

MISSOURI DEPARTMENT OF TRANSPORTATION

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BUNKER
Mechanics & Cold Storage Building
Southeast District
409 Route A, Bunker, MO 63629
Dent County

CODE REQUIREMENTS

BUILDING CODE: ANALYSIS BASED ON 2013 INTERNATIONAL BUILDING CODE
 2013 INTERNATIONAL PLUMBING CODE
 2013 INTERNATIONAL MECHANICAL CODE
 2013 NATIONAL ELECTRICAL CODE

USE GROUP: B (BUSINESS)
 S-1 (MODERATE HAZARD STORAGE)

DESIGNED AS NON-SEPERATED USE GROUPS

CONSTRUCTION TYPE: VB COMBUSTIBLE, NON PROTECTED

ALLOWABLE AREA: 9000 SF
 PROPOSED AREA: 5700 SF
 BUSINESS: 800 SF
 STORAGE: 4900 SF

ALLOWABLE HEIGHT: 2 STORY
 PROPOSED HEIGHT: 1 STORY

OCCUPANT LOAD:
 BUSINESS: 800SF/100SF PER OCCUPANT = 8 OCCUPANTS
 STORAGE: 4900SF/500SF PER OCCUPANT = 10 OCCUPANTS
 TOTAL: 18 OCCUPANTS



COVER SHEET

MISSOURI DEPARTMENT
OF TRANSPORTATION

DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

DESIGN BY: LARRY CARVER
DATE: 2-16-17

Sheet
1 of 27

LEGEND (EXISTING)

WATER ----- W -----
 ELECTRICAL ----- E -----
 SANITARY ----- SAN -----
 EXISTING WATER METER - 2" WM
 500 GAL LP TANK - LPT
 SEPTIC TANK - ST
 3/4" WATER HYDRANTS - EWH
 POWER POLE - PP
 500 GAL. LP TANK - LPT5
 METER POWER POLE - MPP

LEGEND (NEW)

PROPANE GAS ----- G -----
 WATER ----- W -----
 ELECTRIC 1 PHASE ----- E -----
 STORM SEWER ----- S -----
 SANITARY SEWER ----- SAN -----
 CLEAN OUT - CO
 1,200 GAL. OIL SEPARATOR - OS
 2 POWER POLES, 600A SERVICE W/DISCONNECTS - PSD
 2" BLOW-OFF HYDRANT - 2BOH
 1" YARD HYDRANT - 1YH

GRADING NOTES:

CONTRACTOR WILL BE RESPONSIBLE FOR:
 EXCAVATION OF THE SUB GRADE.
 EXCAVATING OF FOOTINGS.
 ALL BACK FILL MATERIAL INSIDE AND OUTSIDE NEW BUILDING.
 CRUSHED ROCK BASE UNDER BUILDING & APPROACH SLAB.
 BACK FILL ALONG APPROACH SLAB A MINIMUM OF 6" BELOW TOP OF SLAB AND SIDEWALK.
 PROVIDE 6" OF COMPACTED 1" MINUS ROCK UP TO 15'-0" OUTSIDE NEW BUILDING INCLUDING APPROACH PAD. CONTOUR TO DRAIN AWAY FROM NEW CONSTRUCTION.

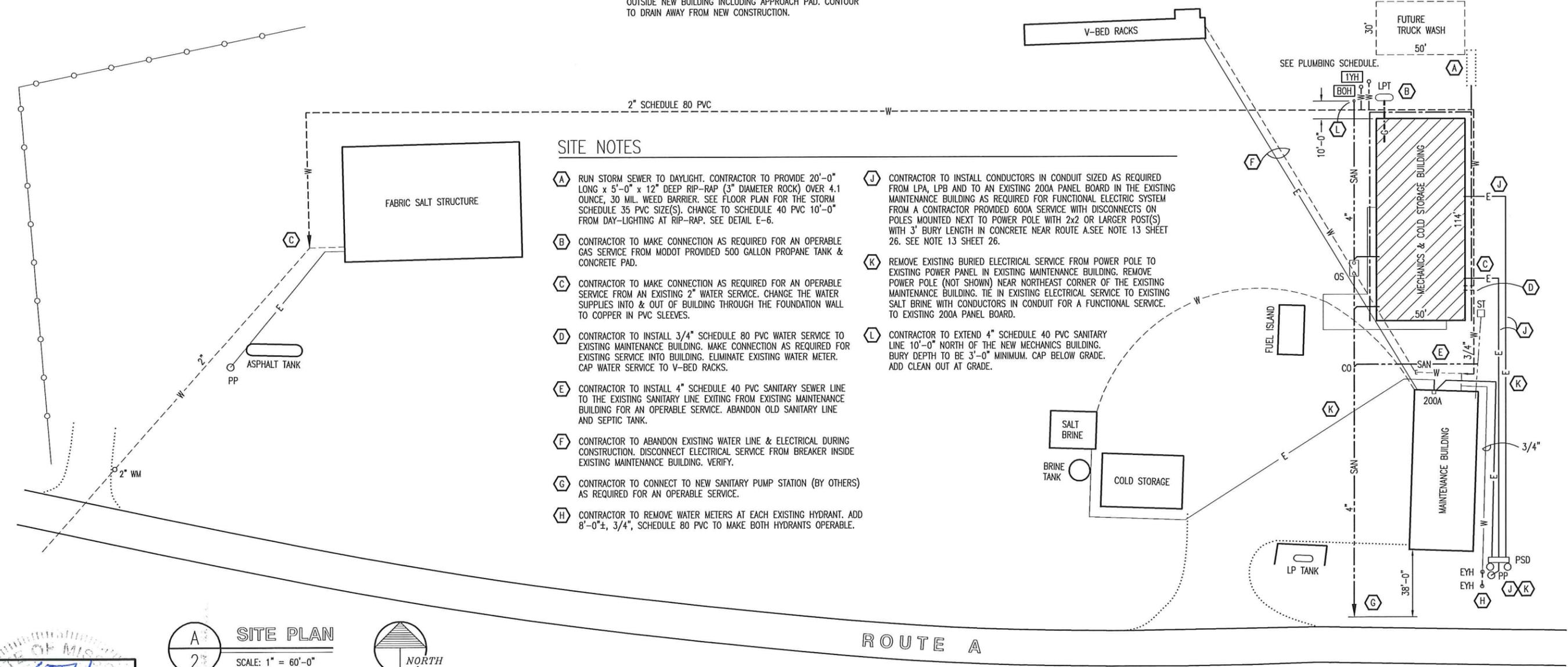
VERIFY UTILITY LOCATIONS BEFORE CONSTRUCTION.

MODOT TO HAVE THE FOUR CORNERS STAKED AND BUILDING FOOTPRINT & EXTERIOR APPROACH SLAB LEVELLED.

EXCAVATED SOIL AND ROCK NOT USED CAN BE PLACED ON SITE. AREA TO BE DESIGNATED BY OWNER.

CONTRACTOR TO INSTALL TRACER WIRE ON ALL WATER AND SEWER SYSTEMS AND AN ACCESS POINT WITHIN A PROTECTIVE ENCLOSURE IN THE PUBLIC RIGHT OF WAY FOR ANY NEWLY INSTALLED OR FULLY REPLACED FACILITIES.

CONTRACTOR TO PROVIDE AND INSTALL ADEQUATE AMOUNT OF TOPSOIL, STARTER FERTILIZER, TRIPLE 'T' SEED AND STRAW FOR ANY LAWN AREAS TO REMAIN AS SAME BUT DISTURBED DURING CONSTRUCTION.



SITE NOTES

- A RUN STORM SEWER TO DAYLIGHT. CONTRACTOR TO PROVIDE 20'-0" LONG x 5'-0" x 12" DEEP RIP-RAP (3" DIAMETER ROCK) OVER 4.1 OUNCE, 30 MIL. WEED BARRIER. SEE FLOOR PLAN FOR THE STORM SCHEDULE 35 PVC SIZE(S). CHANGE TO SCHEDULE 40 PVC 10'-0" FROM DAY-LIGHTING AT RIP-RAP. SEE DETAIL E-6.
- B CONTRACTOR TO MAKE CONNECTION AS REQUIRED FOR AN OPERABLE GAS SERVICE FROM MODOT PROVIDED 500 GALLON PROPANE TANK & CONCRETE PAD.
- C CONTRACTOR TO MAKE CONNECTION AS REQUIRED FOR AN OPERABLE SERVICE FROM AN EXISTING 2" WATER SERVICE. CHANGE THE WATER SUPPLIES INTO & OUT OF BUILDING THROUGH THE FOUNDATION WALL TO COPPER IN PVC SLEEVES.
- D CONTRACTOR TO INSTALL 3/4" SCHEDULE 80 PVC WATER SERVICE TO EXISTING MAINTENANCE BUILDING. MAKE CONNECTION AS REQUIRED FOR EXISTING SERVICE INTO BUILDING. ELIMINATE EXISTING WATER METER. CAP WATER SERVICE TO V-BED RACKS.
- E CONTRACTOR TO INSTALL 4" SCHEDULE 40 PVC SANITARY SEWER LINE TO THE EXISTING SANITARY LINE EXITING FROM EXISTING MAINTENANCE BUILDING FOR AN OPERABLE SERVICE. ABANDON OLD SANITARY LINE AND SEPTIC TANK.
- F CONTRACTOR TO ABANDON EXISTING WATER LINE & ELECTRICAL DURING CONSTRUCTION. DISCONNECT ELECTRICAL SERVICE FROM BREAKER INSIDE EXISTING MAINTENANCE BUILDING. VERIFY.
- G CONTRACTOR TO CONNECT TO NEW SANITARY PUMP STATION (BY OTHERS) AS REQUIRED FOR AN OPERABLE SERVICE.
- H CONTRACTOR TO REMOVE WATER METERS AT EACH EXISTING HYDRANT. ADD 8'-0"±, 3/4", SCHEDULE 80 PVC TO MAKE BOTH HYDRANTS OPERABLE.
- J CONTRACTOR TO INSTALL CONDUCTORS IN CONDUIT SIZED AS REQUIRED FROM LPA, LPB AND TO AN EXISTING 200A PANEL BOARD IN THE EXISTING MAINTENANCE BUILDING AS REQUIRED FOR FUNCTIONAL ELECTRIC SYSTEM FROM A CONTRACTOR PROVIDED 600A SERVICE WITH DISCONNECTS ON POLES MOUNTED NEXT TO POWER POLE WITH 2x2 OR LARGER POST(S) WITH 3' BURY LENGTH IN CONCRETE NEAR ROUTE A. SEE NOTE 13 SHEET 26. SEE NOTE 13 SHEET 26.
- K REMOVE EXISTING BURIED ELECTRICAL SERVICE FROM POWER POLE TO EXISTING POWER PANEL IN EXISTING MAINTENANCE BUILDING. REMOVE POWER POLE (NOT SHOWN) NEAR NORTHEAST CORNER OF THE EXISTING MAINTENANCE BUILDING. TIE IN EXISTING ELECTRICAL SERVICE TO EXISTING SALT BRINE WITH CONDUCTORS IN CONDUIT FOR A FUNCTIONAL SERVICE. TO EXISTING 200A PANEL BOARD.
- L CONTRACTOR TO EXTEND 4" SCHEDULE 40 PVC SANITARY LINE 10'-0" NORTH OF THE NEW MECHANICS BUILDING. BURY DEPTH TO BE 3'-0" MINIMUM. CAP BELOW GRADE. ADD CLEAN OUT AT GRADE.

