400 VA		
(R) RECEPTACLE	23290 VA	71.47%	16645 VA	**Total Connected Load:**	990417 VA
(L) LIGHTING	32313 VA	125.00%	40391 VA	**Total Feeder Load:**	988612 VA
(K) KITCHEN	14180 VA	77.17%	10942 VA	**Total Connnected Current.:**	1191.3 A
(P) NON-CONTINUOUS POWER	172586 VA	100.00%	172586 VA	**Total Feeder Current:**	1189.1 A
(H) HVAC	661648 VA	100.00%	661648 VA		

LIGHTING CONTOL SEQUENCE OF OPERATIONS

A. HOURS OF OPERATION
General Note: Confirm all timeclock schedules and sensor time delays with owner prior to final programming.
Occupied Hours: Sun-Sat 12:00 AM - 11:59 PM
Business Hours: Sun-Sat 8:00 AM - 11:00 PM
B. GENERAL REQUIREMENTS
1. Emergency Lighting: Emergency egress lighting is powered from central inverters. Upon loss of power, all lights designated as emergency shall turn on at full output.
C. BREAKROOM
1. Timeclock: Space is stand-alone (not networked). Occupancy Sensor Controlled.
2. Daylighting: General lighting within daylight zone shall be continuously dimmed automatically. N/A
3. Manual Control: Occupant can manually control lights via local switch(es).
4. Occupancy: Occupant must manually turn on lights (and if applicable, controlled receptacles).
5. Vacancy: After 20 minutes, all controlled loads shall turn off.
D. OFFICES, CONFERENCE, TRAINING, MOTHER'S ROOM, ABLUTION, QUIET ROOM, ENTRY, SINGLE USER RESTROOMS
1. Timeclock: Space is stand-alone (not networked). Occupancy Sensor Controlled.
2. Daylighting: N/A
3. Manual Control: Occupant can manually control lights via local dimming switch(es).
4. Occupancy: Occupant must manually turn on lights (and if applicable, controlled receptacles).
5. Vacancy: After 20 minutes, all controlled loads shall turn off.
E. ASSOCIATE ENTRY, CORRIDOR
1. Timeclock: Space is stand-alone (not networked). Occupancy Sensor Controlled.
2. Daylighting: N/A
3. Manual Control: Occupant can manually control lights via local switch(es). N/A
4. Occupancy: All controlled loads shall automatically turn on.
5. Vacancy: After 20 minutes, all controlled loads shall be reduced to not less than 50%.
F. RESTROOMS, ALCOVE
1. Timeclock: Space is stand-alone (not networked). Occupancy Sensor Controlled.
2. Daylighting: N/A
3. Manual Control: Occupant can manually control lights via local switch(es). N/A
4. Occupancy: All controlled loads shall automatically turn on.
5. Vacancy: After 20 minutes, all controlled loads shall turn off.
G. WAREHOUSE
1. Timeclock: Space is stand-alone (not networked). Occupancy Sensor Controlled.
2. Daylighting: N/A
3. Manual Control: Occupant can manually control lights via local switch(es).
4. Occupancy: Occupant Sensors mounted in each light fixture will turn on lights to 100%. Each fixture is controlled independently of all other fixtures.
5. Vacancy: After 7.5 minutes fixtures will reduce to 10% light output and after 20 minutes fixtures will turn off.
H. LAUNCH PAD CANOPY
1. Timeclock: Space is networked to a central timeclock
2. Daylighting: All lights will come on at dusk and turn off at dawn.
3. Manual Control: N/A.
I. EXTERIOR LIGHTING
1. Timeclock: N/A
2. Daylighting: Integral photocell in each light fixture. All lights will come on at dusk and turn off at dawn.
3. Manual Control: N/A.
4. Occupancy: Integral occupant sensor in each light fixture will turn on the light to 100%. Each fixture is controlled independently of all other fixtures.
5. Vacancy: After 15 minutes fixtures shall automatically reduce the light output by 30%.

MODULE EQUIPMENT ELECTRICAL CONNECTION SCHEDULE

Module Number	Module Description	Power Requirements	Data Requirements
2878	PHONE BOOTH	1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	1
27472	REGULATED WASTE AREA	1 COMPLETE STATION RATED AT 6 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28166	TIME CLOCK	NA	1
28178	INBOUND SORT MANAGEMENT DESK	2 POWER DROPS REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 10 AMPS, 1 STATION(S) PER 20 AMP CIRCUIT	1
28180	FAST START SORTATION SCAN CAGE	3 POWER DROPS REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 5 STATION(S) PER 20 AMP CIRCUIT	NA
28189	AVERY CAGE	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28219	RTS MANAGEMENT DESK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28228	TDR DRIVER CART	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28236	PROBLEM SOLVE REPACK STATION	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28239	PPE VENDING MACHINE	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28262	LOADOUT COUNTDOWN CLOCK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 1 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28342	INBOUND INDUCT TV	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
28345	DELIVERY STATION LIAISON DESK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29562	BUILDING STARTUP AREA	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29567	WORKING WELL KIOSK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29567	WORKING WELL KIOSK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29584	DRAGONFLY	1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	
29591	OTR MANAGEMENT DESK	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29592	DOCK DOOR	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 30 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
29594	OFFICE SUPPLIES	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 4 AMPS, 4 STATION(S) PER 20 AMP CIRCUIT	NA
30269	HR SELF SERVE	1 POWER DROP REQUIRED PROVIDED BY GC 1 COMPLETE STATION RATED AT 20 AMPS, 1 STATION(S) PER 20 AMP CIRCUIT	NA

NEW PANELBOARD: INV

Location: WAREHOUSE 200
Supply From: H1
Mounting: SURFACE
Enclosure: NEMA 1
Volts: 480Y/277
Phases: 3
Wires: 4
Notes:
A.I.C. Rating: Note (7) Fully Rated
Mains Type:
Mains Rating:

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	WAREHOUSE LIGHTING (14)	L	20	1		2.48	3.31			1	20	L	WAREHOUSE LIGHTING (14)	2
3	EXTERIOR LIGHTING(15)	L	20	1			0.56	0.62		1	20	L	OFFICE AREA LIGHTS(14)	4
5	WAREHOUSE LIGHTING (14)	L	20	1				2.65	0.07	1	20	L	CANOPY LIGHTING(15)	6
7	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	8
9	SPACE	--	--	1	--		--	--		1	--	--	SPACE	10
				Total Load:		5.79	1.18	2.72	kVA					
				Total Amps:		21.8	4.3 A	10.7 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(L) LIGHTING	9689 VA	125.00%	12111 VA		
				Total Conn. Load:	9689 VA
				Total Feeder Load:	12111 VA
				Total Connected Current:	11.7 A
				Total Feeder Current:	14.6 A

EMERGENCY LIGHTING CENTRAL INVERTER SHALL BE 480V
MEYERS ILLUMINATOR HYPERNOVA SYSTEM, FAST CHARGE OR APPROVED EQUALAND SIZED FOR THE KVA OF INVERTER PANEL. INPUT VOLTAGE 480V, 3PHASE, OUTPUT VOLTAGE 480/277V, 12 HOUR BATTERY RECHARGE, FACTORY STARTUP PROGRAM, NORMALLY ON OUTPUT CIRCUIT BREAKERS. UNIT SHALL HAVE A MINIMUM OF (10) 277V-1P CIRCUIT BREAKERS. COORDINATE FINAL INSTALLATION REQUIREMENTS WITH MANUFACTURER

PANELBOARD NOTES (#)

1. TERMINATE GROUND ON ISOLATED GROUND BUS.
2. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-OFF FOR MAINTENANCE).
3. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-ON FOR CRITICAL LOAD).
4. GFI BREAKER FOR PERSONNEL PROTECTION (5mA).
5. GFI BREAKER FOR EQUIPMENT PROTECTION (30mA).
6. CONDUCTOR SIZE SHOWN IN PANEL SCHEDULE HAS BEEN INCREASED FOR VOLTAGE DROP. SIZE EQUIPMENT GROUND PROPORTIONALLY PER NEC. REFERENCE GROUND WIRE SIZING CHART.
7. REFER TO FAULT CURRENT SCHEDULE FOR AVAILABLE FAULT CURRENT FOR INTERRUPT RATINGS.
8. REFER TO ONE-LINE DIAGRAM FOR WIRE SIZES.
9. FACTORY WIRED TO LOAD.
10. THRU CONTROLLER. REFER TO LIGHTING CONTROLLER DETAIL.
11. ADD NEW CIRCUIT BREAKER TO EXISTING PANEL. NEW CIRCUIT BREAKER SHALL MATCH AIC RATING, MANUFACTURER, AND TYPE OF EXISTING CIRCUIT BREAKERS.
12. MATCH AIC RATING OF SERVICING DEVICE.
13. SUB-METER AS HVAC LOAD PER ASHRAE 90.1 8.4.3.1
14. SUB-METER AS INTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
15. SUB-METER AS EXTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
16. SUB-METER AS RECEPTACLE LOAD PER ASHRAE 90.1 8.4.3.1
17. DEVICE LOCATION NOT SHOWN ON PLANS. COORDINATE WITH MHE DRAWINGS.

EQUIPMENT GROUNDING CONDUCTOR SIZING CHART

BRKR AMPS		WIRE SIZE				
15-20	PHASE	12	10	8	6	4
	GROUND	12	10	8	6	4
25-30	PHASE	10	8	6	4	3
	GROUND	10	8	6	4	3
35-50	PHASE	8	6	4	3	2
	GROUND	10	8	4	4	4
60	PHASE	6	4	3	2	1
	GROUND	10	6	6	4	4
70	PHASE	6	4	3	2	1
	GROUND	8	4	4	3	2
80-90	PHASE	4	3	2	1	1/0
	GROUND	8	6	4	4	3
100	PHASE	3	2	1	1/0	2/0
	GROUND	8	6	4	4	3

PER NEC 250.122(B)

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
RYAN D. MORRIS
No. 15418
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL SCHEDULES

E3.02

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

NEW PANELBOARD: H1

Location: ELECTRICAL 121 | **Volts:** 480Y/277 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: MDP | **Phases:** 3 | **Mains Type:** MLO
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 100 A
Enclosure: NEMA 1 | **Notes:**

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	SPACE	--	--	1	--	-- 3.15				1	20	L	WAREHOUSE LIGHTING (14)	2
3	SPACE	--	--	1	--		-- 2.75		#8	1	20	L	SITE LIGHTING(10/15)(6)	4
5	SPACE	--	--	1	--			-- 0.00		1	20	L	SPARE	6
7	SITE LIGHTING(10/15)(6)	L	20	1	#8	3.48 1.80				1	20	L	CANOPY LIGHTING (15)	8
9	WAREHOUSE LIGHTING (14)	L	20	1			2.32 0.00		--	1	20	--	SPARE	10
11	EXTERIOR LIGHTING(10) (15)	L	20	1				1.27 0.00	--	1	20	--	SPARE	12
13	SITE LIGHTING(10/15)(6)	L	20	1	#8	2.38 0.00			--	1	20	--	SPARE	14
15	OFFICE AREA LIGHTING (14)	L	20	1			0.71 0.00		--	1	20	--	SPARE	16
17				1				5.79 0.00	--	1	20	--	SPARE	18
19	INV	L	50	3	#6	1.32 0.00			--	1	20	--	SPARE	20
21							3.25 0.00		--	1	20	--	SPARE	22
23								2.10 0.00	--	1	20	--	SPARE	24
25	DOMESTIC BOOSTER PUMP	P	20	3		2.10 0.00			--	1	20	--	SPARE	26
27							2.10 0.00		--	1	20	--	SPARE	28
29	WAREHOUSE LIGHTING (14)	L	20	1				2.65 --	--	1	--	--	SPACE	30
31						1.16 --			--	1	--	--	SPACE	32
33	EF-2(13)	H	15	3			1.16 --		--	1	--	--	SPACE	34
35								1.16 --	--	1	--	--	SPACE	36
37	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
			Total Load:			15.40	12.29	12.98	kVA					
			Total Amps:			56.0	44.4 A	47.2 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(L) LIGHTING	30877 VA	125.00%	38597 VA		
(P) NON-CONTINUOUS POWER	6311 VA	100.00%	6311 VA	**Total Conn. Load:**	40676 VA
(H) HVAC	3488 VA	100.00%	3488 VA	**Total Feeder Load:**	48396 VA
				Total Connected Current:	48.9 A
				Total Feeder Current:	58.2 A

NEW PANELBOARD: H2

Location: WAREHOUSE 200 | **Volts:** 480Y/277 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: MDP | **Phases:** 3 | **Mains Type:** MLO
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 100 A
Enclosure: NEMA 1 | **Notes:**

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1						1.26 --			--	1	--	--	SPACE	2
3	T2 (8)(16)	R; P	50	3			4.15 --		--	1	--	--	SPACE	4
5								4.00 --	--	1	--	--	SPACE	6
7	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	8
9	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	10
11	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	12
13	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	14
15	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	16
17	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	18
19	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	20
21	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	22
23	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	24
25	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	26
27	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	28
29	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	30
31	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	32
33	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	34
35	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	36
37	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
			Total Load:			1.26	4.15	4.00	kVA					
			Total Amps:			4.5	16.5 A	15.9 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	2340 VA	100.00%	2340 VA		
(P) NON-CONTINUOUS POWER	7068 VA	100.00%	7068 VA	**Total Conn. Load:**	9408 VA
				Total Feeder Load:	9408 VA
				Total Connected Current:	11.3 A
				Total Feeder Current:	11.3 A

NEW PANELBOARD: H5

Location: WAREHOUSE 200 | **Volts:** 480Y/277 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: MDP | **Phases:** 3 | **Mains Type:** MLO
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 400 A
Enclosure: NEMA 1 | **Notes:**

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1						8.86 1.26				3	50	R; P	T5 (8)(16)	2
3	UH-1 (13)	H	40	3	#8		8.86 1.08							4
5								8.86 1.08						6
7						8.86 4.43								8
9	UH-2 (13)	H	40	3	#8		8.86 4.43			3	20	P	OH DOOR	10
11								8.86 4.43						12
13						8.86 4.43								14
15	UH-3 (13)	H	40	3	#8		8.86 4.43			3	20	P	OH DOOR	16
17								8.86 4.43						18
19						8.86 4.43								20
21	UH-4 (13)	H	40	3	#8		8.86 4.43			3	20	P	OH DOOR	22
23								8.86 4.43						24
25						4.43 4.43								26
27	OH DOOR	P	20	3			4.43 4.43			3	20	P	OH DOOR	28
29								4.43 4.43						30
31						4.43 4.43								32
33	OH DOOR	P	20	3			4.43 4.43			3	20	P	OH DOOR	34
35								4.43 4.43						36
37	SPACE	--	--	1	--	-- 4.43								38
39	SPACE	--	--	1	--		-- 4.43			3	20	P	OH DOOR	40
41	SPACE	--	--	1	--			-- 4.43						42
43	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	44
45	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	46
47	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	48
49	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	50
51	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	52
53	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	54
55	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	56
57	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	58
59	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	60
61	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	62
63	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	64
65	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	66
			Total Load:			72.13	71.95	71.95	kVA					
			Total Amps:			260.4	259.7 A	259.7 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	3060 VA	100.00%	3060 VA		
(P) NON-CONTINUOUS POWER	106680 VA	100.00%	106680 VA	**Total Conn. Load:**	216032 VA
(H) HVAC	106292 VA	100.00%	106292 VA	**Total Feeder Load:**	216032 VA
				Total Connected Current:	259.8 A
				Total Feeder Current:	259.8 A

NEW PANELBOARD: L1

Location: ELECTRICAL 121 | **Volts:** 208Y/120 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: T1 | **Phases:** 3 | **Mains Type:** MCB
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 400 A
Enclosure: NEMA1 | **Notes:** MEter entire panel as (16) RECEPTACLE and deduct the four HVAC meters shown