A SITE PLAN
 2 SCALE: 1" = 60'-0"



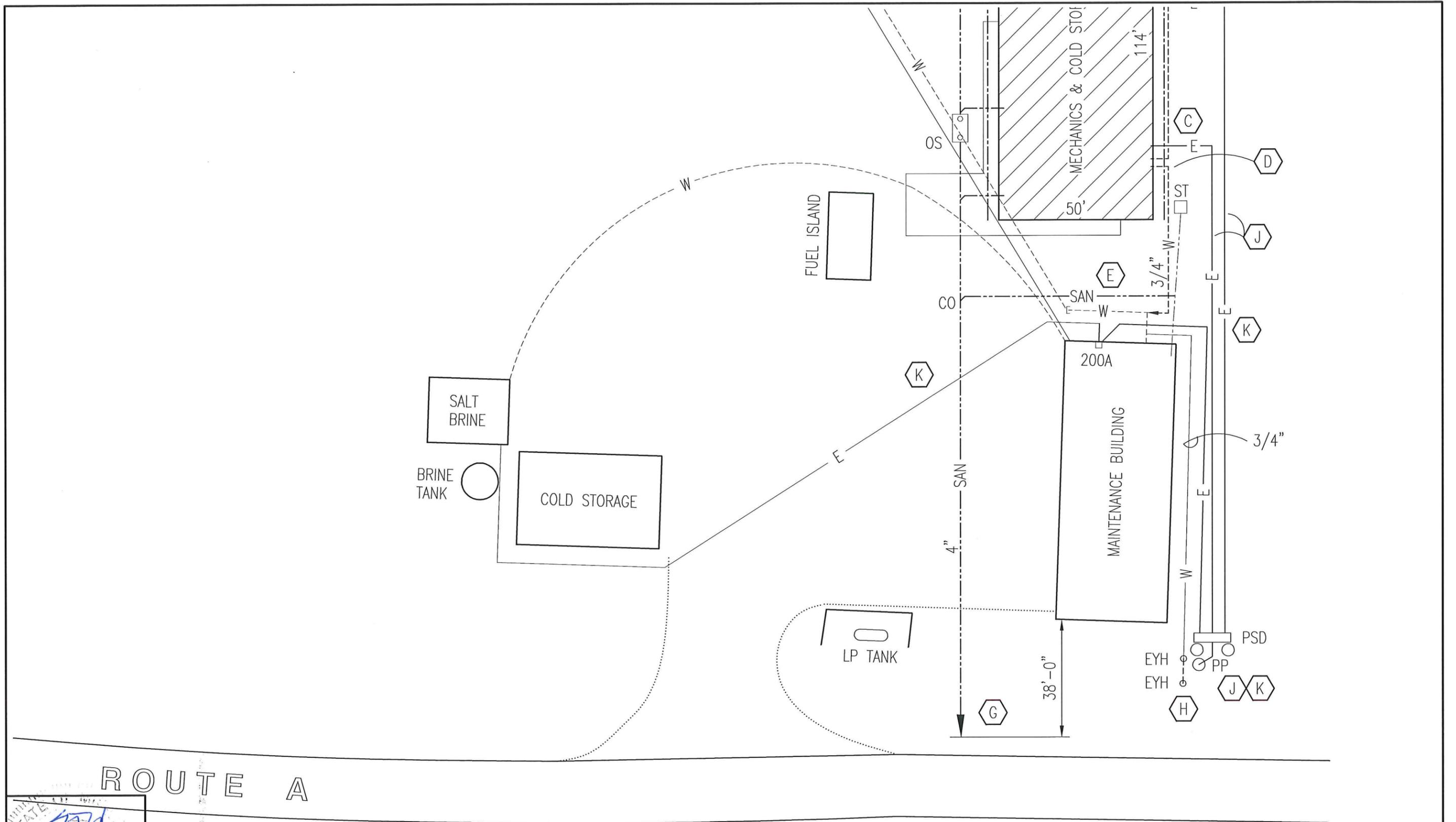
SITE PLAN

MISSOURI DEPARTMENT OF TRANSPORTATION
 MARION THOMAS HALL
 NUMBER A-2913
 2/17/2017

MISSOURI DEPARTMENT OF TRANSPORTATION
 DIVISION OF GENERAL SERVICES
 FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
 Southeast District - Dent County
 409 Route A, 63629

DESIGN BY: LARRY CARVER
 DATE: 2-16-17
 Sheet 2 of 27



ROUTE A

MISSOURI STATE
 REGISTERED PROFESSIONAL ENGINEER
 MARION THOMAS
 HALL
 NUMBER
 A-2913
 2/17/20

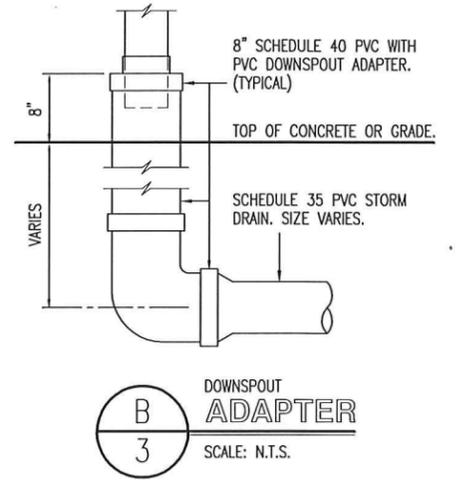
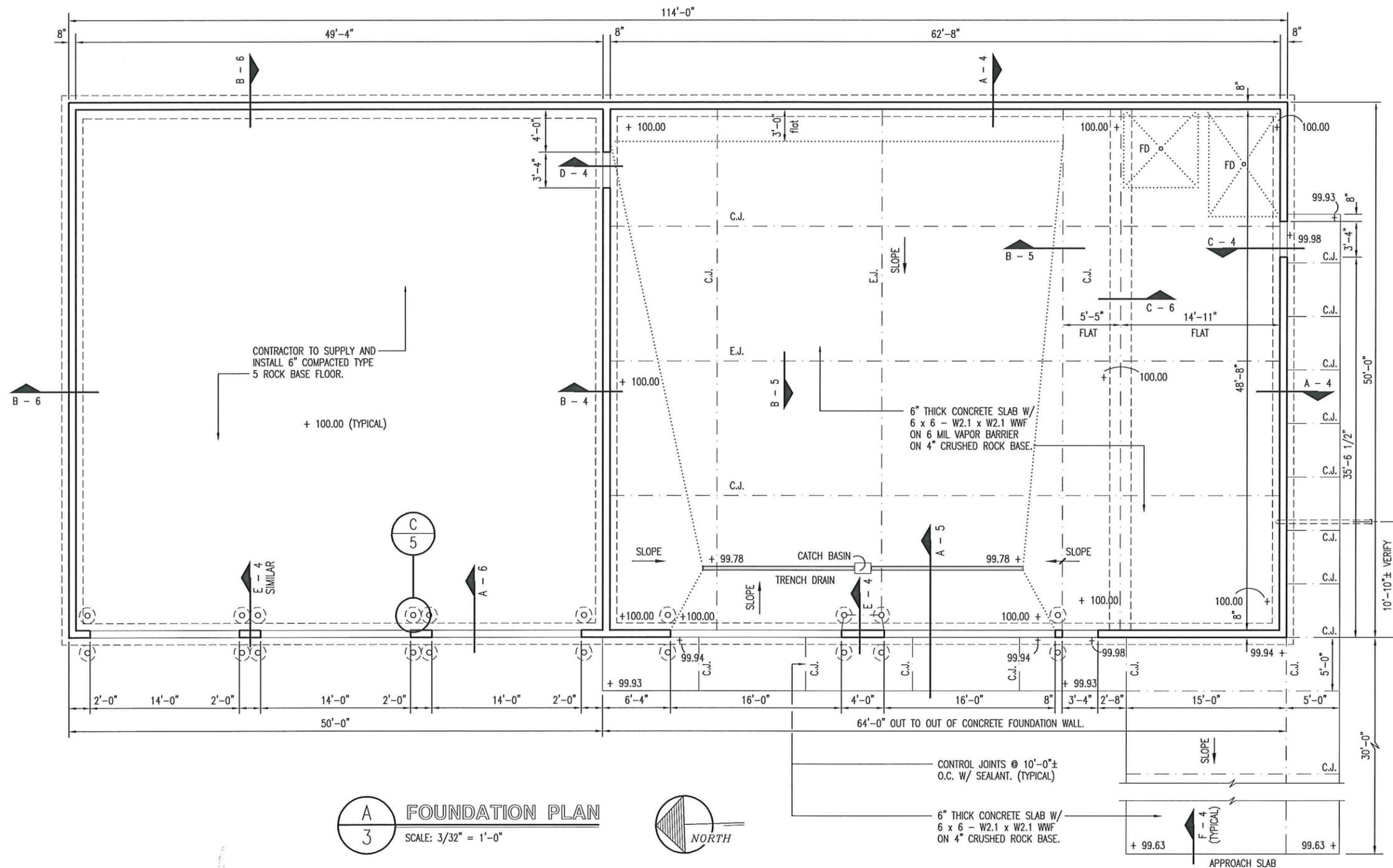
SITE PLAN ENLARGED

MISSOURI DEPARTMENT
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 FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
 Southeast District - Dent County
 409 Route A, 63629

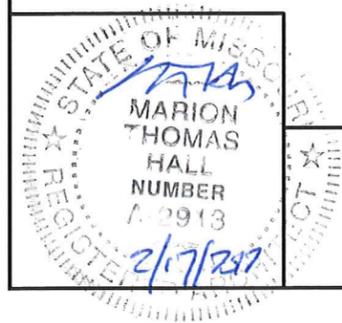
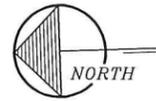
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PROVIDE (1) 4" SCH 40 PVC WITH FIBER OPTIC SWEEPS UP THROUGH 201 MEZZANINE 12" A.F.F. EXTEND 3'-0" BEYOND THE SIDEWALK AND CAP 24" BELOW GRADE.

A
3
FOUNDATION PLAN
SCALE: 3/32" = 1'-0"

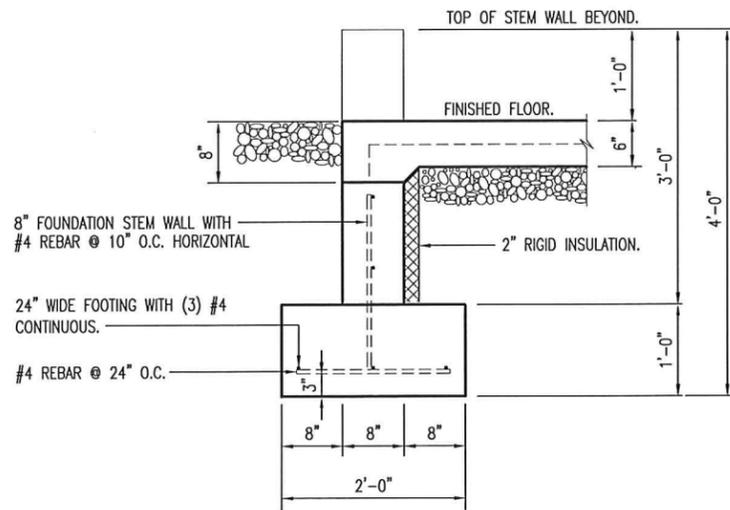


FOUNDATION PLAN

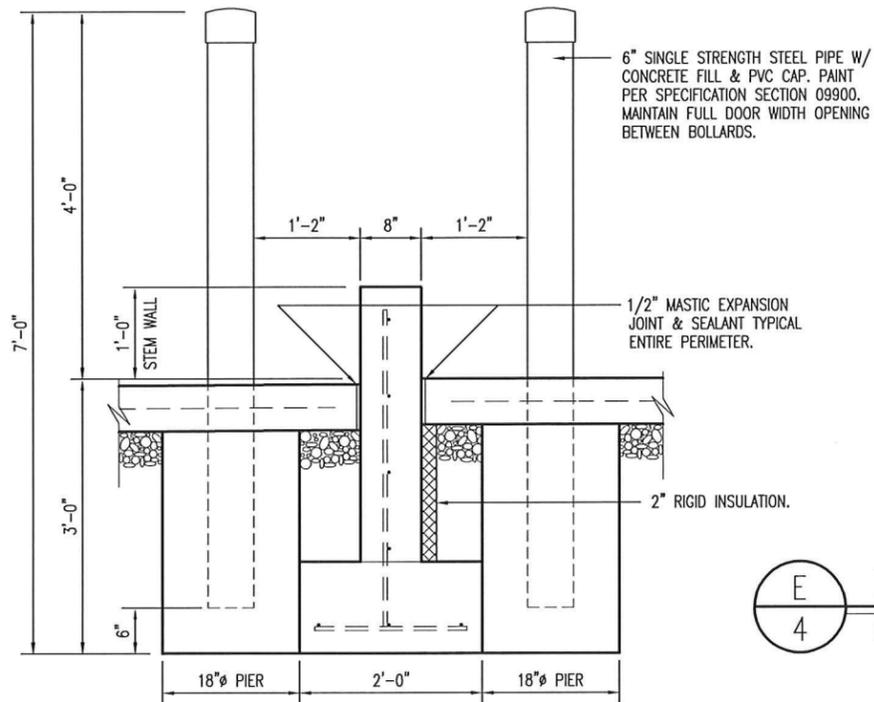
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FACILITIES MANAGEMENT

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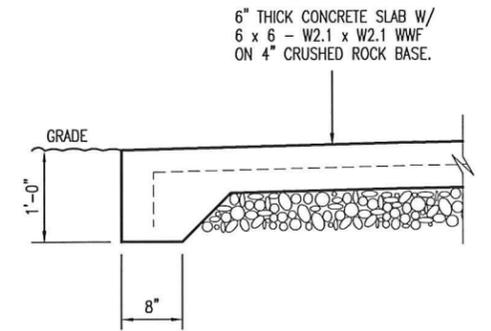
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DATE: 2-16-17
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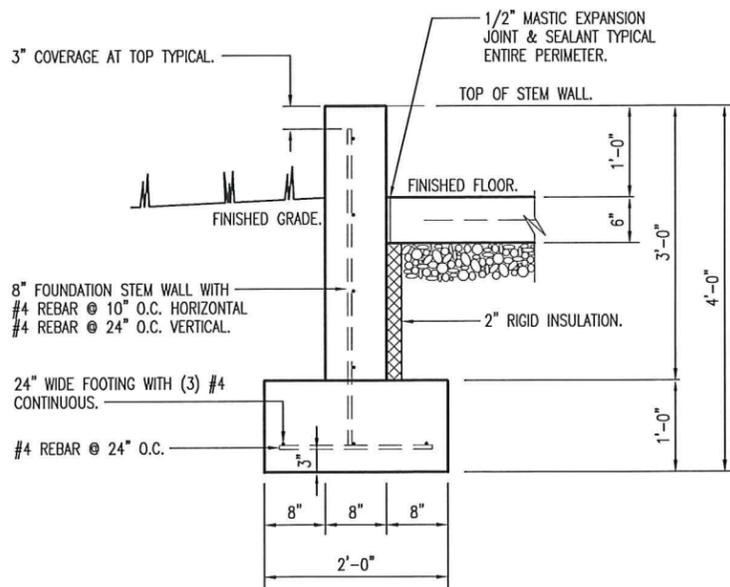
D
4
PASSAGE DOOR
EXTERIOR STEM WALL
SCALE: 1/2" = 1'-0"



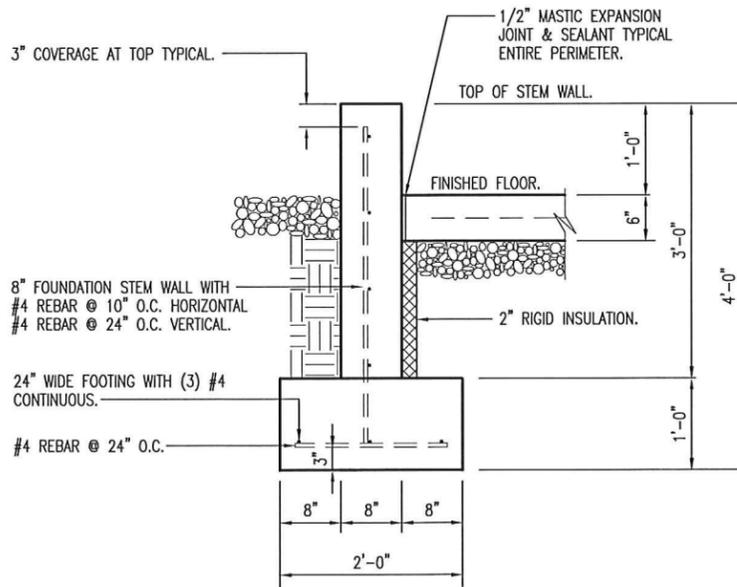
E
4
BOLLARD @ FOOTING DETAIL
SCALE: 1/2" = 1'-0"



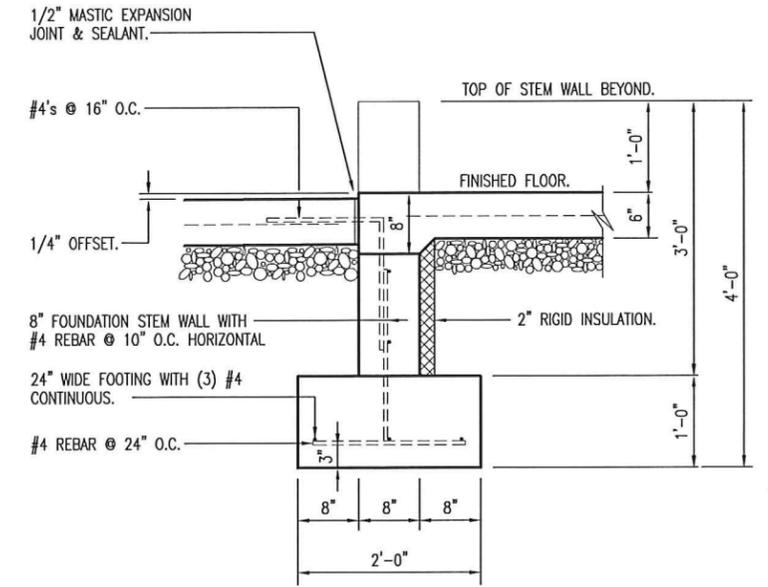
F
4
SIDEWALK SECTION
SCALE: 1/2" = 1'-0"



A
4
STEM WALL
SCALE: 1/2" = 1'-0"



B
4
STEM WALL
SCALE: 1/2" = 1'-0"



C
4
EXTERIOR STEM WALL @ DOOR
SCALE: 1/2" = 1'-0"

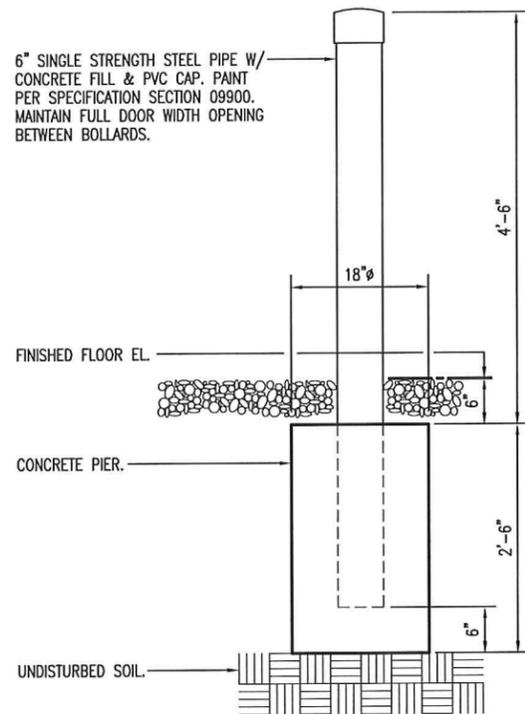
STATE OF MISSOURI
REGISTERED PROFESSIONAL ENGINEER
MARION THOMAS HALL
NUMBER A-2913
2/17/20

FOUNDATION DETAILS

MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

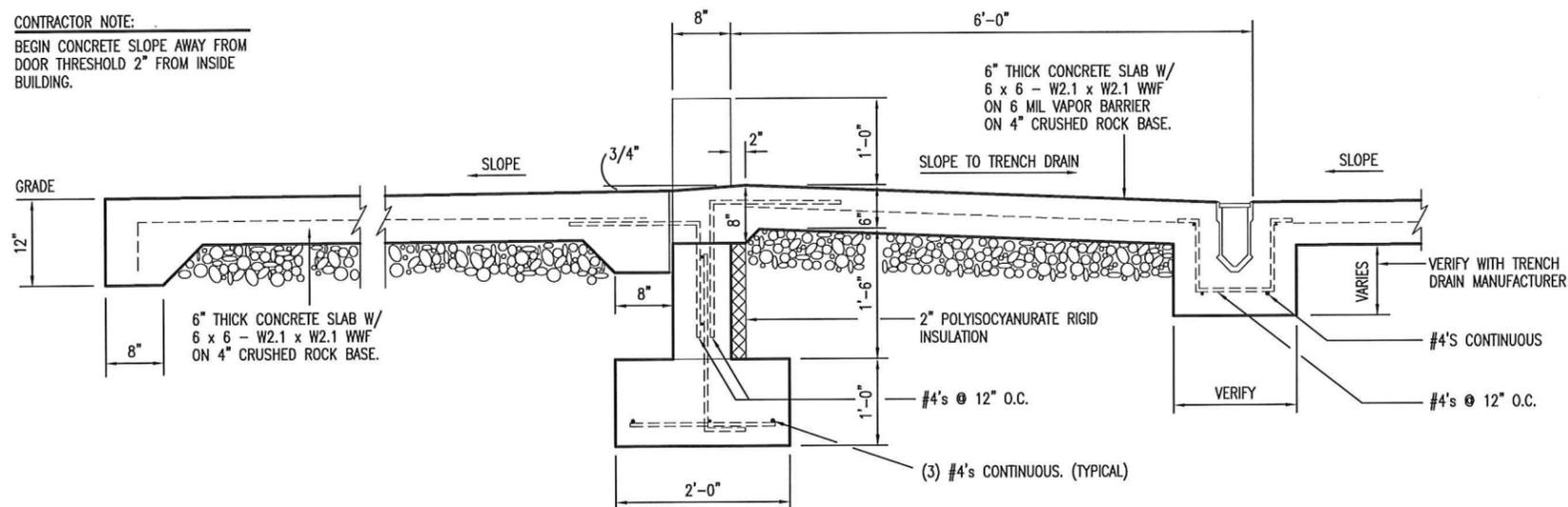
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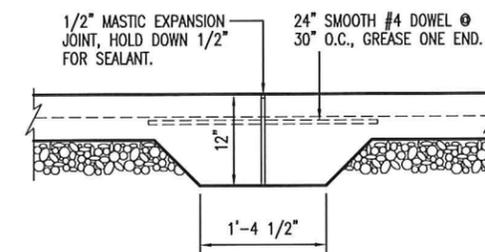
C
5 BOLLARD ELEVATION
SCALE: 1/2" = 1'-0"

CONTRACTOR NOTE:

BEGIN CONCRETE SLOPE AWAY FROM
DOOR THRESHOLD 2" FROM INSIDE
BUILDING.