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	CU-1(13)	H	25	2	#10	1.98 0.00			--	1	20	--	SPARE	2
3							1.98 1.50			1	20	K	MICROWAVE(4)	4
5	JOCKEY PUMP	P	20	3				1.92 1.50		1	20	K	COFFEE	6
7						1.92 1.50				1	20	K	COFFEE	8
9							1.92 1.50			1	20	K	MICROWAVE(4)	10
11	QUIET/CONTEMPLATION	R	20	1				0.36 0.36		1	20	R	29584 PROJECT DRAGONFLY	12
13	FACP(3)	P	20	1		0.18 0.18				1	20	P	ADA PEDESTAL	14
15	FIRE RISER 112	R	20	1			0.18 0.18			1	20	R	ASSOC LOCKERS	16
17	TVS	R	20	1				0.36 1.20		1	20	P	VENDING (4)	18
19	MICROWAVE(4)	K	20	1		1.50 0.19				2	20	R	CP-1	20
21	TIMECLOCK	P	20	1			0.18 0.19							22
23	IRRIGATION CONTROL	P	20	1				0.18 0.00	--	1	20	--	SPARE	24
25	ELECTRICAL 113	R	20	1		0.18 0.18				1	20	R	UC REF (4)	26
27	HALLWAY	R	20	1			0.18 2.50		#10	2	30	H	UH-6 (13)	28
29	RESTROOM RECEPS	R	20	1				0.90 2.50						30
31	EWC-1(4)	P	20	1		0.37 0.00			--	1	20	--	SPARE	32
33	BREAKROOM RECEP	K	20	1			1.68 1.50			1	20	K	MICROWAVE(4)	34
35	LACTATION	R	20	1				0.90 0.18		1	20	P	EXTERIOR SIGNAGE	36
37	MANAGER OFFICE 112	R	20	1		0.90 1.20				1	20	P	VENDING (4)	38
39	IDF(3)	R	20	1			0.18 2.25		#10	2	30	P	WH-1	40
41	JANITOR/SCRUBBER	R	20	1				0.36 2.25						42
43	ISP ANTENNAE	R	20	1		0.36 2.25			#10	2	30	P	WH-2	44
45	VENDING (4)	P	20	1			1.20 2.25							46
47	REFRIGERATOR(4)	K	20	1				1.00 0.00	--	1	20	--	SPARE	48
49	UH-5(13)	H	30	2	#10	2.50 0.00			--	1	20	--	SPARE	50
51							2.50 0.00		--	1	20	--	SPARE	52
53	SODA	K	20	1				1.00 0.36		1	20	R	CABLING DEMARC	54
55	BREAKROOM RECEP	K	20	1		1.50 0.18				1	20	R	PHONE BOARD	56
57	UH-7(13)	H	20	2			1.30 0.18			1	20	R	PHONE BOARD	58
59								1.30 0.36		1	20	R	PHONE BOARD	60
61	SPARE	--	20	1	--	0.00 1.66			#10	2	30	P	TB ENCLOSURE	62
63	SPARE	--	20	1	--		0.00 1.66							64
65	SPARE	--	20	1	--			0.00 1.66	#10	2	30	P	TB ENCLOSURE	66
67	SPARE	--	20	1	--	0.00 1.66								68
69	SPARE	--	20	1	--		0.00 1.66		#10	2	30	P	TB ENCLOSURE	70
71	SPARE	--	20	1	--			0.00 1.66						72
73	SPARE	--	20	1	--	0.00 1.66			#10	2	30	P	TB ENCLOSURE	74
75	SPARE	--	20	1	--		0.00 1.66							76
77	SPARE	--	20	1	--			0.00 0.18		1	20	R	TB ENCLOSURE	78
79	SPARE	--	20	1	--	0.00 0.18				1	20	R	TB ENCLOSURE	80
81	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	82
83	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	84
			Total Load:			22.22	28.31	20.49	kVA					
			Total Amps:			187.4	238.2 A	170.7 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	7390 VA	100.00%	7390 VA		
(K) KITCHEN	14180 VA	77.17%	10942 VA	**Total Conn. Load:**	71013 VA
(P) NON-CONTINUOUS POWER	32907 VA	100.00%	32907 VA	**Total Feeder Load:**	67775 VA
(H) HVAC	16536 VA	100.00%	16536 VA	**Total Connected Current:**	197.1 A
				Total Feeder Current:	188.1 A

NEW PANELBOARD: H3

Location: | **Volts:** 480Y/277 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: MDP | **Phases:** 3 | **Mains Type:** MLO
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 225 A
Enclosure: NEMA 1 | **Notes:**

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1						6.84 --			--	1	--	--	SPACE	2
3	T3(8)	R; P	50	3			7.02 --		--	1	--	--	SPACE	4
5								4.80 --	--	1	--	--	SPACE	6
7						6.64 --			--	1	--	--	SPACE	8
9	OH DOOR	H	30	3	#10		6.64 --		--	1	--	--	SPACE	10
11								6.64 --	--	1	--	--	SPACE	12
13						6.64 --			--	1	--	--	SPACE	14
15	OH DOOR	H	30	3	#10		6.64 --		--	1	--	--	SPACE	16
17								6.64 --	--	1	--	--	SPACE	18
19						6.64 --			--	1	--	--	SPACE	20
21	OH DOOR	H	30	3	#10		6.64 --		--	1	--	--	SPACE	22
23								6.64 --	--	1	--	--	SPACE	24
25						1.11 --			--	1	--	--	SPACE	26
27	HVLS-1 (13)	H	15	3			1.11 --		--	1	--	--	SPACE	28
29								1.11 --	--	1	--	--	SPACE	30
31	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	32
33	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	34
35	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	36
37	SPACE	--	--	1	--	-- --			--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		-- --		--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
			Total Load:			27.87	28.05	25.83	kVA					
			Total Amps:			101.7	102.4 A	93.2 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	7800 VA	100.00%	7800 VA		
(P) NON-CONTINUOUS POWER	10860 VA	100.00%	10860 VA	**Total Conn. Load:**	81750 VA
(H) HVAC	63090 VA	100.00%	63090 VA	**Total Feeder Load:**	81750 VA
				Total Connected Current:	98.3 A
				Total Feeder Current:	98.3 A

PANELBOARD NOTES (#)

1. TERMINATE GROUND ON ISOLATED GROUND BUS.
2. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-OFF FOR MAINTENANCE).
3. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-ON FOR CRITICAL LOAD).
4. GFI BREAKER FOR PERSONNEL PROTECTION (5mA).
5. GFI BREAKER FOR EQUIPMENT PROTECTION (30mA).
6. CONDUCTOR SIZE SHOWN IN PANEL SCHEDULE HAS BEEN INCREASED FOR VOLTAGE DROP. SIZE EQUIPMENT GROUND PROPORTIONALLY PER NEC. REFERENCE GROUND WIRE SIZING CHART.
7. REFER TO FAULT CURRENT SCHEDULE FOR AVAILABLE FAULT CURRENT FOR INTERRUPT RATINGS.
8. REFER TO ONE-LINE DIAGRAM FOR WIRE SIZES.
9. FACTORY WIRED TO LOAD.
10. THRU CONTROLLER. REFER TO LIGHTING CONTROLLER DETAIL.
11. ADD NEW CIRCUIT BREAKER TO EXISTING PANEL. NEW CIRCUIT BREAKER SHALL MATCH AIC RATING, MANUFACTURER, AND TYPE OF EXISTING CIRCUIT BREAKERS.
12. MATCH AIC RATING OF SERVICING DEVICE.
13. SUB-METER AS HVAC LOAD PER ASHRAE 90.1 8.4.3.1
14. SUB-METER AS INTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
15. SUB-METER AS EXTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
16. SUB-METER AS RECEPTACLE LOAD PER ASHRAE 90.1 8.4.3.1
17. DEVICE LOCATION NOT SHOWN ON PLANS. COORDINATE WITH MHE DRAWINGS.

EQUIPMENT GROUNDING CONDUCTOR SIZING CHART

BRKR AMPS		WIRE SIZE				
15-20	PHASE	12	10	8	6	4
	GROUND	12	10	8	6	4
25-30	PHASE	10	8	6	4	3
	GROUND	10	8	6	4	3
35-50	PHASE	8	6	4	3	2
	GROUND	10	8	4	4	4
60	PHASE	6	4	3	2	1
	GROUND	10	6	6	4	4
70	PHASE	6	4	3	2	1
	GROUND	8	4	4	3	2
80-90	PHASE	4	3	2	1	1/0
	GROUND	8	6	4	4	3
100	PHASE	3	2	1	1/0	2/0
	GROUND	8	6	4	4	3
PER NEC 250.122(B)						

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
Ryan Mims
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL SCHEDULES

E3.03

IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428

NEW PANELBOARD: L2

Location: WAREHOUSE 200 | **Volts:** 208Y/120 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: T2 | **Phases:** 3 | **Mains Type:** MCB
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 100 A
Enclosure: NEMA 1 | **Notes:** Entire panel measured upstream as RECEPTACLE category

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	CONVENIENCE RECEP	R	20	1		0.54	0.00		--	1	20	--	SPARE	2
3	SPARE	--	20	1	--		0.00	0.70		1	20	P	COLUMN FANS	4
5	ACP-1(2)	P	20	1				0.18 0.72		1	20	R	SBL RECEP	6
7							0.72			1	20	R	SBL RECEP	8
9	27472 REGULATED WASTE	R	20	1			0.36	0.70		1	20	P	COLUMN FANS	10
11	COLUMN FANS	P	20	1				0.70 0.00	--	1	20	--	SPARE	12
13	SPARE	--	20	1	--	0.00	0.00		--	1	20	--	SPARE	14
15	28240 CART CHARGING	P	30	1	#10		2.40	0.00	--	1	20	--	SPARE	16
17	28240 CART CHARGING	P	30	1	#10			2.40 0.00	--	1	20	--	SPARE	18
19	SPACE	--	--	1	--	--	0.00		--	1	20	--	SPARE	20
21	SPACE	--	--	1	--			-- 0.00	--	1	20	--	SPARE	22
23	SPACE	--	--	1	--			-- 0.00	--	1	20	--	SPARE	24
25	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	26
27	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	28
29	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	30
31	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	32
33	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	34
35	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	36
37	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
	Total Load:					1.26	4.15	4.00	kVA					
	Total Amps:					10.5	38.1 A	36.8 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	2340 VA	100.00%	2340 VA		
(P) NON-CONTINUOUS POWER	7068 VA	100.00%	7068 VA	**Total Conn. Load:**	9408 VA
				Total Feeder Load:	9408 VA
				Total Connected Current:	26.1 A
				Total Feeder Current:	26.1 A

NEW PANELBOARD: L3

Location: WAREHOUSE 200 | **Volts:** 208Y/120 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: T3 | **Phases:** 3 | **Mains Type:** MCB
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 100 A
Enclosure: NEMA 1 | **Notes:** Entire panel measured upstream as RECEPTACLE category

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	CONVENIENCE RECEP	R	20	1		0.18	0.36		--	1	20	R	28342 INBOUND INDUCT TV	2
3	IDF(3)	R	20	1			0.36	0.18		1	20	R	CONVENIENCE RECEP	4
5	CONVENIENCE RECEP	R	20	1				0.18 0.48		1	20	P	28189 AVERY CAGE	6
7	ACP-2(2)	P	20	1		0.18	0.48			1	20	P	28178 INBOUND SORT	8
9	28236 REPACK STATION	P	20	1				0.48 0.00		1	20	--	SPARE	10
11	CONVENIENCE RECEP	R	20	1				0.36 0.00	--	1	20	--	SPARE	12
13	29559 WATER COOLER	P	20	1		0.48	0.00		--	1	20	--	SPARE	14
15	CANOPY RECEPTACLES	R	20	1			1.02	0.00	--	1	20	--	SPARE	16
17	OH DOOR CONTROL	P	20	1				0.36 0.00	--	1	20	--	SPARE	18
19	28179 INBOUND POWER INDUCT	R	20	1		0.96	0.00		--	1	20	--	SPARE	20
21	CONVENIENCE RECEP	R	20	1			0.18	0.00	--	1	20	--	SPARE	22
23	OH DOOR CONTROL	P	20	1				0.36 --	--	1	--	--	SPACE	24
25	MHE	P	30	1	#10	2.88	--		--	1	--	--	SPACE	26
27	MHE	P	30	1	#10		2.88	--	--	1	--	--	SPACE	28
29	CONVENIENCE RECEP	R	20	1				0.18 --	--	1	--	--	SPACE	30
31	OH DOOR CONTROL	P	20	1		0.36	--		--	1	--	--	SPACE	32
33	MHE	P	30	1	#10		1.92	--	--	1	--	--	SPACE	34
35	MHE	P	30	1	#10			2.88 --	--	1	--	--	SPACE	36
37	28179 INBOUND POWER INDUCT	R	20	1		0.96	--		--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		--	--	--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
	Total Load:					6.84	7.02	4.80	kVA					
	Total Amps:					59.6	61.1 A	40.0 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	7800 VA	100.00%	7800 VA		
(P) NON-CONTINUOUS POWER	10860 VA	100.00%	10860 VA	**Total Conn. Load:**	18660 VA
				Total Feeder Load:	18660 VA
				Total Connected Current:	51.8 A
				Total Feeder Current:	51.8 A

NEW PANELBOARD: L4

Location: ELECTRICAL 121 | **Volts:** 208Y/120 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: T4 | **Phases:** 3 | **Mains Type:** MCB
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 400 A
Enclosure: NEMA 1 | **Notes:** Entire panel measured upstream as RECEPTACLE category