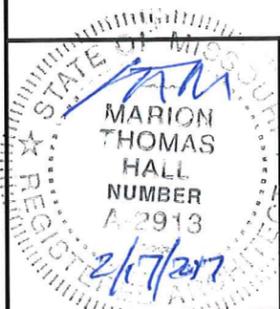
A
5 TRENCH DRAIN WITH
APPROACH APRON
SCALE: 1/2" = 1'-0"



B
5 EXPANSION JOINT
SCALE: 1/2" = 1'-0"

CONCRETE NOTES

1. CONCRETE WORK SHALL BE EXECUTED IN STRICT COMPLIANCE WITH THE LATEST EDITION OF THE AMERICAN CONCRETE INSTITUTE (A.C.I.) MANUAL OF CONCRETE PRACTICE.
2. FOUNDATION DESIGN IS BASED UPON AN ASSUMED SOIL BEARING CAPACITY OF 2,000 PSF. IF WET OR UNUSUAL SOIL CONDITIONS ARE ENCOUNTERED, NOTIFY THE DESIGNER AND CONSTRUCTION INSPECTOR BEFORE PROCEEDING WITH THE WORK.
3. IF CONDITIONS REQUIRING ROCK EXCAVATION ARE ENCOUNTERED, NOTIFY THE DESIGNER AND CONSTRUCTION INSPECTOR BEFORE PROCEEDING WITH THE WORK.
4. ALL CONCRETE SHALL BE TYPE 1 CEMENT WITH A COMPRESSIVE STRENGTH OF 4,000 PSI @ 28 DAYS AND NOT TO EXCEED 4" SLUMP.
5. FOUNDATION PIERS AND FOOTINGS SHALL BEAR A MINIMUM OF 12 INCHES INTO UNDISTURBED SOIL AND 36 INCHES MINIMUM BELOW FINISH GRADE.
6. DEFORMED STEEL REINFORCING BARS SHALL BE: #4 AND LARGER ASTM A615 GRADE 60.
7. SEE SPECIFICATION SECTION 03300 CONCRETE FOR ADDITIONAL INFORMATION.
8. CONCRETE EXPOSED TO THE EXTERIOR SHALL RECEIVE AIR ENTRAINMENT 6% +/- 2%.
9. PROVIDE CORNER REINFORCING BARS WITH 12" MINIMUM LAP EQUAL IN SIZE AND GRADE TO CONNECTING BARS.
10. EXTERIOR CONCRETE FLATWORK SHALL HAVE A LIGHT BROOM FINISH.
11. COORDINATE WORK OF OTHER TRADES REQUIRED TO BE INSTALLED IN, UNDER, OR THROUGH CONCRETE PRIOR TO PLACEMENT OF CONCRETE. INSTALL ALL ANCHORAGES AND SLEEVES REQUIRED FOR THE INSTALLATION OF WORK BY OTHER TRADES.
12. ENTIRE PERIMETER OF BUILDING TO RECEIVE 2" POLYISOCYANURATE RIGID INSULATION BOARD.
13. SAWED CONTROL JOINTS SHALL BE CLEANED FREE OF ALL DEBRIS AND FILLED WITH SEALANT. SEE SECTION 07900.
14. ALL EXPOSED INTERIOR CONCRETE FLOORS SHALL RECEIVE A CURING/SEALING FINISH PER SPECIFICATION SECTION 03346.
15. COPPER PIPING RUN THROUGH CONCRETE WORK SHALL BE RUN THROUGH PVC SLEEVES.
16. PROVIDE PRECAST TRENCH DRAIN & CATCH BASIN AS SPECIFIED. INSTALL AS RECOMMENDED BY THE MANUFACTURER. ACTUAL CONSTRUCTION AND INSTALLATION MAY REQUIRE SOME FIELD MODIFICATIONS. ANY DEVIATION FROM THE DRAWINGS AND SPECIFICATIONS SHALL HAVE PRIOR APPROVAL FROM THE ARCHITECT OR BUILDING INSPECTOR.



FOUNDATION DETAILS

MISSOURI DEPARTMENT
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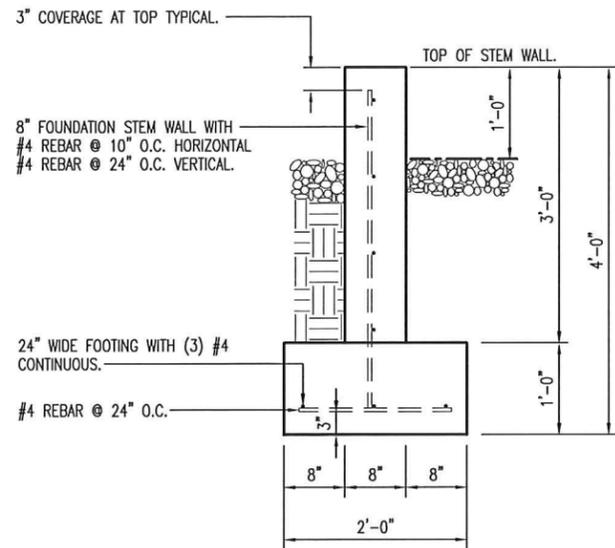
Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

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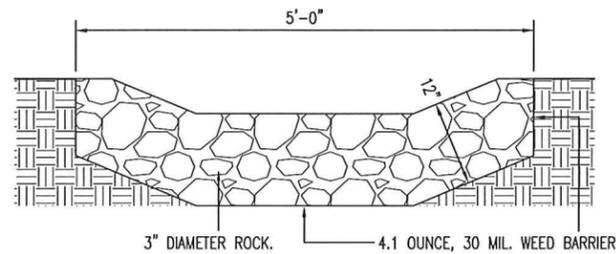
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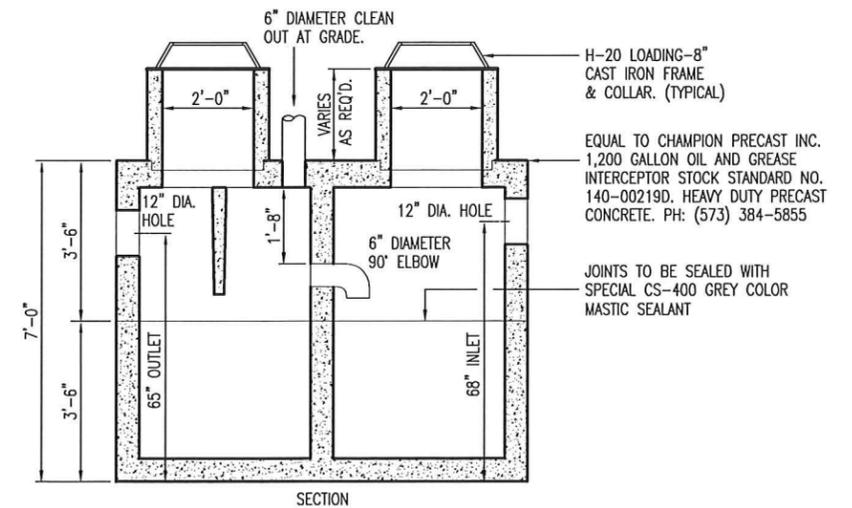
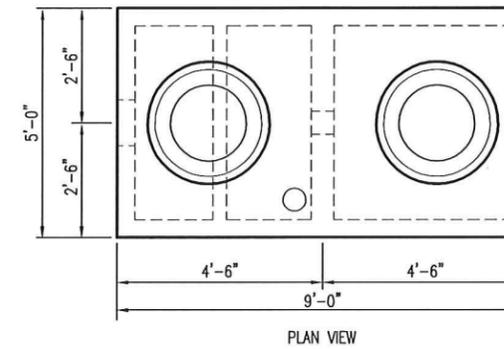
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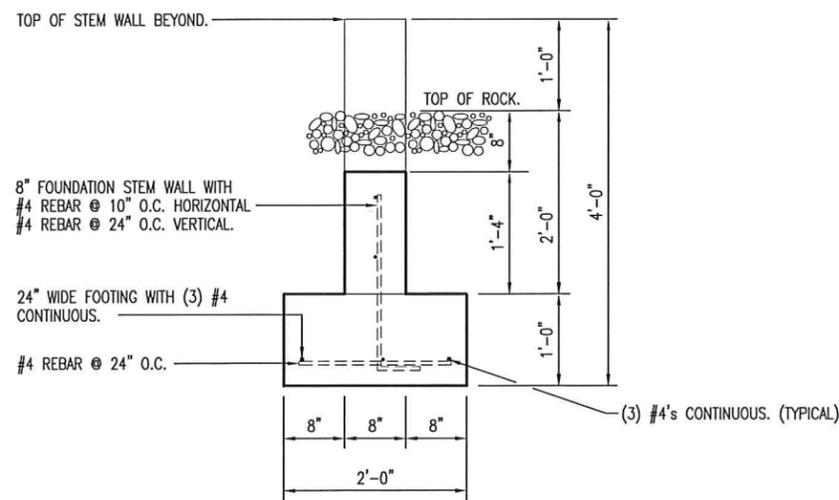
B STEM WALL
SCALE: 1/2" = 1'-0"



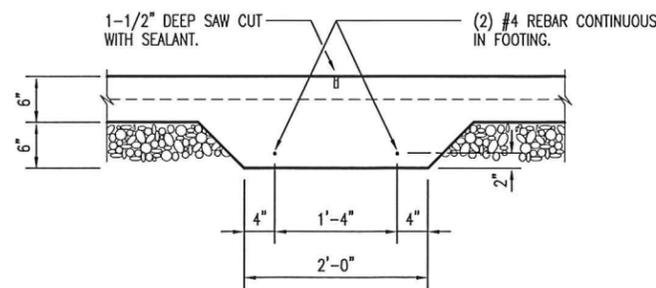
E RIP - RAP SECTION
SCALE: 1/2" = 1'-0"



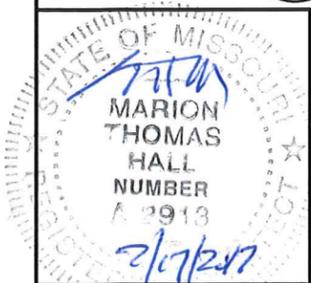
D 1,200 GALLON OIL SEPARATOR
SCALE: 1/4" = 1'-0"



A COLD STORAGE THRESHOLD EXTERIOR STEM WALL
SCALE: 1/2" = 1'-0"



C INTERIOR BEARING FOOTING
SCALE: 1/2" = 1'-0"



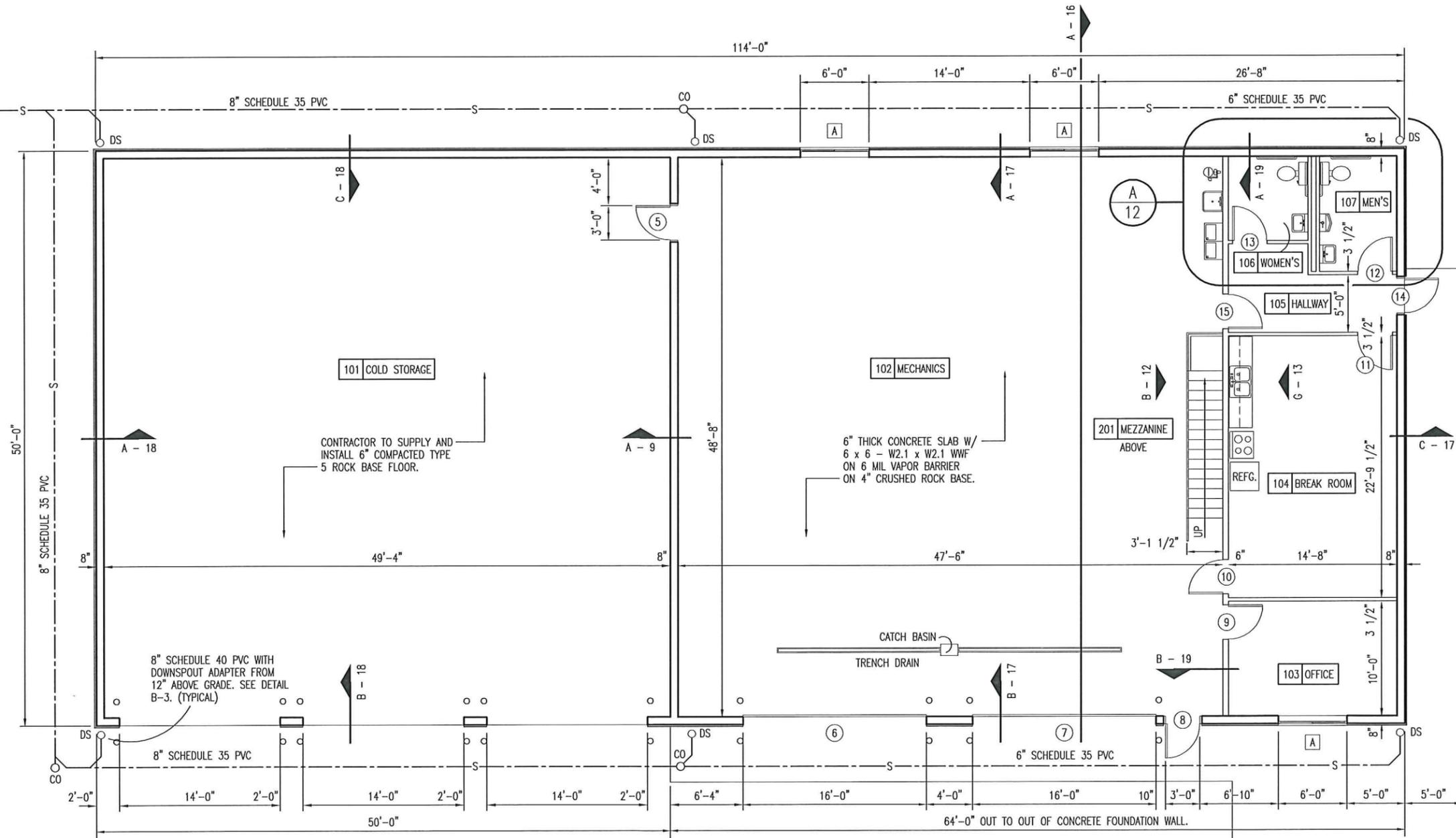
FOUNDATION DETAILS

MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

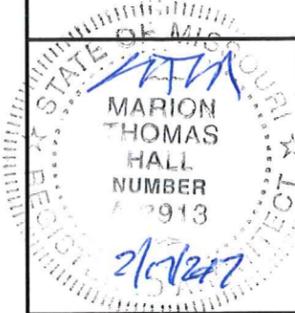
Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

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DATE: 12-16-16
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12" SCHEDULE 35 PVC
SEE SITE PLAN. CONTRACTOR TO PROVIDE 20'-0" LONG x 5'-0" x 12" DEEP RIP-RAP.



A
7 FLOOR PLAN
SCALE: 3/32" = 1'-0"



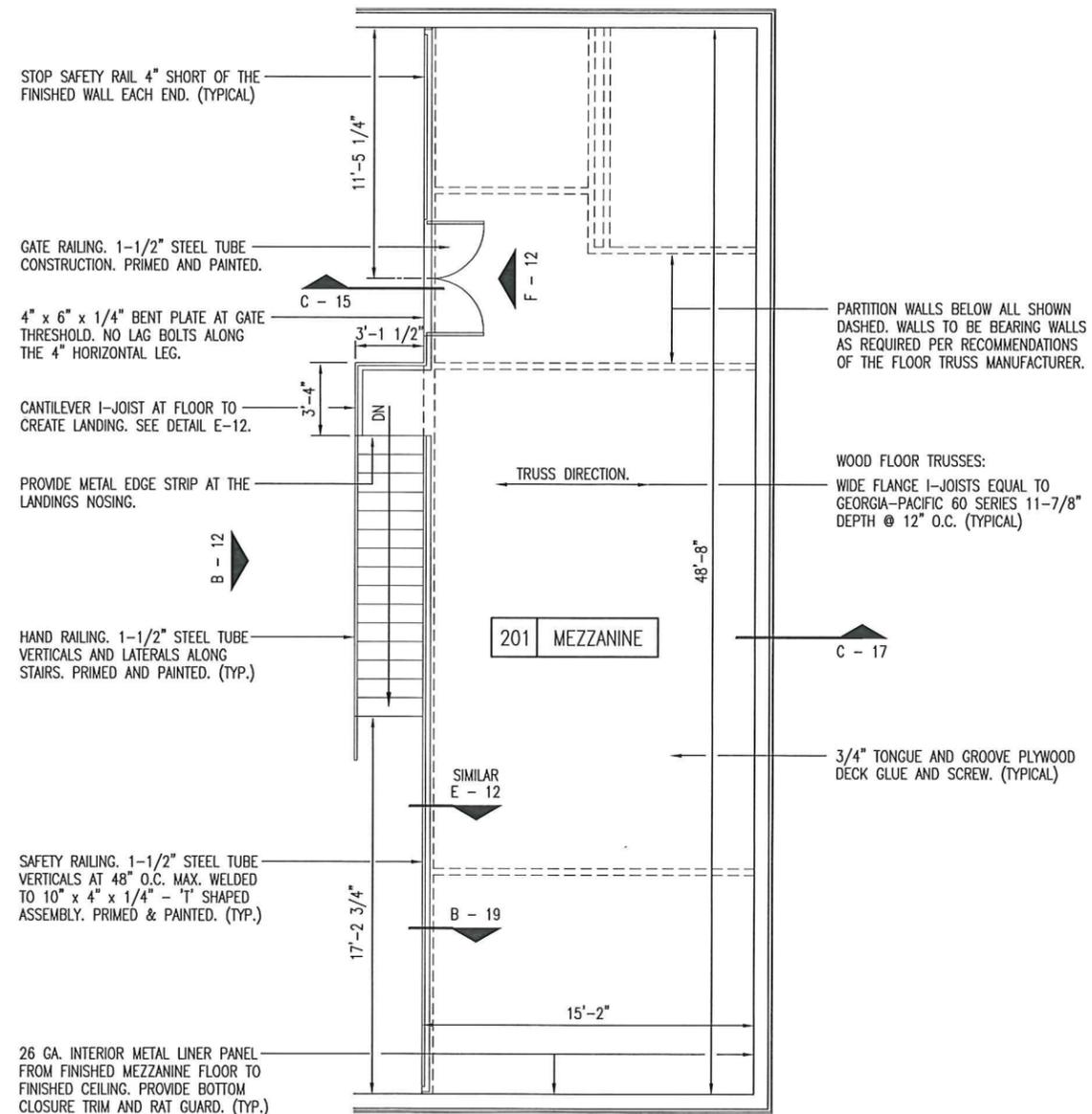
FLOOR PLAN

MISSOURI DEPARTMENT
OF TRANSPORTATION
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Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

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DATE: 2-16-17

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A
8
MEZZANINE PLAN
SCALE: 1/8" = 1'-0"



STATE OF MISSOURI
MARION THOMAS HALL
NUMBER
A 2913
2/17/17

MEZZANINE PLAN

MISSOURI DEPARTMENT
OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

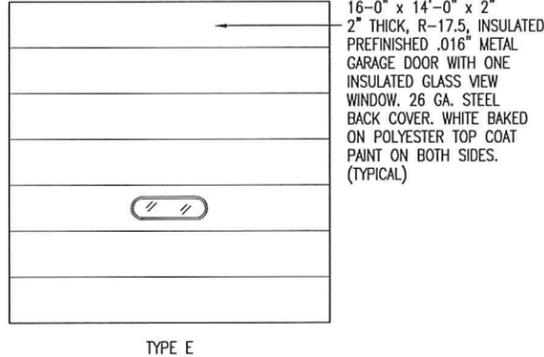
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Southeast District - Dent County
409 Route A, 63629

DESIGN BY: LARRY CARVER
DATE: 12-16-16

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DOOR SCHEDULE

NO.	SIZE	SWING	DR. TYPE	FRM. TYPE	DETAIL	DEPTH	HDWR. GRP.
1	NOT USED	-	-	-	-	-	-
2	NOT USED	-	-	-	-	-	-
3	NOT USED	-	-	-	-	-	-
4	NOT USED	-	-	-	-	-	-
5	3'-0" x 7'-0" x 1-3/4"	LHR	D	I	D-14	6-1/2"	
6	16'-0" x 14'-0" x 2"	-	E	-	A & B-14	-	-
7	16'-0" x 14'-0" x 2"	-	E	-	A & B-14	-	-
8	3'-0" x 7'-0" x 1-3/4"	LHR	D	I	C-14	6-1/2"	1
9	3'-0" x 7'-0" x 1-3/4"	LH	C	I	A-15	7-5/8"	3
10	3'-0" x 7'-0" x 1-3/4"	RHR	C	I	A-15	7-5/8"	4
11	3'-0" x 7'-0" x 1-3/4"	LH	C	I	B-15	5-3/4"	4
12	3'-0" x 7'-0" x 1-3/4"	RH	A	I	E-14	5-3/4"	2
13	3'-0" x 7'-0" x 1-3/4"	LH	A	I	E-14	5-3/4"	2
14	3'-0" x 7'-0" x 1-3/4"	RHR	D	I	C-14	6-1/2"	1
15	3'-0" x 7'-0" x 1-3/4"	LHR	C	I	A-15	7-5/8"	5



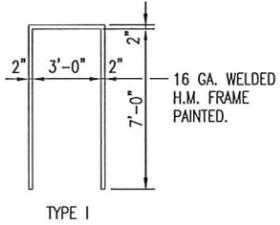
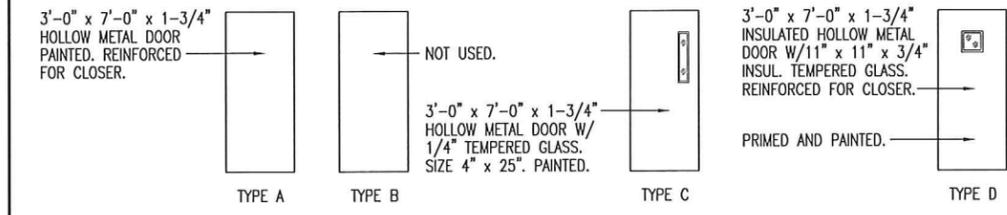
TYPE E

WINDOW SCHEDULE

SYM.	UNIT	MANUFACTURER	BTU OUTPUT	FUEL	VOLTAGE	REMARKS
A	6'-0" x 3'-0" ALUMINUM DOUBLE HORIZONTAL SLIDER WITH SECURITY SCREEN.	SEE DETAIL F-14.			48" A.F.F.	SILL HEIGHT: 48" A.F.F.