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	30269 HR SELF SERVE	P	20	1		0.48	2.88		#10	1	30	--	MHE TWIST LOCK (17)	2
3	2878 PHONE BOOTH	R	20	1			0.36	2.88	#10	1	30	--	MHE TWIST LOCK (17)	4
5	29567 WORKING WELL KIOSK	P	20	1				0.48 2.88	#10	1	30	--	MHE TWIST LOCK (17)	6
7	MAVIS	P	20	1		0.48	2.88		#10	1	30	--	MHE TWIST LOCK (17)	8
9	CONVENIENCE RECEP	R	20	1			0.18	2.88	#10	1	30	--	MHE TWIST LOCK (17)	10
11	28223 DSP MANAGEMENT	P	20	1				0.36 2.88	#10	1	30	--	MHE TWIST LOCK (17)	12
13	BAS	R	20	1		0.18	2.88		#10	1	30	--	MHE TWIST LOCK (17)	14
15	28239 PPE VENDING	P	20	1			0.48	2.88	#10	1	30	--	MHE TWIST LOCK (17)	16
17	29559 WATER COOLER	P	20	1				0.48 2.88	#10	1	30	--	MHE TWIST LOCK (17)	18
19	28223 DSP MANAGEMENT	P	20	1		0.36	2.88		#10	1	30	--	MHE TWIST LOCK (17)	20
21	TV	P	20	1			0.36	2.88	#10	1	30	--	MHE TWIST LOCK (17)	22
23	28180 FAST START SORTATION	P	20	1				0.48 2.88	#10	1	30	--	MHE TWIST LOCK (17)	24
25	29559 WATER COOLER	P	20	1		0.48	2.88		#10	1	30	--	MHE TWIST LOCK (17)	26
27	28345 DELIVERY STATION	P	20	1			0.48	2.88	#10	1	30	--	MHE TWIST LOCK (17)	28
29	28180 FAST START SORTATION	P	20	1				0.48 2.88	#10	1	30	--	MHE TWIST LOCK (17)	30
31	29594 OFFICE SUPPLIES	R	20	1		0.18	2.88		#10	1	30	--	MHE TWIST LOCK (17)	32
33	29591 OTR MANAGEMENT	P	20	1			0.48	2.88	#10	1	30	--	MHE TWIST LOCK (17)	34
35	28180 FAST START SORTATION	P	20	1				0.48 2.88	#10	1	30	--	MHE TWIST LOCK (17)	36
37	29562 BLDG START UP AREA	R	20	1		0.18	2.88		#10	1	30	--	MHE TWIST LOCK (17)	38
39	SPARE	--	20	1	--		0.00	2.88	#10	1	30	--	MHE TWIST LOCK (17)	40
41	29561 OTR MANAGEMENT	P	20	1				0.96 2.88	#10	1	30	--	MHE TWIST LOCK (17)	42
43	MHE TWIST LOCK (17)	--	30	1	#10	2.88	2.88		#10	1	30	--	MHE TWIST LOCK (17)	44
45	MHE TWIST LOCK (17)	--	30	1	#10		2.88	2.88	#10	1	30	--	MHE TWIST LOCK (17)	46
47	MHE TWIST LOCK (17)	--	30	1	#10			2.88 2.88	#10	1	30	--	MHE TWIST LOCK (17)	48
49	MHE TWIST LOCK (17)	--	30	1	#10	2.88	--		--	1	--	--	SPACE	50
51	MHE TWIST LOCK (17)	--	30	1	#10		2.88	--	--	1	--	--	SPACE	52
53	MHE TWIST LOCK (17)	--	30	1	#10			2.88 --	--	1	--	--	SPACE	54
55	28219 RTS MANAGEMENT	P	20	1		0.48	--		--	1	--	--	SPACE	56
57	28332 AIR QUALITY INDEX	P	20	1			0.48	--	--	1	--	--	SPACE	58
59	EF-1	H	15	1				0.58 --	--	1	--	--	SPACE	60
61	HVAC MAINTENANCE (6)	R	20	1	8	0.72	--		--	1	--	--	SPACE	62
63	HVAC MAINTENANCE (6)	R	20	1	8		0.72	--	--	1	--	--	SPACE	64
65	SPARE	--	20	1	--			0.00 --	--	1	--	--	SPACE	66
67	SPARE	--	20	1	--	0.00	--		--	1	--	--	SPACE	68
69	SPARE	--	20	1	--		0.00	--	--	1	--	--	SPACE	70
71	SPARE	--	20	1	--			0.00 --	--	1	--	--	SPACE	72
73	SPARE	--	20	1	--	0.00	--		--	1	--	--	SPACE	74
75	SPARE	--	20	1	--		0.00	--	--	1	--	--	SPACE	76
77	SPARE	--	20	1	--			0.00 --	--	1	--	--	SPACE	78
79	SPARE	--	20	1	--	0.00	--		--	1	--	--	SPACE	80
81	SPARE	--	20	1	--		0.00	--	--	1	--	--	SPACE	82
83	SPARE	--	20	1	--			0.00 --	--	1	--	--	SPACE	84
	Total Load:					32.34	32.34	33.10	kVA					
	Total Amps:					269.5	269.5 A	275.8 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
Spare	86400 VA	100.00%	86400 VA		
(R) RECEPTACLE	2520 VA	100.00%	2520 VA	**Total Conn. Load:**	97776 VA
(P) NON-CONTINUOUS POWER	8280 VA	100.00%	8280 VA	**Total Feeder Load:**	97776 VA
(H) HVAC	576 VA	100.00%	576 VA	**Total Connected Current:**	271.4 A
				Total Feeder Current:	271.4 A

NEW PANELBOARD: L5

Location: WAREHOUSE 200 | **Volts:** 208Y/120 | **A.I.C. Rating:** Note (7) Fully Rated
Supply From: T5 | **Phases:** 3 | **Mains Type:** MCB
Mounting: SURFACE | **Wires:** 4 | **Mains Rating:** 100 A
Enclosure: NEMA 1 | **Notes:** Entire panel measured upstream as RECEPTACLE category

CKT	Circuit Description	Load Class	Trip	Poles	Wire	A	B	C	Wire	Poles	Trip	Load Class	Circuit Description	CKT
1	CONVENIENCE RECEP	R	20	1		0.18	0.00		--	1	20	--	SPARE	2
3	SPARE	--	20	1	--		0.00	0.00	--	1	20	--	SPARE	4
5	29592 DOCK DOOR	R	20	1				0.36 0.00	--	1	20	--	SPARE	6
7	29592 DOCK DOOR	R	20	1		0.36	0.00		--	1	20	--	SPARE	8
9	28228 TDR DRIVER CART	P	20	1			0.36	0.00	--	1	20	--	SPARE	10
11	29592 DOCK DOOR	R	20	1				0.36 0.00	--	1	20	--	SPARE	12
13	29592 DOCK DOOR	R	20	1		0.36	--		--	1	--	--	SPACE	14
15	29592 DOCK DOOR	R	20	1			0.36	--	--	1	--	--	SPACE	16
17	29592 DOCK DOOR	R	20	1				0.36 --	--	1	--	--	SPACE	18
19	29592 DOCK DOOR	R	20	1		0.36	--		--	1	--	--	SPACE	20
21	29592 DOCK DOOR	R	20	1			0.36	--	--	1	--	--	SPACE	22
23	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	24
25	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	26
27	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	28
29	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	30
31	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	32
33	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	34
35	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	36
37	SPACE	--	--	1	--	--	--		--	1	--	--	SPACE	38
39	SPACE	--	--	1	--		--	-- --	--	1	--	--	SPACE	40
41	SPACE	--	--	1	--			-- --	--	1	--	--	SPACE	42
	Total Load:					1.26	1.08	1.08	kVA					
	Total Amps:					10.5	9.0 A	9.0 A	Amps					

Load Classification	Connected Load	Demand Factor	Demanded Load	Panel Totals	
(R) RECEPTACLE	3060 VA	100.00%	3060 VA		
(P) NON-CONTINUOUS POWER	360 VA	100.00%	360 VA	**Total Conn. Load:**	3420 VA
				Total Feeder Load:	3420 VA
				Total Connected Current:	9.5 A
				Total Feeder Current:	9.5 A

PANELBOARD NOTES (#)

1. TERMINATE GROUND ON ISOLATED GROUND BUS.
2. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-OFF FOR MAINTENANCE).
3. INSTALL LOCKING DEVICE FURNISHED WITH PANELBOARD (LOCK-ON FOR CRITICAL LOAD).
4. GFI BREAKER FOR PERSONNEL PROTECTION (5mA).
5. GFI BREAKER FOR EQUIPMENT PROTECTION (30mA).
6. CONDUCTOR SIZE SHOWN IN PANEL SCHEDULE HAS BEEN INCREASED FOR VOLTAGE DROP. SIZE EQUIPMENT GROUND PROPORTIONALLY PER NEC. REFERENCE GROUND WIRE SIZING CHART.
7. REFER TO FAULT CURRENT SCHEDULE FOR AVAILABLE FAULT CURRENT FOR INTERRUPT RATINGS.
8. REFER TO ONE-LINE DIAGRAM FOR WIRE SIZES.
9. FACTORY WIRED TO LOAD.
10. THRU CONTROLLER. REFER TO LIGHTING CONTROLLER DETAIL.
11. ADD NEW CIRCUIT BREAKER TO EXISTING PANEL. NEW CIRCUIT BREAKER SHALL MATCH AIC RATING, MANUFACTURER, AND TYPE OF EXISTING CIRCUIT BREAKERS.
12. MATCH AIC RATING OF SERVICING DEVICE.
13. SUB-METER AS HVAC LOAD PER ASHRAE 90.1 8.4.3.1
14. SUB-METER AS INTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
15. SUB-METER AS EXTERIOR LIGHTING LOAD PER ASHRAE 90.1 8.4.3.1
16. SUB-METER AS RECEPTACLE LOAD PER ASHRAE 90.1 8.4.3.1
17. DEVICE LOCATION NOT SHOWN ON PLANS. COORDINATE WITH MHE DRAWINGS.

EQUIPMENT GROUNDING CONDUCTOR SIZING CHART

BRKR AMPS		WIRE SIZE				
15-20	PHASE	12	10	8	6	4
	GROUND	12	10	8	6	4
25-30	PHASE	10	8	6	4	3
	GROUND	10	8	6	4	3
35-50	PHASE	8	6	4	3	2
	GROUND	10	8	4	4	4
60	PHASE	6	4	3	2	1
	GROUND	10	6	6	4	4
70	PHASE	6	4	3	2	1
	GROUND	8	4	4	3	2
80-90	PHASE	4	3	2	1	1/0
	GROUND	8	6	4	4	3
100	PHASE	3	2	1	1/0	2/0
	GROUND	8	6	4	4	3

PER NEC 250.122(B)

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
06/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

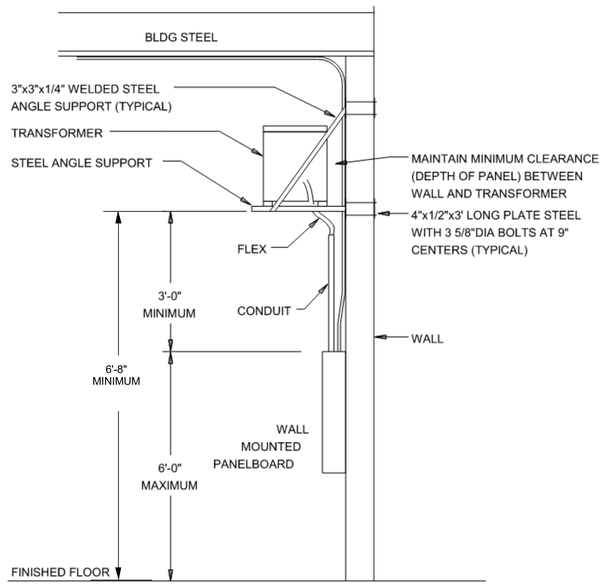
Sheet Title:
ELECTRICAL SCHEDULES

E3.04

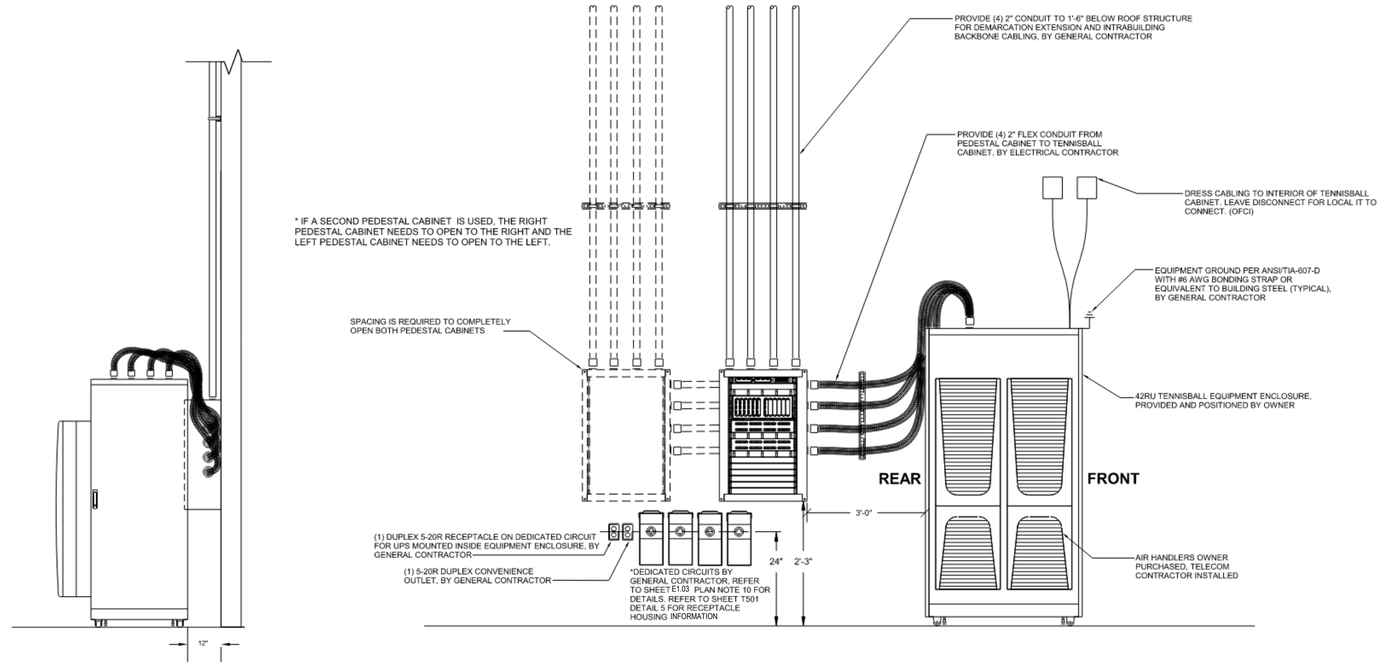
IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

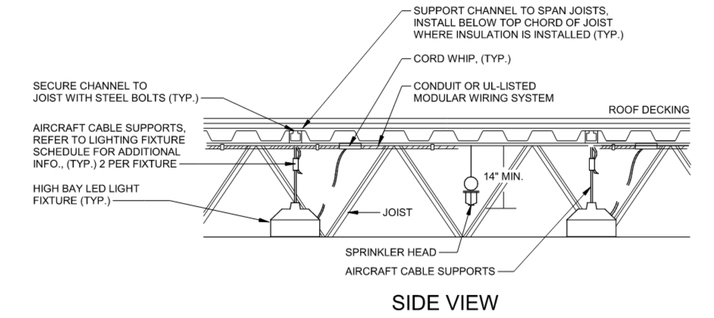
0 1 2 3
REF. SCALE IN INCHES
PROJECT #250428



7 E4.01 TRANSFORMER MOUNTED TO WALL
Scale: NTS

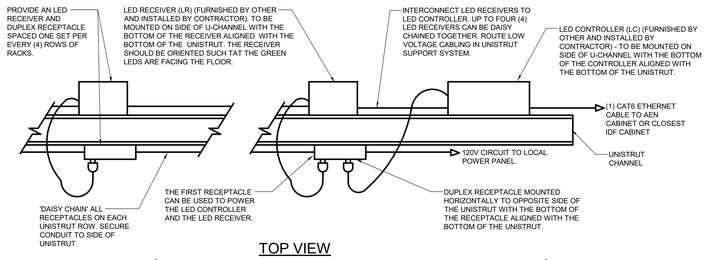


6 E4.01 TB ENCLOSURE WALL MOUNT(SINGLE SIDED AIR HANDLER)
Scale: NTS

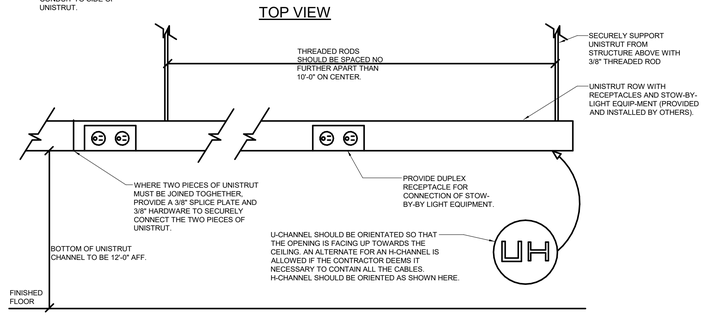


SIDE VIEW

4 E4.01 HIGHBAY FIXTURE SUPPORT SUSPENDED(WAREHOUSE)
Scale: NTS



TOP VIEW



SIDE VIEW

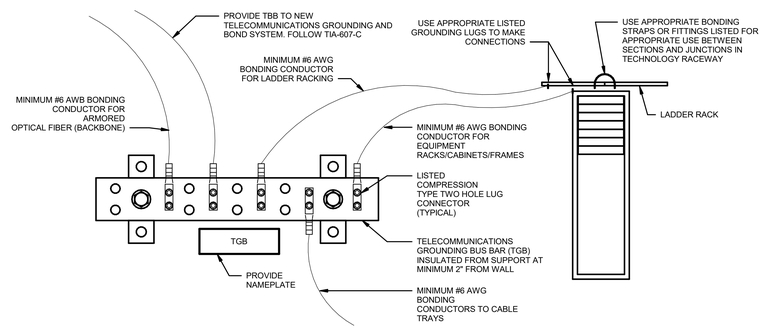
GENERAL NOTES:

1. CONTRACTOR IS RESPONSIBLE FOR DESIGNING, PROVIDING AND INSTALLING A SUPPORT SYSTEM THAT CAN SUPPORT ALL OF THE CONTRACTOR PROVIDED COMPONENTS AS WELL AS EQUIPMENT NOTED TO BE PROVIDED BY OTHERS (LED CONTROLLERS, LED RECEIVERS, LED CABLES, ETC). THE SUPPORT SYSTEM SHOULD BE RIGID ENOUGH TO PREVENT SWAYING. INCLUDE 10% SPARE SUPPORT CAPACITY IN THE SUPPORT SYSTEM DESIGN.
2. THE SUPPORT SYSTEM SHOULD BE LOCATED TO AVOID CONFLICT WITH THE HVLS FAN BLADES. RELOCATE FANS TO ACCOMMODATE THE PLACEMENT OF THE SUPPORT RODS.
3. THE UNISTRUT CHANNEL SHOULD BE LARGE ENOUGH TO ACCOMMODATE (6) CAT6 CABLES CONTAINED WITHIN THE CHANNEL WITHOUT CONFLICTING WITH THE THREADED ROD CONNECTION HARDWIRE AND ANY SPLICE PLATES/CONNECTOR HARDWARE.
4. CONTRACTOR TO ACCOUNT FOR ONE LED CONTROLLER PER UNISTRUT ROW (CLUSTER), UP TO 48 ROWS OF RACKS MAXIMUM. THE LED CONTROLLER SHOULD BE LOCATED ON THE UNISTRUT CHANNEL AT THE BEGINNING OF THE CONVEYOR SYSTEM. SOME SITE-SPECIFIC CONDITIONS MAY EXIST WHERE THE CONTROLLER WILL NEED TO BE LOCATED AT THE END OF THE CONVEYOR SYSTEM. FIELD VERIFY WITH IT PRIOR TO INSTALLATION.
5. IF THE LED CONTROLLER NEEDS TO BE LOCATED AT THE END INSTEAD OF THE START OF THE ROW (BASED ON THE SORT AISLE SEQUENCE), THE INSTALLER NEEDS TO MAKE SURE THAT THE CONTROLLER TO RECEIVER CONNECTIONS REFLECT THE CORRECT SEQUENCE OF RECEIVERS TO AISLE. THE LC PORT 1 STILL NEEDS TO BE WIRE TO THE FIRST (4) LR'S, WHICH ARE CONNECTED TO THE FIRST 16 SORT AISLES.
6. IF AISLE COUNT EXCEED 48 RACKS PER ROW, A SECOND LED CONTROLLER WILL NEED TO BE ACCOUNTED FOR.
7. SOME COMPONENTS ARE PROVIDED BY OTHER, HOWEVER ALL COMPONENTS SHOWN IN THIS DETAIL ARE TO BE INSTALLED BY THE CONTRACTOR.
8. LOW VOLTAGE CONTRACTOR IS RESPONSIBLE FOR PROVIDING OPS TECH IT LOCAL MANAGEMENT THE FOLLOWING INFORMATION ON EACH SBL ROW (OR CLUSTER):

2 E4.01 STOW-BY-LIGHT INSTALLATION DETAIL
Scale: NTS



5 E4.01 POLE BASE DETAIL
Scale: NTS



1 E4.01 TELECOMMUNICATIONS GROUND BAR
Scale: NTS

IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

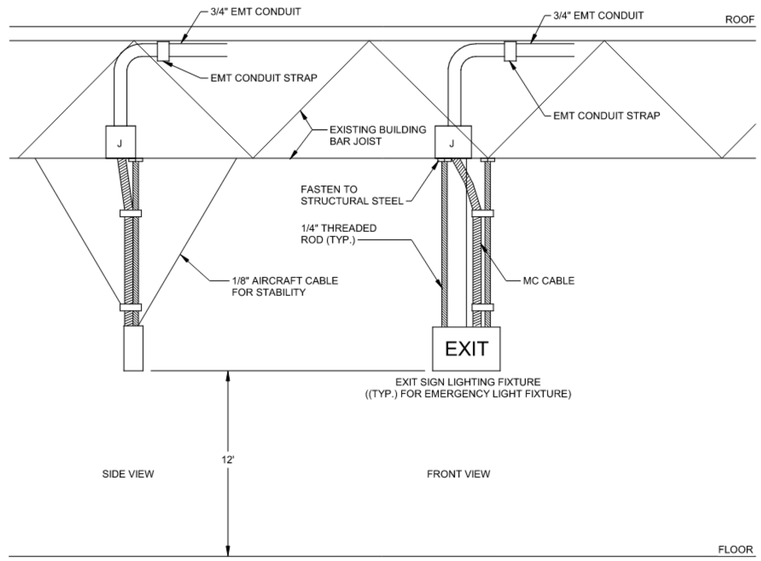
ID	Description	Date

© 2025 CESO, INC.

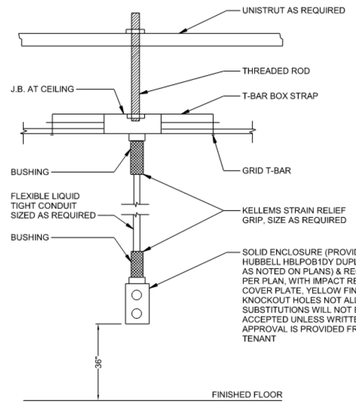
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL DETAILS

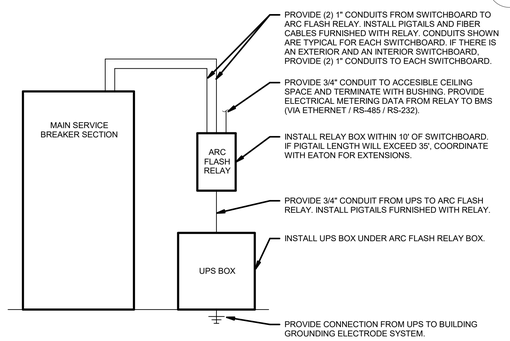
E4.01



8 E4.02 PENDANT MOUNT EXIT SIGN
Scale: NTS



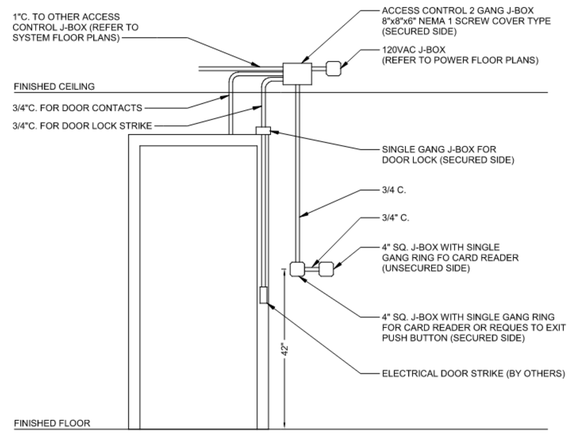
6 E4.02 ABOVE TABLE CORD HUNG RECEPTACLE
Scale: NTS



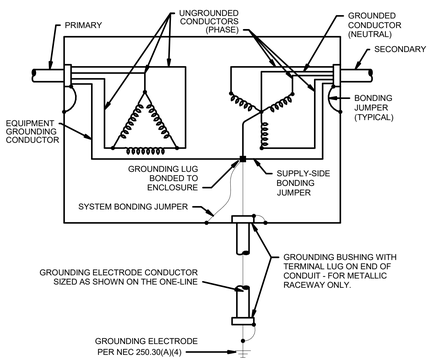
NOTES:

1. PROVIDE EATON ARC FLASH RELAY AND UPS, MODEL NUMBER: AFRSA1 (INDOOR APPLICATION) FOR EACH MAIN SWITCHBOARD. COORDINATE WITH CONSTRUCTION MANAGER FOR ORDERING CONTACT INFORMATION.
2. WHERE PLANS INDICATE THE RELAY SYSTEM IS LOCATED OUTDOORS, PROVIDE MODEL NUMBER: AFRSA2 (OUTDOOR APPLICATION).
3. CONTACT EATON FOR ASSOCIATED SWITCHBOARD COMPONENTS. INSTALL PER MANUFACTURER'S WIRING DIAGRAM.
4. SWITCHBOARD REQUIREMENTS:
   a. MAIN BREAKER WITH OPEN, CLOSE, 52A CONTACT.
   b. BUS VOLTAGE TAP ON UTILITY SIDE OF MAIN BREAKER.
   c. BARRIER BETWEEN MAIN BREAKER AND FEEDER SECTIONS.
5. CONTACT OWNER-APPROVED COMMISSIONING AGENT TO TEST, PROGRAM, AND PERFORM STARTUP OF RELAY SYSTEM. COORDINATE WITH CONSTRUCTION MAANGER FOR LIST OF APPROVED AGENTS.

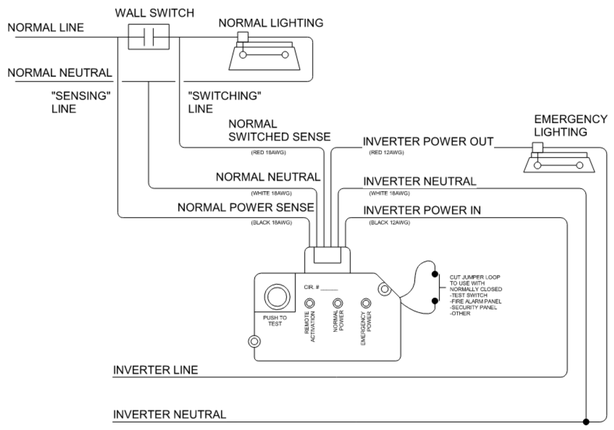
5 E4.02 ARC FLASH RELAY INSTALLATION
Scale: NTS



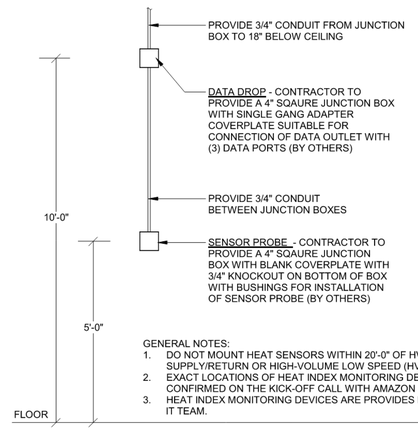
4 E4.02 DOOR WITH CARD READER
Scale: NTS



3 E4.02 DRY TYPE TRANSFORMER GROUNDING
Scale: NTS



2 E4.02 EMERGENCY LIGHTING CONTROL DEVICE
Scale: NTS



GENERAL NOTES:

1. DO NOT MOUNT HEAT SENSORS WITHIN 20'-0" OF HVAC SUPPLY/RETURN OR HIGH-VOLUME LOW SPEED (HVLS) FANS.
2. EXACT LOCATIONS OF HEAT INDEX MONITORING DEVICE TO BE CONFIRMED ON THE KICK-OFF CALL WITH AMAZON SAFETY .
3. HEAT INDEX MONITORING DEVICES ARE PROVIDES BY THE IT TEAM.

1 E4.02 HEAT INDEX MONITORING STATION
Scale: NTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

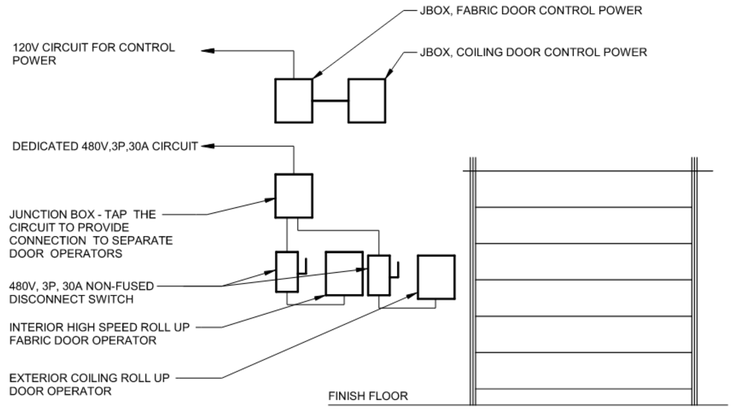
© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL DETAILS

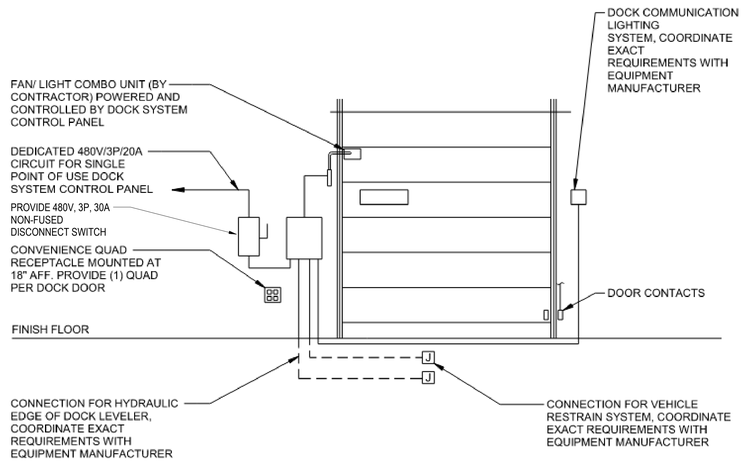
E4.02

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72756 P: 479.899.6370 PROJECT #250428
www.IMEGCORP.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428



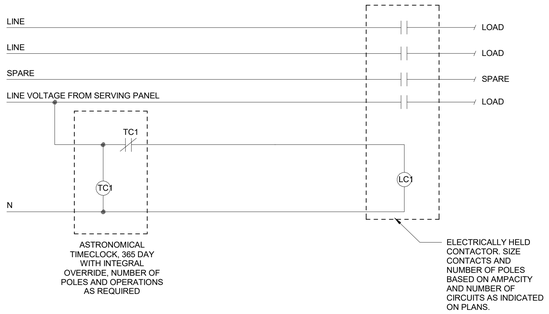
1. COORDINATE AND PROVIDE ALL POWER AND CONTROL WIRING REQUIREMENTS WITH MANUFACTURER PRIOR TO BEGINNING WORK.
2. COORDINATE ALL DIMENSIONS WITH ARCHITECT AND EQUIPMENT INSTALLERS PRIOR TO BEGINNING WORK.
3. DETAIL MAY NOT REFLECT EXACT SYSTEM CONFIGURATION. ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL REQUIRED CONDUIT AND WIRING FOR COMPLETE SYSTEM. COORDINATE FINAL REQUIREMENTS WITH EQUIPMENT SUPPLIER AND SYSTEM SPECIFIC WIRING DIAGRAMS.
4. ALL COMPONENTS MUST BE PROPERLY GROUNDED PER NEC 250-81(a) & (c). INCLUDE GROUNDING BUSHING ON ALL CONDUITS ENTERING NON-METALIC ENCLOSURES WITH #8 GROUNDING BUSHINGS WHEN MULTIPLE CONDUITS ENTER ENCLOSURE.