GENERAL NOTES:

CONTRACTOR TO FURNISH ALL NECESSARY FLASHING AND TRIM TO PROVIDE A NEAT, WEATHERPROOF FIT AT ALL DOORS, COLUMNS AND ANY LOCATION WHERE THE METAL PANELS MAY BE CUT.

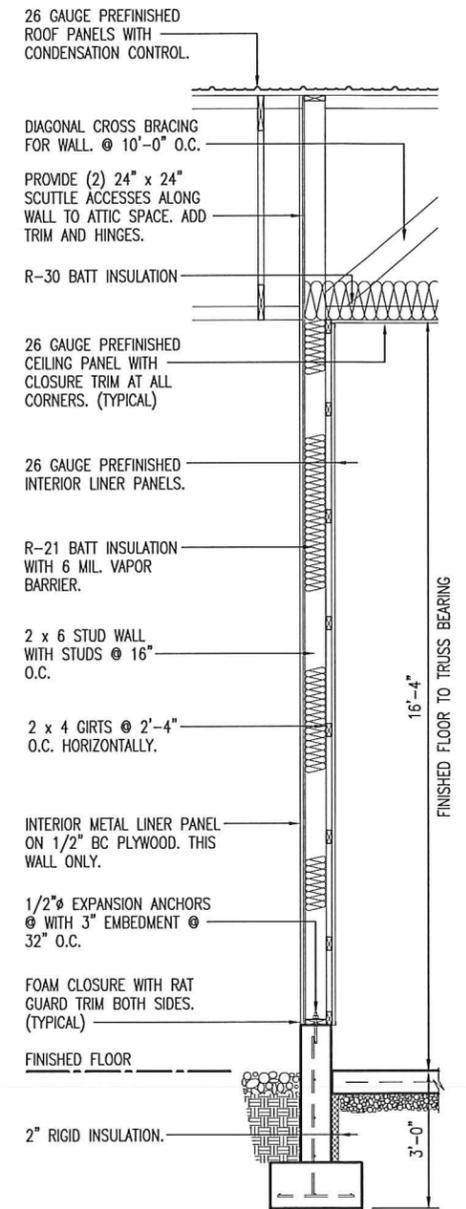


FINISH SCHEDULE

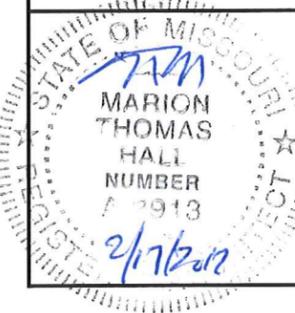
NO.	ROOM	FLOOR		WALLS				BASE		CEILING				
		3/4" T & G PLYWOOD, CURE AND SEALER ON CONCRETE	6" COMPACTED TYPE 5 ROCK.	26 GA. EXTERIOR PANELS.	26 GA. INTERIOR PANELS	1/2 FIBERGLASS REINFORCED PANEL (FRP) ON NORTH WALL.	5/8" GYPSUM BOARD.	5/8" GREEN GYP. BD. PAINTED.	4" VINYL.	4" VINYL CONTINUOUS ON NORTH WALL.	NONE	26 GA. CEILING PANELS.	NONE	ACOUSTICAL CEILING TILE @ 8'-0" A.F.F.
101	COLD STORAGE		●	●							●		●	
102	MECHANICS	●			●	●			●		●			
103	OFFICE	●					●	●	●				●	
104	BREAK ROOM	●					●	●	●				●	
105	HALLWAY	●					●	●	●				●	
106	WOMEN'S	●					●	●	●				●	
107	MEN'S	●					●	●	●				●	
201	MEZZANINE	●			●					●	●			

HVAC SCHEDULE

SYM.	UNIT	MANUFACTURER	BTU OUTPUT	FUEL	VOLTAGE	REMARKS
A	36" x 36" SHUTTER MOUNT EXHAUST FAN WITH WEATHERHOOD	DAYTON 1HLB6 & 1WBW2 OR EQUAL 6.4 AMPS	6,480 CFM	ELECTRIC	115	COMMERCIAL TYPE BELT DRIVE WALL EXHAUST FAN INCLUDING OSHA GUARD AND SHUTTER.
B	MOTORIZED DAMPER WITH WEATHERHOOD	DAYTON MODEL 3C728 & 1WBW1 OR EQUAL .37 AMPS	--	ELECTRIC	115	30" MEDIUM GRADE, MOTORIZED, GALVANIZED STEEL DAMPER WITH 1HP MOTOR. WIRE TO OPEN WHEN EXHAUST FAN IS TURNED ON.
C	CARBON MONOXIDE EXHAUST SYSTEM	CAR-MON MODELS TSR-S32, 6" REEL, CMW-9 OR EQUAL	--	ELECTRIC	115	INCLUDES HOSE, DIRECT DRIVE FLANGE MOUNTED EXHAUST FAN, DUCTING, EXTERIOR WALL HOOD, 3/4 HP MOTOR, 13.8 AMP.
D	MULTI-ZONE DUCTLESS HEAT PUMP	CARRIER 38VMA036HDS3-1 OR EQUAL.	COOL 36K HEAT 40K	ELECTRIC	208/230	SEE MECHANICAL PLAN HEX NOTE "D".
E	GAS FIRED UNIT HEATER	REZNOR MODEL UDAP 225, 2-STAGE OR EQUAL	186,750	PROPANE	115	SINGLE BURNER COMBUSTION, DIRECT SPARK IGNITION, 100% LOCK-OUT & CL-22 STANDARD HEATING ONLY THERMOSTAT.



A MID-WALL SECTION
9 SCALE: 1/4" = 1'-0"

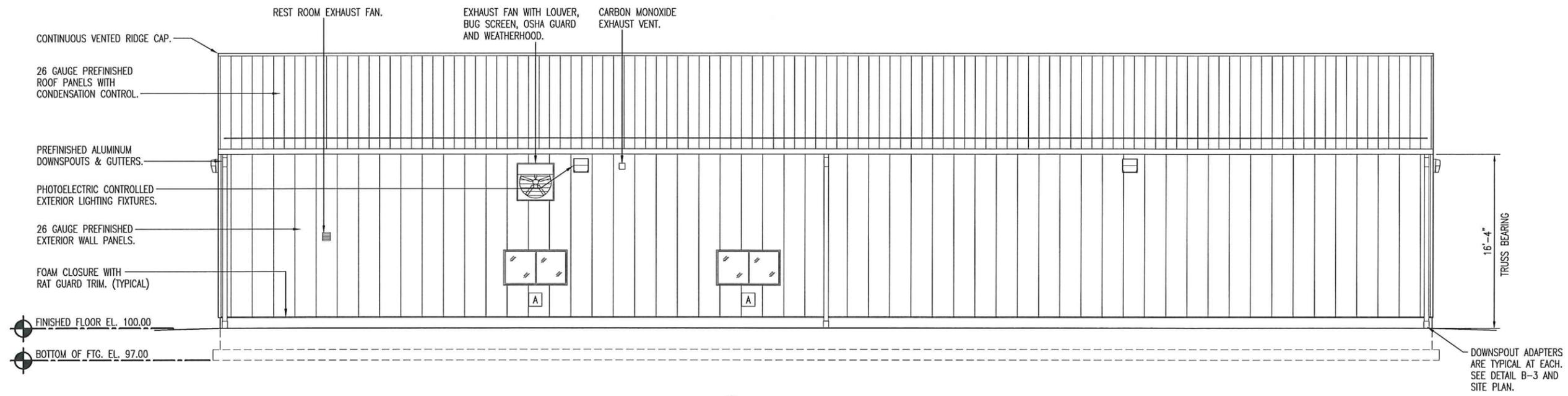


SCHEDULES

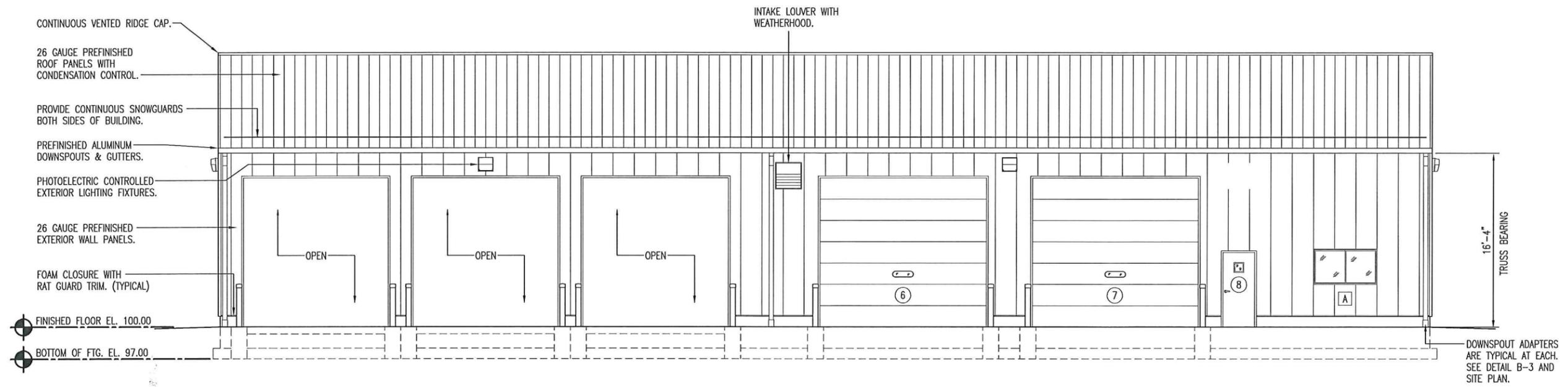
MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

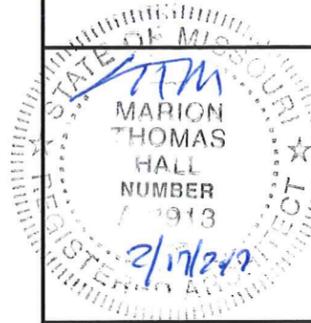
DESIGN BY: LARRY CARVER
DATE: 2-16-17
Sheet 9 of 27



B
10 **EAST ELEVATION**
SCALE: 3/32" = 1'-0"



A
10 **WEST ELEVATION**
SCALE: 3/32" = 1'-0"

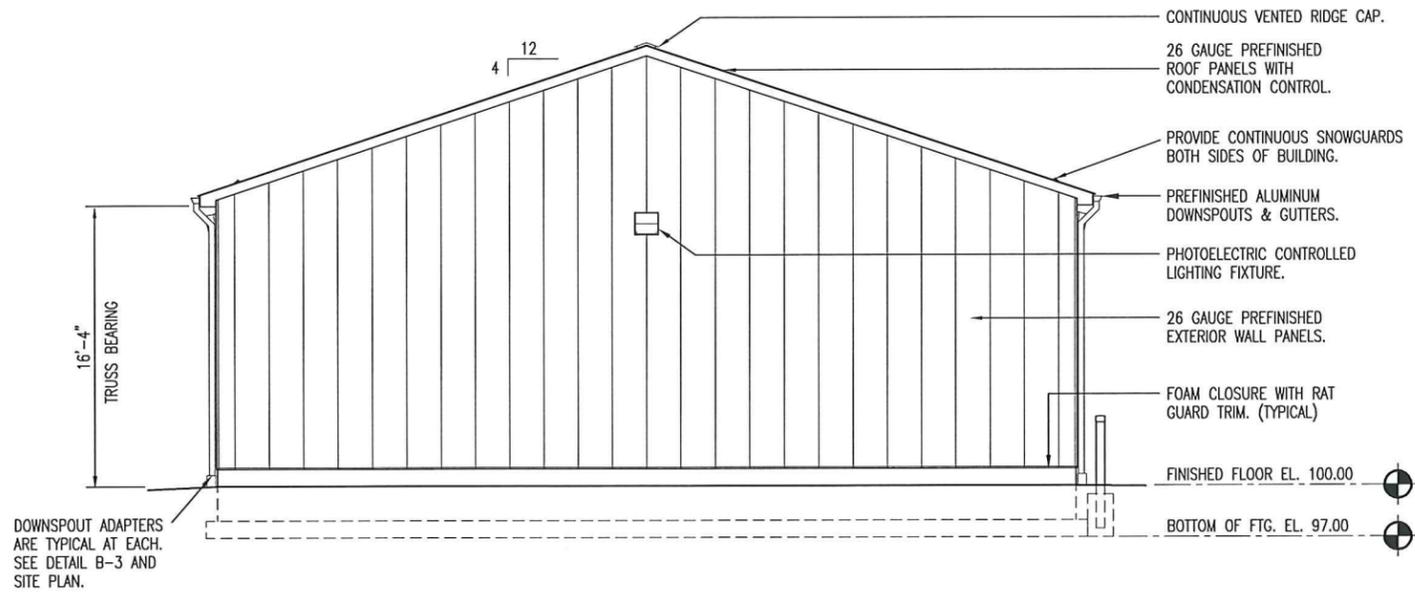


EAST & WEST ELEVATIONS

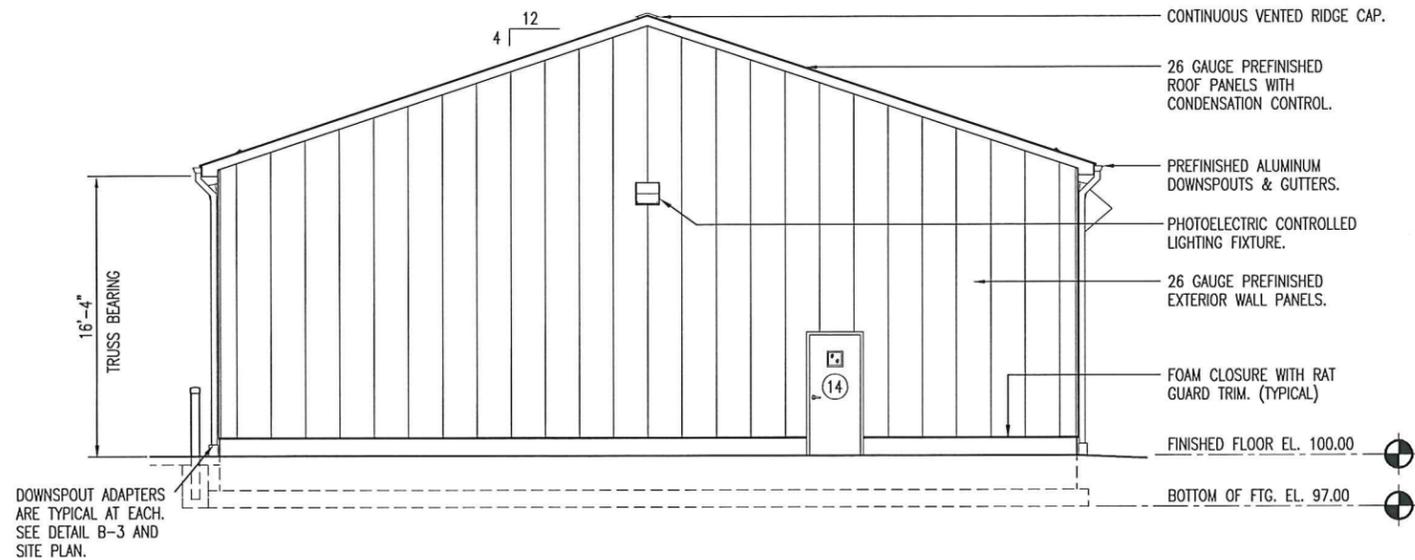
MISSOURI DEPARTMENT
OF TRANSPORTATION
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FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
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B NORTH ELEVATION
11 SCALE: 3/32" = 1'-0"



A SOUTH ELEVATION
11 SCALE: 3/32" = 1'-0"



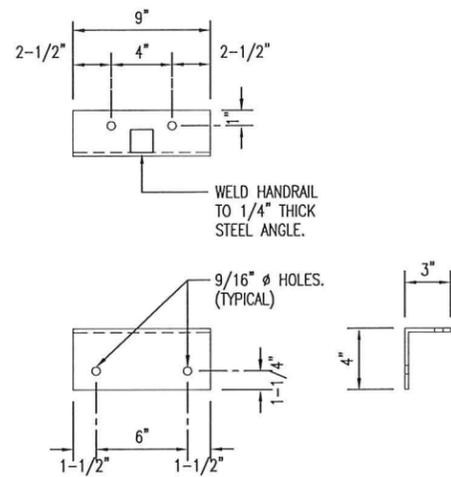
NORTH & SOUTH ELEVATIONS

MISSOURI DEPARTMENT
OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

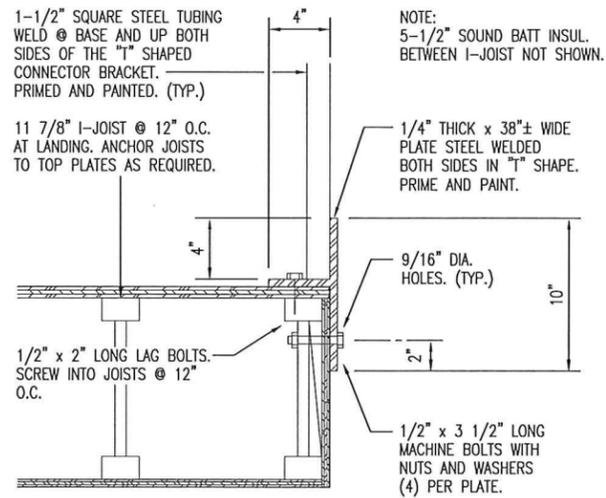
Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

DESIGN BY: LARRY CARVER
DATE: 12-16-16

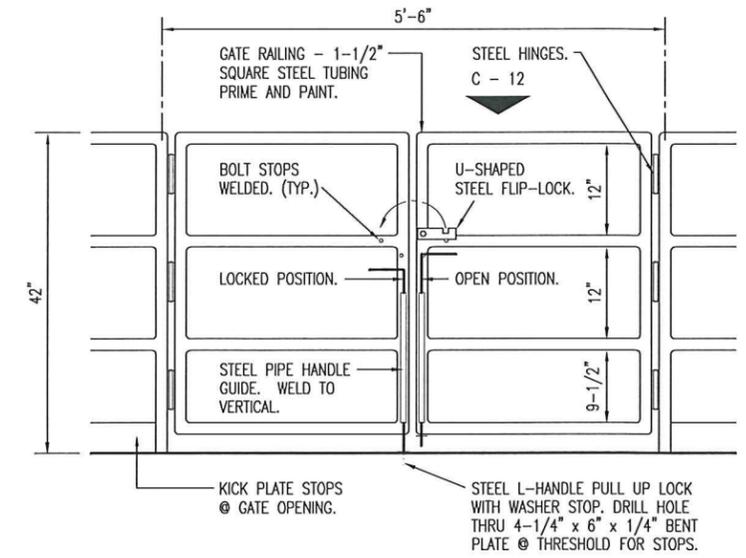
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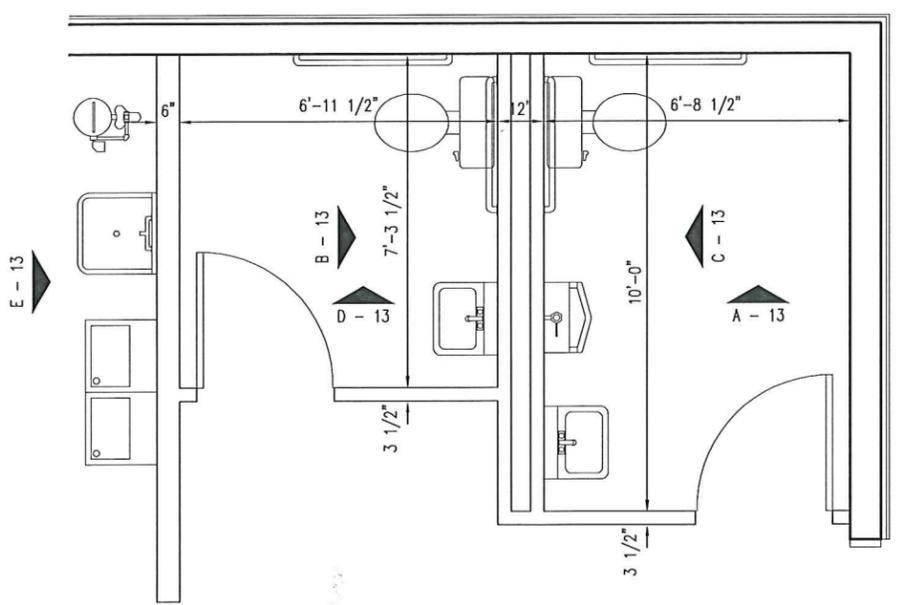
D
12
PRIMED AND PAINTED.
STAIR RAIL CONNECTION
SCALE: 1" = 1'-0"



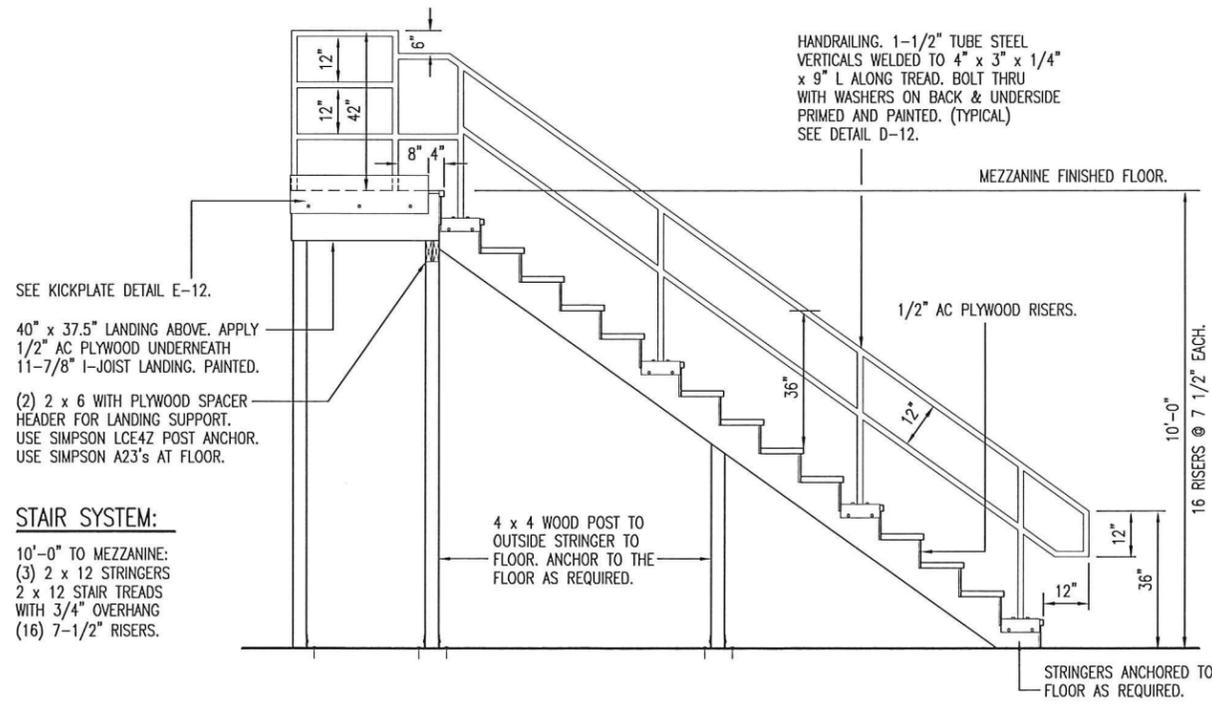
E
12
KICK PLATE DETAIL
SCALE: 1" = 1'-0"