6 E4.03 TYPICAL HIGH SPEED ROLL UP DOOR ELEVATION DETAIL
Scale: NTS

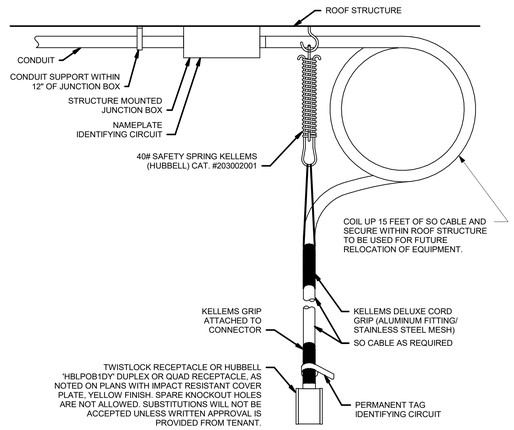


1. COORDINATE AND PROVIDE ALL POWER AND CONTROL WIRING REQUIREMENTS WITH MANUFACTURER PRIOR TO BEGINNING WORK.
2. COORDINATE ALL DIMENSIONS WITH ARCHITECT AND EQUIPMENT INSTALLERS PRIOR TO BEGINNING WORK.
3. DETAIL MAY NOT REFLECT EXACT SYSTEM CONFIGURATION. ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL REQUIRED CONDUIT AND WIRING FOR COMPLETE SYSTEM. COORDINATE FINAL REQUIREMENTS WITH EQUIPMENT SUPPLIER AND SYSTEM SPECIFIC WIRING DIAGRAMS.
4. ALL COMPONENTS MUST BE PROPERLY GROUNDED PER NEC 250-81(a) & (c). INCLUDE GROUNDING BUSHING ON ALL CONDUITS ENTERING NON-METALIC ENCLOSURES WITH #8 GROUNDING BUSHINGS WHEN MULTIPLE CONDUITS ENTER ENCLOSURE.

5 E4.03 TYPICAL LOADING DOCK DOOR ELEVATION DETAIL
Scale: NTS



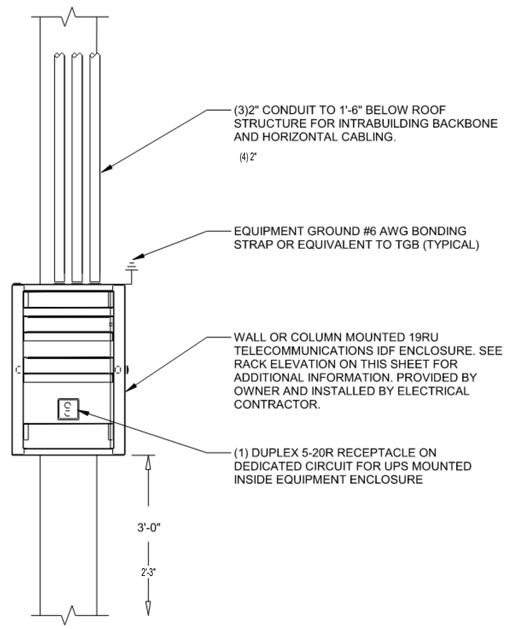
4 E4.03 TYPICAL LIGHTING CONTACTOR
Scale: NTS



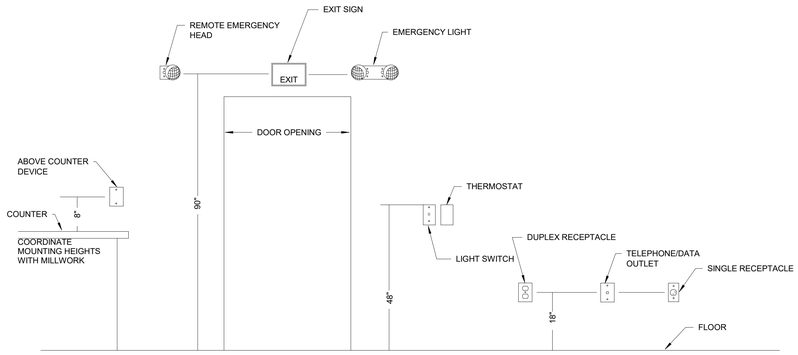
NOTES:

1. RECEPTACLES AT WORK STATIONS SHALL BE MOUNTED AT 6" ABOVE TABLE TOP SURFACE.
2. RECEPTACLES AT EQUIPMENT LOCATIONS SHALL BE MOUNTED AT 18" ABOVE FINISHED FLOOR.
3. COORDINATE FINAL RECEPTACLE MOUNTING HEIGHT WITH FURNITURE AND EQUIPMENT INSTALLER.

3 E4.03 TYPICAL SO CORD BUS DROP CABLE WITH STRAIN RELIEF
Scale: NTS



2 E4.03 WAREHOUSE IDF CABINET DETAIL
Scale: NTS



1 E4.03 TYPICAL MOUNTING HEIGHT
Scale: NTS

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL DETAILS

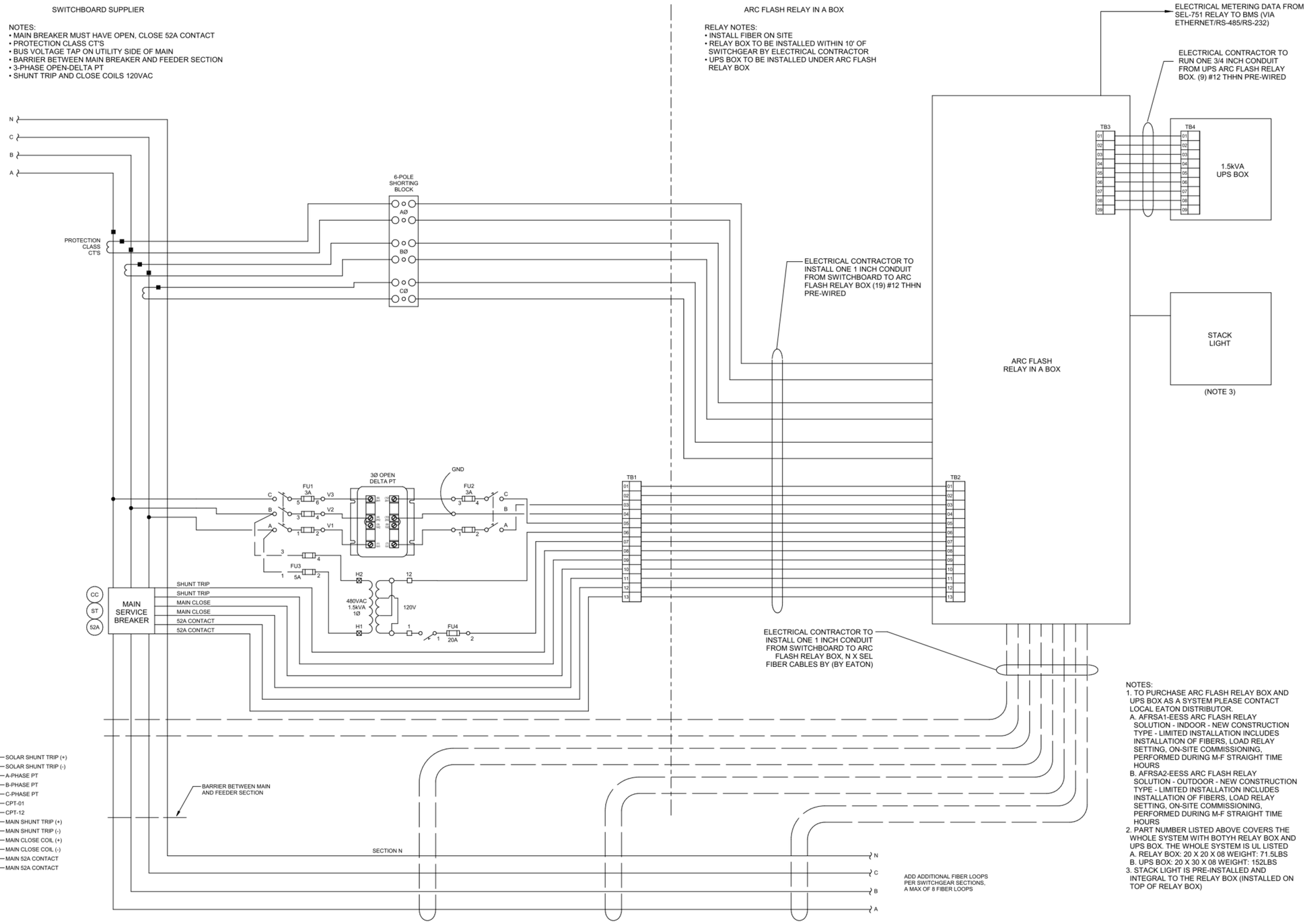
E4.03

SWITCHBOARD SUPPLIER

NOTES:
- MAIN BREAKER MUST HAVE OPEN, CLOSE 52A CONTACT
- PROTECTION CLASS CT'S
- BUS VOLTAGE TAP ON UTILITY SIDE OF MAIN
- BARRIER BETWEEN MAIN BREAKER AND FEEDER SECTION
- 3-PHASE OPEN-DELTA PT
- SHUNT TRIP AND CLOSE COILS 120VAC

ARC FLASH RELAY IN A BOX

RELAY NOTES:
- INSTALL FIBER ON SITE
- RELAY BOX TO BE INSTALLED WITHIN 10' OF SWITCHGEAR BY ELECTRICAL CONTRACTOR
- UPS BOX TO BE INSTALLED UNDER ARC FLASH RELAY BOX



NOTES:
1. TO PURCHASE ARC FLASH RELAY BOX AND UPS BOX AS A SYSTEM PLEASE CONTACT LOCAL EATON DISTRIBUTOR.
   A. AFRSA1-EESS ARC FLASH RELAY SOLUTION - INDOOR - NEW CONSTRUCTION TYPE - LIMITED INSTALLATION INCLUDES INSTALLATION OF FIBERS, LOAD RELAY SETTING, ON-SITE COMMISSIONING, PERFORMED DURING M-F STRAIGHT TIME HOURS
   B. AFRSA2-EESS ARC FLASH RELAY SOLUTION - OUTDOOR - NEW CONSTRUCTION TYPE - LIMITED INSTALLATION INCLUDES INSTALLATION OF FIBERS, LOAD RELAY SETTING, ON-SITE COMMISSIONING, PERFORMED DURING M-F STRAIGHT TIME HOURS
2. PART NUMBER LISTED ABOVE COVERS THE WHOLE SYSTEM WITH BOTYH RELAY BOX AND UPS BOX. THE WHOLE SYSTEM IS UL LISTED
   A. RELAY BOX: 20 X 20 X 08 WEIGHT: 71.5LBS
   B. UPS BOX: 20 X 30 X 08 WEIGHT: 152LBS
3. STACK LIGHT IS PRE-INSTALLED AND INTEGRAL TO THE RELAY BOX (INSTALLED ON TOP OF RELAY BOX)

1 / E4.04 ARC FLASH RELAY DETAIL
Scale: NTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.200.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

PROJECT TCC MOUNTAIN HOME

TRAMMELL CROW

2366 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL ARC FLASH RELAY DETAIL

E4.04

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P.479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

FIRE ALARM

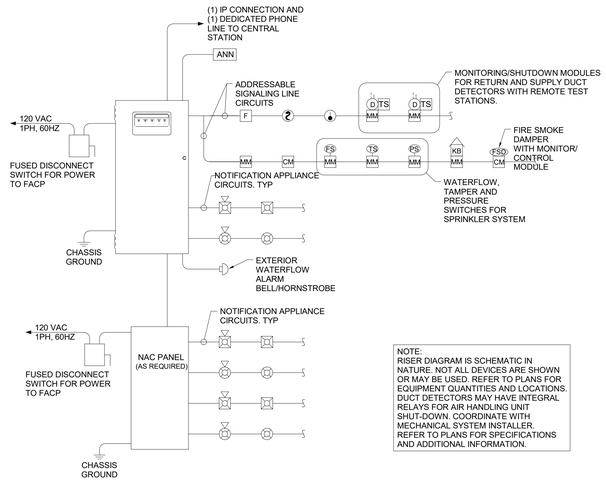
SMOKE DETECTOR	ANN — FIRE ALARM ANNUNCIATOR PANEL
HEAT DETECTOR	FACP — FIRE ALARM CONTROL PANEL
DUCT DETECTOR	M — PULL STATION
HORN STROBE	FS — SPRINKLER FLOW SWITCH
STROBE	TS — SPRINKLER TAMPER SWITCH
	MM — FIRE ALARM MONITOR MODULE
	CM — FIRE ALARM CONTROL MODULE

FIRE ALARM INSTALLATION NOTES

1. SYSTEM SHALL BE INSTALLED IN CONFORMANCE WITH NFPA 72 AND LOCAL CODES AND REGULATIONS. ALL EQUIPMENT AND MATERIALS SHALL BE UL LISTED AND APPROVED BY THE AUTHORITY HAVING JURISDICTION
2. INTERFACE WITH AND MONITOR ALL FIRE SUPPRESSION SYSTEM DEVICES INCLUDING (BUT NOT LIMITED TO) SPRINKLER FLOW AND TAMPER SWITCHES
3. WIRE AND CABLE SHALL BE UL LISTED AND LABELED AS COMPLYING WITH NFPA 70, ARTICLE 760. SIGNALING LINE CIRCUITS TO BE TWISTED, SHIELDED PAIR, SIZED AS RECOMMENDED BY SYSTEM MANUFACTURER. NON-POWER-LIMITED CIRCUITS TO BE SOLID-COPPER CONDUCTORS WITH 600-V RATED, 75 DEG C, COLOR-CODED INSULATION.
   9.1 LOW-VOLTAGE CIRCUITS: NO. 16 AWG, MINIMUM
   9.2 LINE-VOLTAGE CIRCUITS: NO. 12 AWG, MINIMUM
4. INSTALL AND TEST SYSTEMS ACCORDING TO NFPA 72. COMPLY WITH NECA 1
5. TEST ALL SYSTEM DEVICES FOR PROPER OPERATION IN THE PRESENCE OF THE AHJ AND OTHER OFFICIALS INSPECTING THE FIRE ALARM SYSTEM
6. IF REQUIRED BY THE LOCAL AHJ, EQUIPMENT DATA SHEETS AND BATTERY CALCULATIONS IN ACCEPTANCE WITH NFPA 72 SHALL BE PERFORMED BY THE FIRE ALARM SYSTEM MANUFACTURER/INSTALLER TO MATCH EQUIPMENT TO BE INSTALLED
7. SYSTEM INSTALLER SHALL BE A LICENSED FIRE ALARM CONTRACTOR IN THE RESPECTIVE STATE OF THIS PROJECT
8. FIRE ALARM CONTROL PANEL SHALL BE MODULAR, POWER-LIMITED DESIGN WITH ELECTRONIC MODULES, UL 864 LISTED, AND DESIGNED TO TRANSMIT ALARM, TROUBLE, AND SUPERVISORY SIGNALS TO A UL LISTED CENTRAL STATION THROUGH A DIGITAL ALARM COMMUNICATOR TRANSMITTER WITH (1) ETHERNET PORT CONNECTION AND (1) DEDICATED TELEPHONE LINE
9. PROVIDE 120VAC POWER THROUGH DEDICATED LOCKING BREAKER AT POWER PANEL
10. GROUND THE FACP AND ALL ASSOCIATED CIRCUITS
11. INSTALL A #6 AWG GROUND WIRE FROM THE TELE-COMMUNICATIONS EQUIPMENT GROUNDING POINT TO THE FACP
12. SYSTEM SHALL INCLUDE 24V DC POWER SYSTEM WITH SEALED LEAD CALCIUM BATTERIES AND AUTOMATIC BATTERY CHARGER IN ACCORDANCE WITH NFPA 72
13. PROVIDE (1) IP CONNECTION TO CUSTOMERS INTERNET NETWORK AND (1) DEDICATED TELEPHONE LINE TERMINATED WITH (1) RJ-31X MODULAR OUTLET AT DACT LOCATION

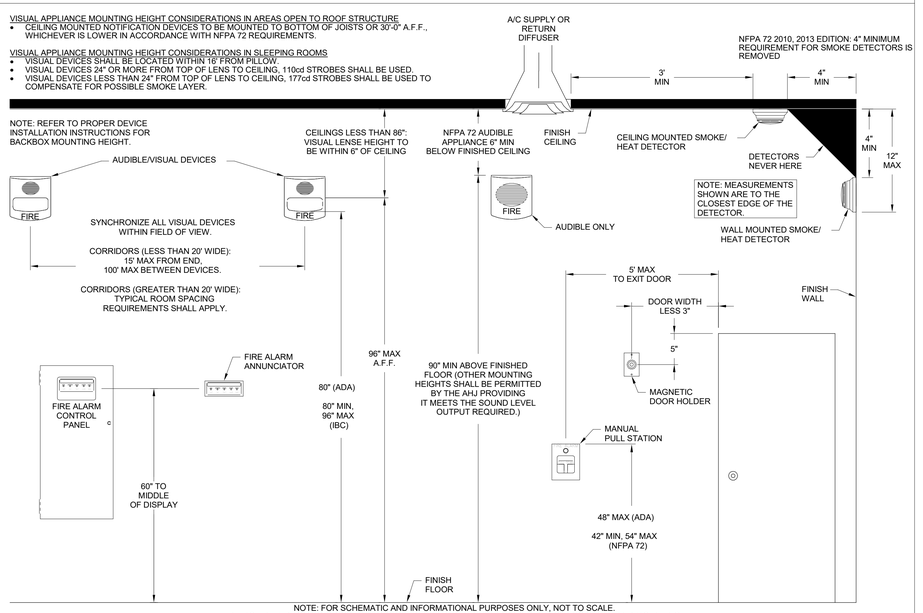
FIRE ALARM GENERAL NOTES

1. FIRE ALARM SYSTEM DESIGN, INSTALLATION AND MATERIALS SHALL BE IN ACCORDANCE WITH NFPA 70 AND NFPA 72. SYSTEM SHALL ALSO MEET ALL APPLICABLE BUILDING CODES, FIRE CODES AND THE REQUIREMENTS OF THE AUTHORITY HAVING JURISDICTION AND INSURANCE CARRIER. VERIFY REQUIREMENTS PRIOR TO BID SUBMITTAL.
2. INFORMATION ON CONTRACT DOCUMENTS IS GENERAL INFORMATION AND FOR BID PURPOSES ONLY. PERFORM REQUIRED CALCULATIONS AND COORDINATE WITH OTHER TRADES. DEVIATIONS FROM ENGINEERS LAYOUT WILL NOT BE CONSIDERED UNLESS A FORMALLY SUBMITTED RFI IS RECEIVED AND APPROVED
3. PROVIDE ADDITIONAL MATERIALS AND LABOR REQUIRED DUE TO LACK OF COORDINATION OR TO MEET AUTHORITY HAVING JURISDICTION AND INSURANCE CARRIER REQUIREMENTS AT NO ADDITIONAL COST TO THE OWNER
4. PROVIDE ALL EQUIPMENT AND LABOR REQUIRED FOR A COMPLETE AND OPERATIONAL FIRE ALARM SYSTEM
5. AUDIBLE NOTIFICATION DEVICES SHALL SOUND UNTIL SILENCED AT THE CONTROL PANEL OR REMOTE ANNUNCIATOR AS REQUIRED. VISUAL ALARM IS DISPLAYED UNTIL DEVICE IS RETURNED TO ITS NORMAL POSITION OR SUPERVISORY CONDITION IS CLEARED
6. FORWARD COMPLETED FIRE ALARM CERTIFICATE OF COMPLETION TO THE OWNER
7. REFER TO SPECIFICATIONS FOR ADDITIONAL INFORMATION
8. PROVIDE CONNECTION TO EXTERIOR WATERFLOW ALARM BELL AS REQUIRED
9. PROVIDE NOTIFICATION, INITIATING AND MONITORING DEVICES AS INDICATED ON THE DRAWINGS. FIRE ALARM DEVICES SHALL BE OF ONE MANUFACTURER AND SHALL BE LISTED FOR USE WITH THE FIRE ALARM CONTROL PANEL
10. PROVIDE NOTIFICATION APPLIANCE CIRCUIT PANEL(S) TO POWER NOTIFICATION DEVICES AS REQUIRED. CONNECT TO FIRE ALARM SYSTEM
11. THE FIRE ALARM CONTROL PANEL AND REMOTE ANNUNCIATOR LOCATIONS SHOWN SHALL BE COORDINATED WITH THE FIRE DEPARTMENT AND AHJ PRIOR TO INSTALLATION
12. PROVIDE DEDICATED CONNECTION OF THE FIRE ALARM SYSTEM TO A UL LISTED CENTRAL STATION
13. PROVIDE KNOX BOX FOR FIRE DEPARTMENT ACCESS. CONNECT TAMPER SWITCH TO FIRE ALARM SYSTEM AS REQUIRED
14. AIR HANDLING SYSTEMS THAT ARE MONITORED SHALL SHUTDOWN AND REMAIN DOWN UNTIL MANUALLY RESET
15. ROOF TOP AIR DISTRIBUTION SYSTEMS EXCEEDING 2,000 CFM: PROVIDE DUCT MOUNTED SMOKE DETECTORS FOR AIR HANDLING UNIT SHUTDOWN AND INSTALL PER MANUFACTURER'S RECOMMENDATIONS. PROVIDE MONITOR MODULE FOR SUPPLY AIR DUCT DETECTOR AND RELAY/MONITOR MODULE FOR RETURN AIR DUCT DETECTOR. REFER TO MECHANICAL SHEETS FOR AIR HANDLING UNIT AND DUCTWORK LAYOUT AND DETAILS
16. PROVIDE DUCT MOUNTED SMOKE DETECTORS FOR SMOKE DAMPER AND FIRE/SMOKE DAMPER OPERATION AND INSTALL PER MANUFACTURER'S RECOMMENDATIONS. PROVIDE RELAY/MONITOR MODULE FOR DUCT DETECTOR. REFER TO MECHANICAL DOCUMENTS FOR DAMPER LOCATION AND REQUIREMENTS.
17. DUCT SMOKE DETECTION SHALL TRANSMIT A SUPERVISORY SIGNAL TO THE FACP



2 / E4.05 TYPICAL FIRE ALARM RISER DETAIL
NTS

FIRE ALARM DEVICE MOUNTING HEIGHTS (PER NFPA 72)



1 / E4.05 FIRE ALARM MOUNTING HEIGHTS
NTS

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15418
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FIRE ALARM DETAILS AND NOTES

E4.05

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON, AND DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

Division 28: FIRE ALARM SYSTEM

1. GENERAL INSTRUCTIONS

A. GENERAL REQUIREMENTS

All requirements under Division 01 (General Requirements) and the general and supplementary conditions of these specifications apply to this section and division. Where the requirements of this section and division exceed those of Division 01 (General Requirements), this section and division take precedence. Become thoroughly familiar with all its contents as to requirements that affect this division, section, or both. Work required under this division includes all material, equipment, appliances, transportation, services, and labor required to complete the entire system as required by the drawings and specifications, or reasonably inferred to be necessary to facilitate the function of each system as implied by the design and the equipment specified.

The specifications and drawings for the project are complementary, and any portion of work described in one shall be provided as if described in both. In the event of discrepancies, notify the Engineer and request clarification prior to proceeding with the work involved.

Drawings are graphic representations of the work upon which the contract is based. They show the materials and their relationship to one another, including sizes, shapes, locations, and connections. They convey the scope of work, indicating the intended general arrangement of the systems without showing all of the exact details as to elevations, offsets, control lines, and other installation requirements. Use the drawings as a guide when laying out the work and to verify that materials and equipment will fit into the designated spaces, and which when installed per manufacturers' requirements, will ensure a complete, coordinated, satisfactory, and properly operating system.

Installation of devices shall be performed or supervised by a National Institute for Certification of Engineering Technologies (NICET) Level 2 or higher fire alarm technician. Submit copies of the certification for employees through shop drawing submittals.

B. DEFINITIONS

Division: References contained in this specification follow the numbering system defined in the Construction Specifications Institute (CSI) MasterFormat 2004 Edition. Specification Divisions 01 through 13 provided with this project may reference the CSI MasterFormat 1995 Edition. The corresponding division references between the 2004 Edition and 1995 Edition are as follows:

2004 Edition	1995 Edition
1. Division 21 – Fire Suppression	Division 15
2. Division 22 – Plumbing	Division 15
3. Division 23 – HVAC	Division 15
4. Division 26 – Electrical	Division 16
5. Division 27 – Communications	Division 16
6. Division 28 – Electronic Safety and Security	Division 16

Furnish: "to supply and deliver to the project site, ready for unloading, unpacking, assembly, installation and similar operations."

Install: "to perform all operations at the project site including, but not limited to, the actual unloading, unpacking, assembling, erecting, placing, anchoring, applying, working to dimension, finishing, curing, protecting, cleaning, testing, commissioning, starting up and similar operations, complete, and ready for the intended use."

Provide: "to furnish and install, complete and ready for the intended use."

Furnished by Owner (or Owner-Furnished) or Furnished by Others: "an item furnished by the Owner or under other divisions or contracts, and installed under the requirements of this division, complete and ready for the intended use, including all items and services incidental to the work necessary for proper installation and operation. Include the installation under the warranty required by this division."

Engineer: Where referenced in this division, "Engineer" is the Engineer of Record and the Design Professional for the work under this division, and is a consultant to, and an authorized representative of the Architect, as defined in the General and/or Supplementary Conditions. When used in this division, Engineer means increased involvement by and obligations to the Engineer, in addition to involvement by and obligations to the Architect.

AHJ: The local code and/or inspection agency (Authority) Having Jurisdiction over the work.

NRTL: Nationally recognized testing laboratory, as defined and listed by OSHA in 29 CFR 1910.7 (e.g., UL, ETL, CSA), and acceptable to the AHJ over this project. Nationally recognized testing laboratories and standards listed are used only to represent the characteristics required and are not intended to restrict the use of other NRTLs that are acceptable to the AHJ and standards that meet the specified criteria.

The terms "approved equal", "equivalent", or "equal" are used synonymously and shall mean "accepted by or acceptable to the Engineer as equivalent to the item or manufacturer specified". The term "approved" shall mean labeled, listed, or both, by an NRTL, and acceptable to the AHJ over this project.

C. PREBID SITE VISIT

Prior to submitting bid, visit the site of the proposed work and become fully informed as to the conditions under which the work is to be done. Failure to comply with this requirement shall not be considered sufficient justification to request or obtain extra compensation over and above the contract price.

D. SCOPE OF WORK

The scope of work in this section includes fire alarm control panels, remote annunciator panels, manual fire alarm pull stations, automatic smoke detectors, fire alarm notification appliances, auxiliary fire alarm equipment, sprinkler system waterflow and valve tamper alarms, air handling unit shutdown, and battery stand-by power.

E. CODES AND STANDARDS

Provide an integrated fire alarm system, which meets the current versions of NFPA 70 (2017 Edition), National Electrical Code; NFPA 72, National Fire Alarm Code; and all local building and fire codes. All fire alarm equipment shall be Underwriters Laboratory (UL) or Factory Mutual (FM) approved for the type and class of service performed.

F. SYSTEM DESCRIPTION

The fire alarm system shall be a non-coded manual and automatic fire alarm system with connections to a remote supervising station. Control panel shall be micro-processor based, with fully addressable alarm devices.

G. COORDINATION

Coordinate work with that of other trades so that the various components of the systems are installed at the proper time, will fit the available space, and will allow proper service access to those items requiring maintenance. Components installed without regard to the above shall be relocated at no additional cost to the Owner.

H. SUBMITTALS

Upon being awarded a contract, submit to the Architect for approval, six (6) copies of manufacturer's shop drawings for equipment to be furnished under this contract, items requiring coordination between contractors, and sheet metal ductwork fabrication drawings. Before submitting shop drawings and material lists, verify that equipment submitted is mutually compatible and suitable for the intended use, and will fit the available space and allow ample room for maintenance. Highlight, mark, list or indicate the materials, performance criteria and accessories that are being proposed. Submit shop drawings as early as required to support the project schedule. Allow for two weeks Engineer review time plus mailing time plus a duplication of this time for resubmittal if required.

Submittals and shop drawings shall not contain the firm name, logo, seal, or signature of the Engineer. They shall not be copies of the work product of the Engineer. If the Contractor desires to use elements of such product, refer to paragraph "Electronic Drawing Files" for procedures to be used.

The checking and subsequent approval of such shop drawings by the Engineer shall not relieve the Contractor from responsibility for errors in dimensions, details, size of members, quantities, omissions of components or fittings; coordination of electrical requirements; or for coordinating items with actual building conditions. Proceed with the procurement and installation of equipment only after receiving approved shop drawings relative to each item.

Submit a detailed sequence of operation. Pre-printed, generic material will not be accepted and will be rejected. Highlight, mark, list or indicate the materials, performance criteria and accessories that are being proposed.

Submit shop drawings showing fire alarm floor plans and a full building riser diagram. Fire alarm floor plans and riser diagram shall show fire alarm control panel, annunciator, all fire alarm initiating devices and notification appliances. Show typical wiring diagrams of control panel/s, annunciator and each device and wiring connections required. Show all interfaces to other systems, such as temperature control systems, and security systems.

Where required by the AHJ, Contractor is responsible for obtaining a professional engineer or NICET stamp and signature on their shop drawing submittal. The Engineer is not responsible and will not provide this.

Shop drawings shall be produced using Computer Aided Design. Hand drawn documents will not be reviewed or approved.

Shop drawing scale shall match the Engineer's drawings where possible. Scale shall not be less than 3/32" = 1'-0".

Submit a bill of material and manufacturers product data for all devices and equipment.

Refer to Division 01 for acceptance of electronic submittals for this project. For electronic submittals, Contractor shall submit the documents in accordance with the procedures specified in Division 01. Contractor shall notify the Architect and Engineer that the shop drawings have been posted. If electronic submittal procedures are not defined in Division 01, Contractor shall include the website, user name and password information needed to access the submittals. For submittals sent by e-mail, Contractor shall copy the designated representatives of the Architect and Engineer. Contractor shall allow the Engineer review time as specified above in the construction schedule. Contractor shall submit only the documents required to purchase the materials and/or equipment in the electronic submittal and shall clearly indicate the materials, performance criteria and accessories being proposed. General product catalog data not specifically noted to be part of the specified product will be rejected and returned without review.

I. ELECTRONIC DRAWINGS

In preparation of shop drawings or record drawings, Contractor may, at his option, obtain electronic drawing files in AutoCAD or DXF format on CD-ROM disk, DVD disk, flash drive, or direct download, as desired, from the Engineer for a fee of $200 for a drawing set up to 12 sheets and $15 per sheet for each additional sheet. Contact the Architect for written authorization and Engineer for the necessary release agreement form and to specify shipping method and drawing format. In addition to payment, written authorization from the Architect and release agreement from the Engineer must be received before electronic drawing files will be sent.

J. RECORD DRAWINGS (AS-BUILT DRAWINGS)

During progress of the work in this division, Contractor shall maintain an accurate record of all changes made during the installation of the system. Upon completion of the work, accurately transfer all record information to three identical sets of the approved shop drawings. Insert one set into each copy of the manual described below.

See Division 01 and General Conditions for additional information.

K. QUALIFICATIONS

The manufacturer shall be a company specializing in manufacturing the products specified in this section with minimum three years documented experience. The installer shall be a company specializing in installing the products specified in this section with minimum three years documented experience, be a bonded and licensed contractor and merchant of electronic automated fire alarm systems, and employ full-time factory-trained installers and technicians. The equipment manufacturer's service department shall be fully stocked in standard parts and components and engaged in the maintenance of fire alarm systems. On-the-premises service shall be available within 4 hours of notification, 7 days a week, 24 hours a day. Furnish service and maintenance of fire alarm system for one year from date of substantial completion.

L. WARRANTIES

Warrant each system and each element thereof against all defects due to faulty workmanship, design, or material for a period of 12 months from date of Substantial Completion, unless specific items are noted to carry a longer warranty in the construction documents or manufacturer's standard warranty exceeds 12 months. Remedy all defects, occurring within the warranty period(s), as stated in the General Conditions and Division 01.

All corrective software modifications made during warranty periods shall be updated on all user documentation and on user and manufacturer archived software disks.

Warranties shall include labor and material, including travel expenses. Make repairs or replacements without any additional costs to the Owner, and to the satisfaction of the Owner, Architect, and Engineer.

Perform the remedial work promptly, upon written notice from the Engineer or Owner.

At the time of Substantial Completion, deliver to the Owner all warranties, in writing and properly executed, including term limits for warranties extending beyond the one year period and any actions the Owner must take in order to maintain warranty status. Each warranty instrument shall be addressed to the Owner and state the commencement date and term.

2. MATERIALS AND INSTALLATION

A. MANUFACTURERS

Subject to compliance with requirements, provide products manufactured by the following manufacturers: Notifier; SimplexGrinnell; Siemens-Cerberus Division; Kidde/Edwards; Gamewell-FCI; FIKE Corporation; Farenhyt or Engineer approved equal.

B. FIRE ALARM CONTROL PANEL

The fire alarm system shall be a microprocessor-based system designed specifically for fire applications. The system shall be UL listed under Standard 864 (Control Units for Fire-Protective Signaling Systems). Modular construction with a flush mounted enclosure.

Remote Annunciator: Provide supervised remote annunciator(s) where shown on the plans, including audible and visible indication of fire alarm by address, and audible and visible indication of system trouble and supervisory. Install in flush mounted enclosure.

Power Supply: Provide two separate and reliable power supplies. The control panel shall receive 120 Vac power via a dedicated branch circuit of the building's electrical system. Each shall have adequate capacity for the system. The fire alarm contractor shall submit battery calculations for review and approval. The calculations shall indicate each device and the load required in stand-by and alarm mode. The secondary power system shall be a battery-operated emergency power supply and charger with capacity for operating system in standby mode for 24 hours followed by alarm mode for 5 minutes.

System Supervision: Automatically detects and reports open circuits, shorts, and grounds of wiring for initiating device, signaling line, and notification appliance circuits. Alarm, supervisory and trouble signals shall be monitored by the supervising station over a Digital Alarm Communicator Transmitter (DACT), or other approved method.

Initiating Device Circuits: Provide circuitry, which meets the performance requirements during abnormal conditions, based upon the style and class of the circuitry selected. Initiating device circuits shall be Class B.

Notification Appliance Circuits: Provide circuitry, which meets the performance requirements during abnormal conditions, based upon the style and class of the circuitry selected. Notification appliance circuits shall be Class B.

Signaling Line Circuits: Provide circuitry, which meets the performance requirements during abnormal conditions, based upon the style and class of the circuitry selected. Signaling line circuitry shall be Class B.

Auxiliary Relays: Provide sufficient SPDT auxiliary relay contacts to provide accessory functions specified.

Digital Alarm Communicator Transmitter (DACT): Electrically supervised, capable of transmitting alarm, supervisory and trouble signals over telephone lines to remote station receiver. The installing contractor shall select the appropriate DACT equipment based on the available communication methods. Coordinate with General Contractor to ensure proper connections are provided for communication to and from the DACT. Two (2) separate communication methods are required and shall not be subject to a common failure within the scope of work identified within these contract documents. Unless noted otherwise, the installing contractor shall utilize two (2) of the following communication methods:

1. Copper wire (POTS) telephone line for fire alarm use as required by NFPA 72.
   Exception: If two (2) POTS telephone lines are utilized per NFPA 72, additional communication methods are not required.
2. Building 10/100 Base network (LAN), DSL modem, or cable modem.
3. GSM cellular networks in the area including 2G, 3G and 4G. The transmitter shall automatically detect and choose the best network in the area based on signal strength and immediately self-adjust for operation as necessary.
4. Other alternative method complying with the performance requirements of NFPA 72 for 'Communication Methods for Supervising Station Alarm Systems that is acceptable to the Authority Having Jurisdiction and the Engineer of Record. Approval of any alternative methods must be obtained from the Engineer of Record via an RFI prior to submitting bids for the scope of work.

Provide trouble acknowledge, drill, and alarm silence switch.

The control panel and remote annunciator panel shall have dedicated alarm, supervisory and trouble LED's and dedicated alarm, supervisory and trouble acknowledge switches.

Lamp Test: Manual lamp test function causes each LED to function at fire alarm control panel.

Drill Sequence of Operation: Manual drill function causes alarm mode operation as described above.

Addressable systems shall have silent walk test, history logging for a minimum of 400 events, 80 character LCD display.

C. SEQUENCE OF OPERATIONS

Trouble Sequence of Operation: System or circuit trouble places system in trouble mode, which causes the following system operations:

1. Visible and audible trouble alarm indicated at fire alarm control panel and remote annunciator panel (if provided).
2. Trouble signal transmitted to supervising station.
3. Manual acknowledge function at fire alarm control panel silences audible trouble alarm; visible alarm is displayed until initiating failure or circuit trouble is cleared.

Supervisory Sequence of Operation: The activation of any sprinkler valve tamper switch or duct-mounted smoke detector places system in supervisory mode, which causes the following system operations:

1. Visible and audible supervisory alarm indicated by address at fire alarm control panel and remote annunciator panel (if provided).
2. Supervisory signal transmitted to supervising station.
3. Duct-mounted smoke detectors shall shutdown their respective unit upon detection of smoke and remain down until manually reset.
4. Fan-powered terminal units that are less than 2,000 cfm and are not provided with duct detection shall shutdown when its respective air handling unit is shutdown.
5. Manual acknowledge function at fire alarm control panel and remote annunciator panel silences audible supervisory alarm; visible alarm is displayed until device is returned to its normal position/supervisory condition is cleared.

Alarm Sequence of Operation: Actuation of an alarm initiating device places system in alarm mode, which causes the following system operations.

1. Audible notification appliances shall sound until silenced by the alarm silence switch at the control panel.
2. All visible alarm notification appliances shall display a continuous synchronized pattern until reset by the Alarm Reset Switch.
3. Alarm signal transmitted to supervising station.
4. All fan-powered air-handling equipment shall shutdown and remain down until the fire alarm control panel is reset.
5. All high volume low speed fans shall shutdown and remain down until the fire alarm control panel is reset.
6. Shutdown all material handling equipment as required.
7. Disable access control system as required.
8. The alarm LED shall flash on the control panel and remote annunciator panel until the alarm has been acknowledged at the control panel/remote annunciator panel. Once acknowledged, this same LED shall latch on and the custom label for the address in alarm shall be displayed on the alphanumeric LCD readout. A subsequent alarm received from another address after acknowledged shall flash the alarm LED on the control panel showing the new alarm information.
8. A pulsing alarm tone shall occur within the control panel until acknowledged.

D. INITIATING DEVICES

Manual Pull Station: Provide semi-flush, non-coded type, double action manual pull station.

Smoke Detector (Photoelectric type): Device shall have visible indication of detector actuation, self-restoring, plug-in with an integral addressable module indicating the detector status. Photoelectric detectors shall have sensitivity between 0.5 and 3.5 percent/foot smoke obscuration.
Duct Mounted Smoke Detector: Photoelectric detector along with a standard, relay or isolator detector mounting base. Provide for variations in duct air velocity between 100 and 4000 feet per minute. Protect the measuring chamber from damage and insects. Provide an air exhaust tube and an air sampling inlet tube that extends into the duct air stream up to ten feet. Provide drilling templates and gaskets to facilitate locating and mounting the housing. Provide remote alarm LEDs and remote test stations as shown on the plans. Provide duct detection and shutdown for air distribution systems exceeding 2,000 cfm.

E. NOTIFICATION APPLIANCES

Alarm Horn: Surface type fire alarm horn. Sound rating: 90 dB at 10 feet.

Visible Alarm Notification Appliances (Strobes): Strobes shall be xenon or equivalent, unfiltered or clear filtered white light, intensity as indicated on drawings, flash rate range from 1 to 3 Hz, a maximum pulse duration of 0.2 sec with a maximum duty cycle of 40 percent. Strobe shall meet all requirements of the Americans with Disabilities Act.

Audible/Visible Alarm Notification Appliances (Horn/Strobes): Combination units shall provide a common enclosure for the fire alarm audible and visible alarm appliances and be UL listed for its purpose. Minimum audible level and strobe intensity shall meet all requirements for separate appliances.

Provide flush or recessed devices unless otherwise noted.

F. AUXILIARY DEVICES

Waterflow Alarm Switches: Provided by the Fire Sprinkler Installer and shall be wired, complete and ready for use, by the Fire Alarm System Installer. Switch shall have an adjustable delay to minimize false alarms due to fluctuations in water pressure.

Gate Valve (Tamper) Switches: Shall be provided by the Fire Sprinkler Installer and shall be wired complete and ready for use by the Fire Alarm System Installer.

Monitor Module: Addressable microelectronic module providing a system address for alarm initiating devices for wired applications with normally open contacts. Include address setting means on the module.

Control Relay Module: Provide intelligent control relay modules. The control relay module shall provide one form "C" dry relay contact rated at 2 amps at 24 Vdc to control external appliances or equipment shutdown. The control relay shall be rated for pilot duty and releasing systems. The position of the relay contact shall be confirmed by the system firmware.

Fire Department Key Box: Provide with an internal switch to indicate a supervisory condition at the fire alarm control and annunciator panels when the lid is removed.

G. FIRE ALARM WIRE AND CABLE

Fire Alarm Power Branch Circuits: Building wire as specified in Division 26.

Signaling Line, Initiating Device, and Notification Appliance Circuits: Power limited fire-protective signaling cable, solid copper conductor, 300 Volts insulation, suitable for temperature, conditions and location installed. Minimum wire size for initiating device circuits, control circuits and notification appliance circuits shall be determined by calculations and manufacturer's requirements or recommendations. Wire and cable shall be twisted and shielded if recommended by the system manufacturer. Initiating, notification, and control circuits shall be sized based on 20 percent additional power consuming devices. The conductors shall meet the requirements of NEC Article 760.

All wiring provided on this project shall be UL listed for the intended use. All wiring including wiring to existing modified devices and appliances shall be new.

3. EXECUTION

A. GENERAL

Install, program, and test all new equipment identified in this contract and revise existing equipment as noted.

The installation supervisor shall be on the job site during the entire installation. The installation supervisor shall maintain marked up copies of the drawings at the job site showing as-built conditions. These drawings shall be updated daily and available for Owner review.

Provide all required conduit and all associated hardware and install (pull), connect, and test all cable for a complete fire alarm system. Install all wiring in accordance with the guidelines of these specifications and documents as well as the NFPA codes and standards listed in these specifications.

B. INSTALLATION

Pathways above suspended ceilings and in nonaccessible locations may be routed exposed where permitted by NFPA 70 & 72. Exposed pathways located less than 96 inches above the floor shall be installed in conduit. Minimum allowable conduit size shall be 3/4 inch. Size the conduit so that conduit fill does not exceed 75 percent of NFPA 70 maximum fill requirements. Cables in vertical risers shall not exceed 50 percent of NFPA 70 maximum fill requirements. Conduit installation shall be as required by the Contractor's layout and as described in these specifications. All conduit field routing shall be acceptable to the Owner. Routing not acceptable shall be rerouted and replaced without expense to the Owner.

Conceal all wire, cable, conduit, and raceways in walls, ceiling spaces, electrical shafts, or closets in finished areas except as specifically noted otherwise. Conduit and raceways may be exposed in unfinished areas or where specifically approved by the Owner.

Except as otherwise specified or indicated on the drawings, Install all conduit parallel or perpendicular to dominant surfaces with right angle turns made of symmetrical bends or fittings. Except where prevented by the location of other work, a single conduit or a conduit group shall be centered on structural members.

Locate conduit at least six inches from hot water or steam pipes and from other hot surfaces. Conduit shall not block access to any existing equipment or fixtures.

Label all conduits and junction boxes as specified in Division 26.

Terminate all wiring at devices or panels using terminal connectors for screw type terminals. All terminal connectors for conductors shall be pre-insulated ring type or pre-insulated spade type. Pre-insulated terminal connectors shall include a vinyl sleeve, color coded to indicate conductor size. Pre-insulated terminal connectors shall include a metallic support sleeve bonded to the vinyl-insulating sleeve and designed to grip the conductor insulation.

Mount end-of-line device in box with last device or separate box adjacent to last device in circuit for conventional hardwired Class B initiating and notification appliance circuits.

Securely fasten conduit to all boxes and cabinets. Threads on metallic conduit shall project through the wall of the box to allow the bushing to butt against the end of the conduit. The locknuts both inside and outside shall then be tightened sufficiently to bond the conduit securely to the box. Conduit shall enter cabinets from the bottom and sides only.

Install manual stations with operating handle 48 inches above floor unless noted otherwise on drawings.

Install ceiling mounted initiating devices in areas with exposed structure tight to underside of floor/roof deck.

Do not install smoke detectors in a direct air flow nor closer than 3 feet (1 meter) from an air supply diffuser or return air opening.

Install ceiling mounted visible and audible/visible notification appliances in areas with exposed structure to bottom of floor/roof structure or at 30 ft AFF, whichever is lower.

Install ceiling mounted visible and audible/visible notification appliances in areas with finished ceilings flush with bottom of ceiling or at 30 ft AFF, whichever is lower.

Install wall mounted visible and audible/visible notification appliances with visible element (strobe) between 80 inches and 96 inches above finished floor unless noted otherwise on drawings.

Install wall mounted audible devices with the top of the device at least 90 inches above finished floor or 6 inches below the ceiling, whichever is lower, unless noted otherwise on drawings. If combination devices are installed, they shall be installed per the visible signal device requirements.

Make conduit and wiring connections to equipment provided by others.

Provide strobe synchronization as required per NFPA 72.

A. FIELD QUALITY CONTROL

Systems shall be checked and tested in accordance with the instructions provided by the manufacturer to ensure that the system functions as required and is free of grounds, opens, and shorts. Each device shall be tested. Smoke detectors shall be tested with products of combustion.

Upon completion of the system installation and before the date of final acceptance, a factory-trained technician shall perform all necessary tests and adjustments and shall file a Letter of Certification and a Certificate of Completion (NFPA 72) with the Owner indicating that the system functions and conforms to the specifications.

Test in accordance with NFPA 72 and local fire department requirements.

B. MANUFACTURER'S FIELD SERVICES

Include services of factory trained and certified technician to supervise installation, adjustments, final connections, and system testing as performed by the Contractor's factory-trained technicians.

The equipment supplier's factory trained technician shall train the Owner's personnel in the proper use and maintenance of the system. Training sessions shall be conducted as needed, not to exceed a total of 2 sessions, with each session lasting a maximum of 4 hours each.

C. ACCEPTANCE TESTING

Upon completion of the system installation, a factory-trained technician shall perform all necessary tests and adjustments in the presence of the Owner's designated personnel.

END OF SECTION 28

IMEG
www.imegcorp.com
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
RYAN D. MORRIS
No. 15416
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

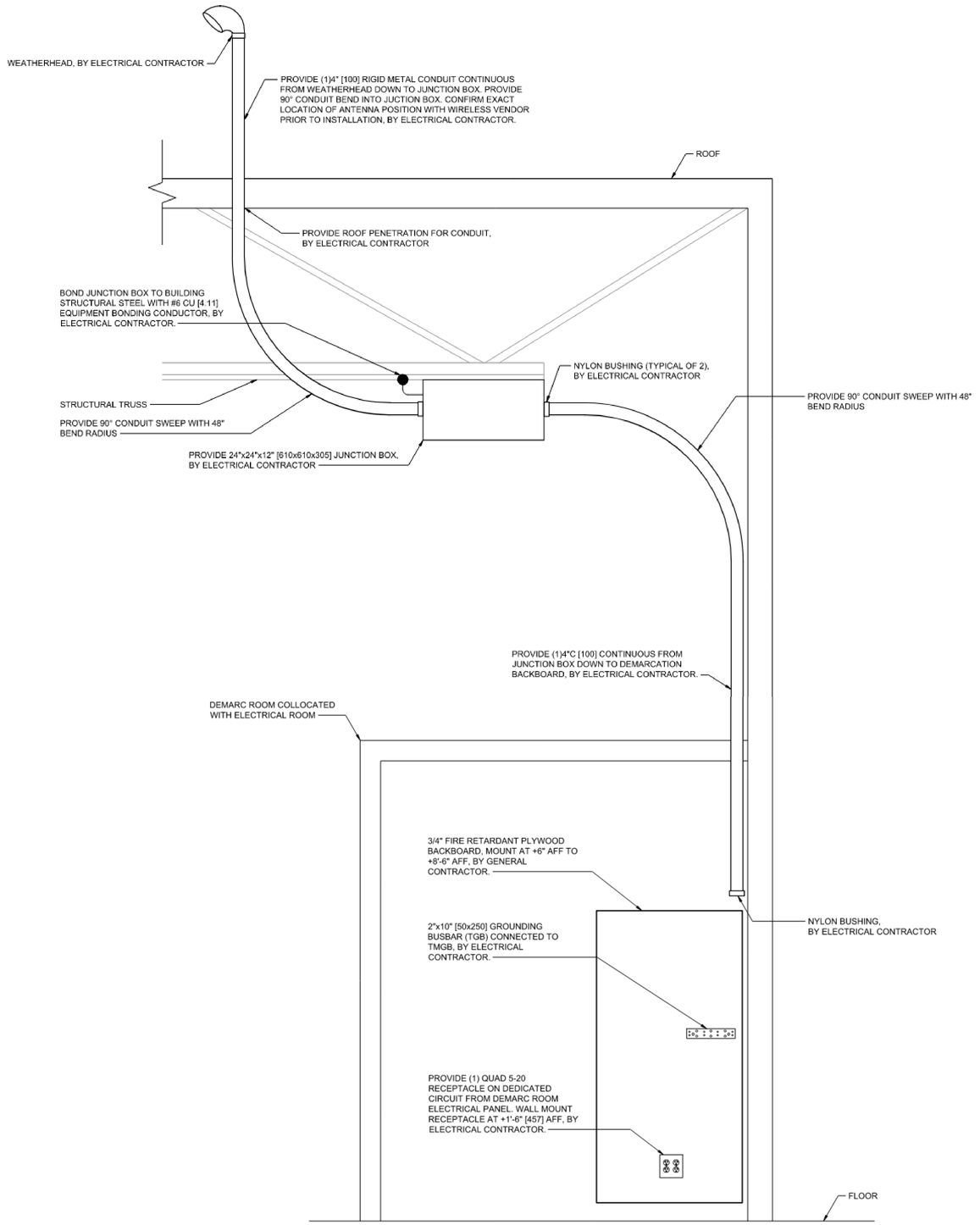
ID	Description	Date

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
FIRE ALARM SPECIFICATIONS

E4.06



NOTES:
1. FINAL MOUNTING AND CONFIGURATION OF THE ANTENNA SHALL BE PROVIDED BY WIRELESS VENDOR. COORDINATE EXACT LOCATION AND MOUNTING REQUIREMENTS ON-SITE PRIOR TO CABLING INSTALLATION. THE DETAIL ABOVE IS SHOWN FOR REFERENCE ONLY.

1 / E4.07 FIXED WIRELESS CONDUIT RISER
NTS

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.

IMEG 5504 W. PINNACLE POINTE DRIVE SUITE 200 ROGERS, AR 72758 P: 479.899.6370 PROJECT #250428
www.imegcorp.com
Arkansas Certificate of Authorization #4308
0 1 2 3
REF. SCALE IN INCHES

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
LICENSED PROFESSIONAL ENGINEER
No. 15416
RYAN D. MORRIS
11/21/2025

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

TRAMMELL CROW

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

Revisions / Submissions

ID	Description	Date

© 2025 CESO, INC.

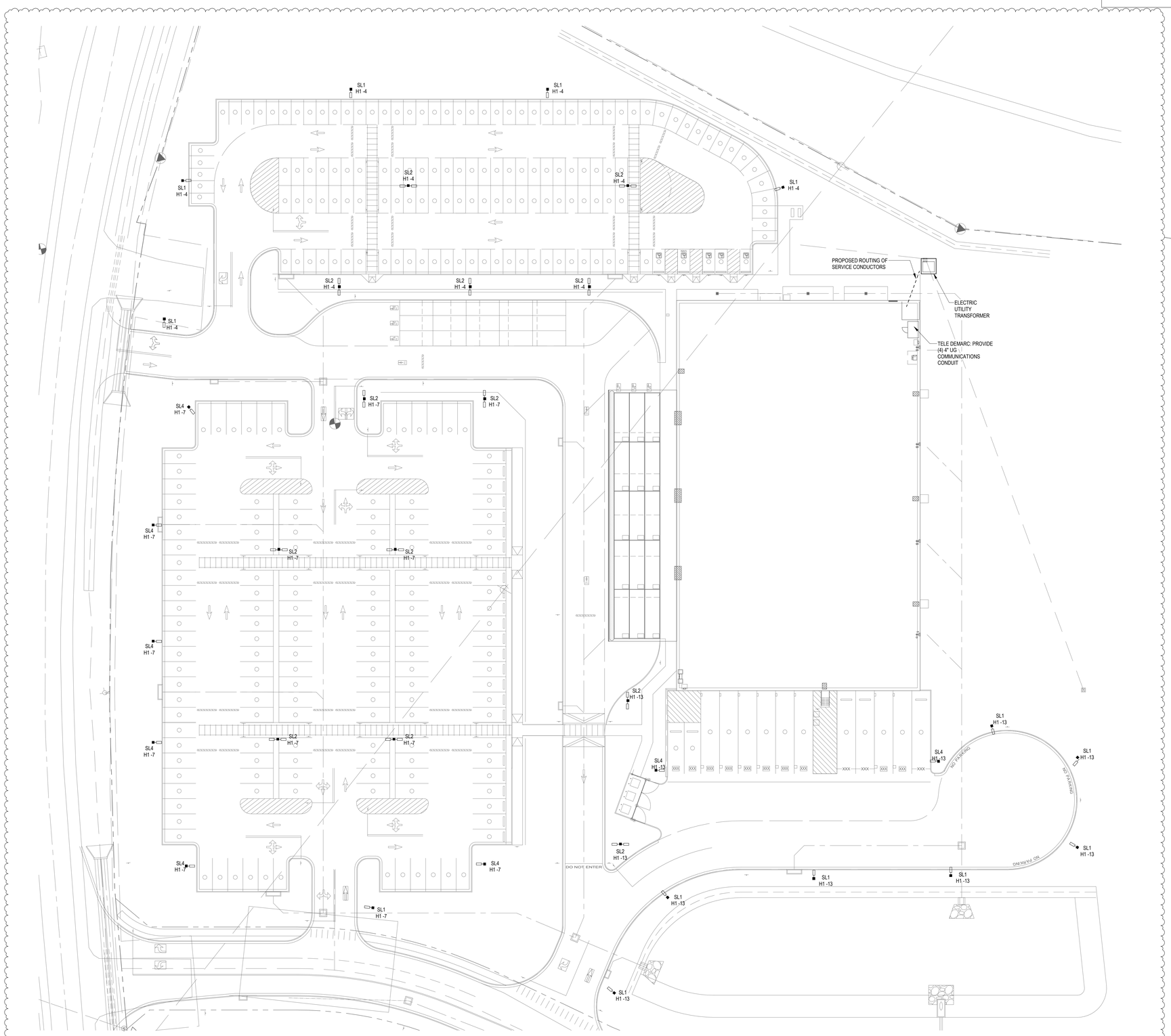
Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL DETAILS

E4.07

GENERAL NOTES

1. SITE LIGHTING CONTROLLED VIA ASTRONOMICAL TIMECLOCK.
2. COORDINATE WITH CIVIL ENGINEER FOR INCOMING TELE-LINES TO DEMARC.



N

1 / E5.01 ELECTRICAL SITE PLAN
Scale: 1" = 30'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
09/11/2026
LICENSED PROFESSIONAL ENGINEER
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com
CONSULTANT:

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
ELECTRICAL SITE PLAN

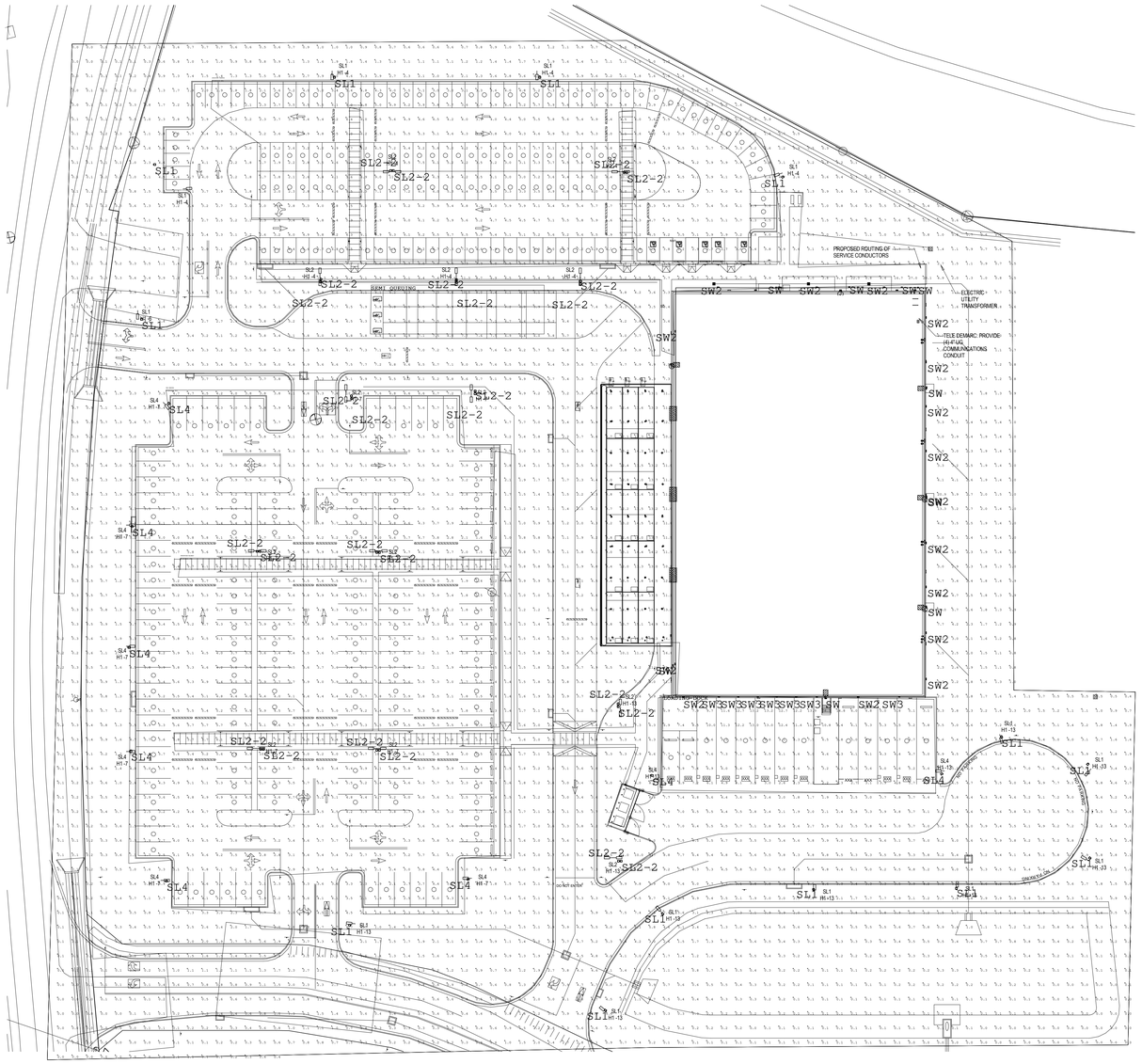
E5.01

IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com

IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN APPROVAL AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428

Calculation Summary							
Label	CalcType	Units	Avg	Max	Min	Avg/Min	Max/Min
Site_Top	Illuminance	Fc	3.56	29.6	0.0	N.A.	N.A.
ASSOCIATE PARKING	Illuminance	Fc	4.78	11.0	1.8	2.66	6.11
CANOPY	Illuminance	Fc	12.40	16.3	8.4	1.48	1.94
LOADING DOCK	Illuminance	Fc	6.88	26.3	2.2	3.13	11.95
PEDESTRIAN WALKWAY	Illuminance	Fc	5.14	29.6	0.9	5.71	32.89
PEDESTRIAN WALKWAY_1	Illuminance	Fc	6.59	27.0	2.6	2.53	10.38
SEMI QUEUING	Illuminance	Fc	7.00	10.0	5.8	1.21	1.72
VAN PARKING	Illuminance	Fc	4.36	10.8	1.1	3.96	9.82



1 SITE PHOTOMETRIC PLAN
E5.02 1" = 40'-0"

CESO
WWW.CESOINC.COM
175 Montrose West Ave., Suite 400
Akron, OH 44321
Phone: 330.665.0660 Fax: 888.208.4826

STATE OF ARKANSAS
04/01/2024
LICENSED PROFESSIONAL ENGINEER
Ryan D. Morris
No. 15416
RYAN D. MORRIS

HP ENGINEERING
now IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
479.899.6370 www.imegcorp.com

CONSULTANT:

PROJECT TCC MOUNTAIN HOME

2356 AR-201, MOUNTAIN HOME, AR 72653

TRAMMELL CROW

Revisions / Submissions

ID	Description	Date
1	REVISION 1	06.10.2026

© 2025 CESO, INC.

Project number:	766951-01
Scale:	AS NOTED
Drawn By:	BBP
Checked By:	RM
Date:	11.21.2025
Issue:	PERMIT SET

Sheet Title:
SITE PHOTOMETRICS

E5.02

IMEG
5504 W. PINNACLE POINTE DRIVE
SUITE 200
ROGERS, AR 72758
P: 479.899.6370
PROJECT #250428
www.imegcorp.com
IMEG RESERVES PROPRIETARY RIGHTS, INCLUDING COPYRIGHTS, TO THIS DRAWING AND THE DATA SHOWN THEREON. SAID DRAWING AND/OR DATA ARE THE EXCLUSIVE PROPERTY OF IMEG AND SHALL NOT BE USED OR REPRODUCED FOR ANY OTHER PROJECT WITHOUT THE EXPRESS WRITTEN CONSENT AND PARTICIPATION OF IMEG.
©2025 IMEG CONSULTANTS CORP.
Arkansas Certificate of Authorization #4308

0 1 2 3
REF. SCALE IN INCHES PROJECT #250428