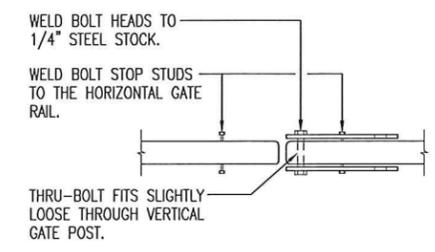
F
12
VIEW FROM MEZZANINE
SWING GATE DETAIL
SCALE: 1/2" = 1'-0"



A
12
REST ROOM
SCALE: 1/4" = 1'-0"



B
12
MEZZANINE STAIR SYSTEM
SCALE: 1/4" = 1'-0"



C
12
FLIP LOCK
SCALE: 1" = 1'-0"

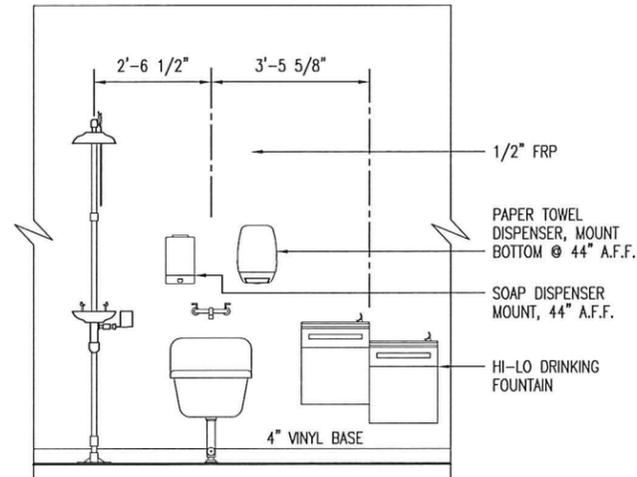
REGISTERED ARCHITECT
STATE OF MISSOURI
MARION THOMAS HALL
NUMBER A 913
2/17/12

INTERIOR ELEVATIONS

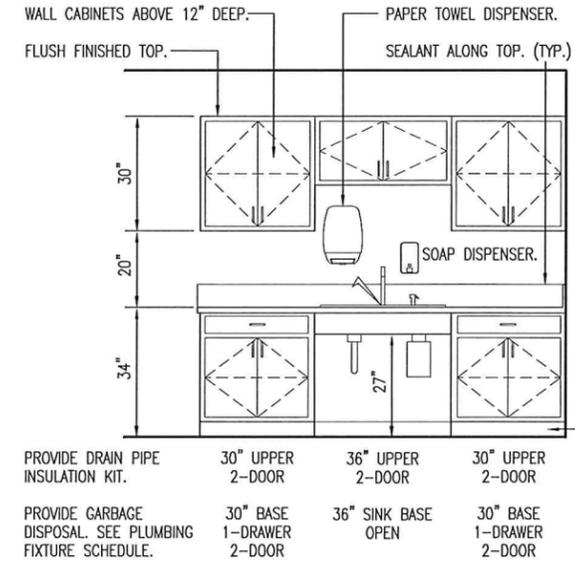
MISSOURI DEPARTMENT
OF TRANSPORTATION
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Bunker Mechanics & Cold Storage Building
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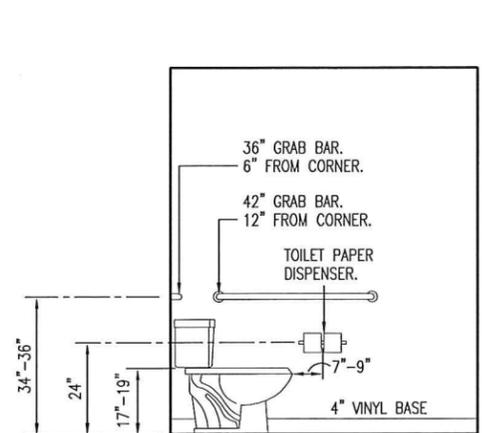


E
13
FIXTURE ELEVATION
SCALE: 1/4" = 1'-0"

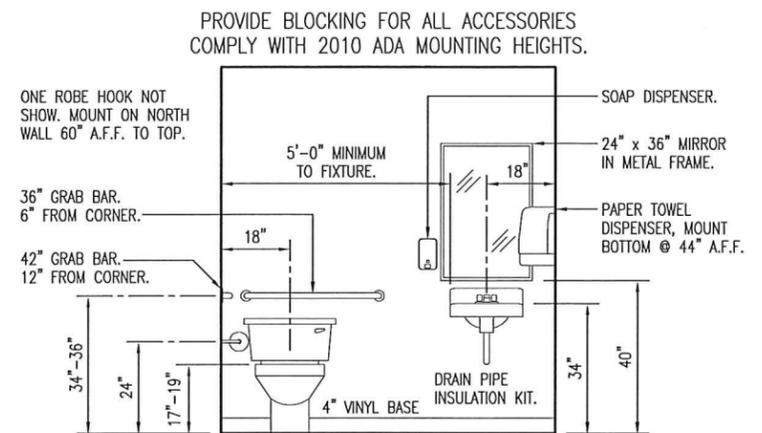


G
13
BREAK ROOM CASEWORK ELEVATION
SCALE: 1/4" = 1'-0"

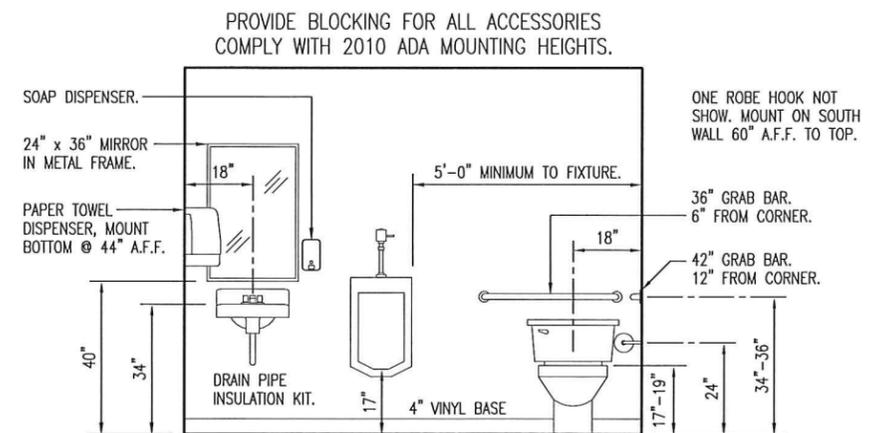
CABINET CONSTRUCTION
CABINETS - PLASTIC LAMINATE ON 3/4" HIGH DENSITY PARTICLE BOARD WITH WHITE MELAMINE INTERIORS, WIRE PULLS AND ADJUSTABLE SHELVES.
ALL DRAWERS TO HAVE METAL GLIDES, WIRE PULLS AND MELAMINE INTERIORS.
1-1/2" COUNTER TOP & 4" BACKSPASH - PLASTIC LAMINATE ON 3/4" HIGH DENSITY PARTICLEBOARD.
GENERAL CONTRACTOR TO PROVIDE MOUNTING BLOCKING AS REQUIRED BEFORE INSTALLATION OF GYPSUM BOARD.



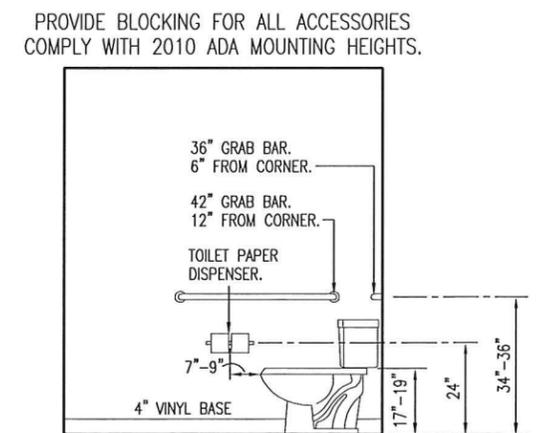
A
13
REST ROOM ELEVATION
SCALE: 1/4" = 1'-0"



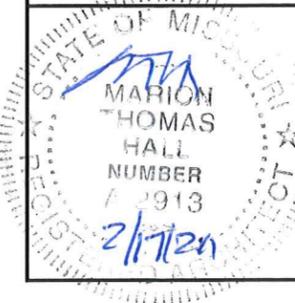
B
13
REST ROOM ELEVATION
SCALE: 1/4" = 1'-0"



C
13
REST ROOM ELEVATION
SCALE: 1/4" = 1'-0"



D
13
REST ROOM ELEVATION
SCALE: 1/4" = 1'-0"

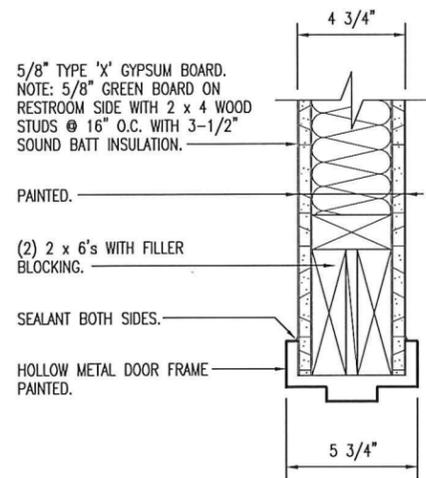


INTERIOR ELEVATIONS

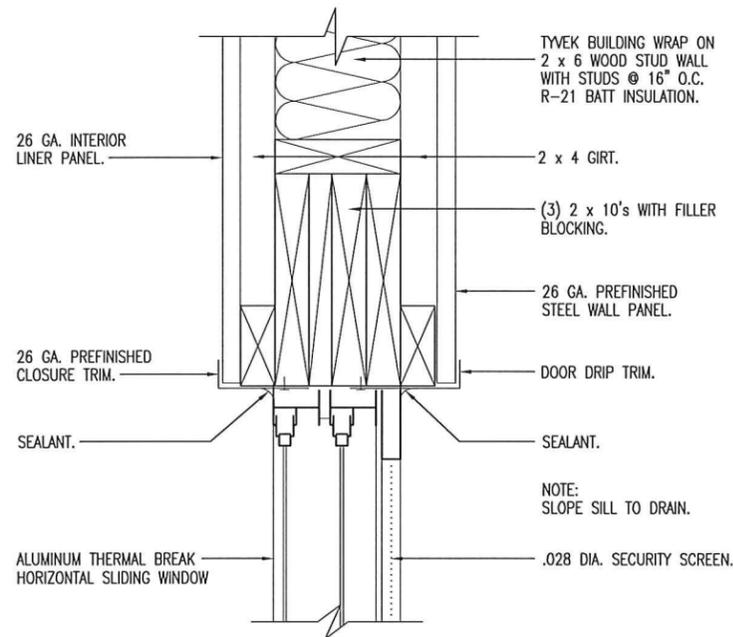
MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
409 Route A, 63629

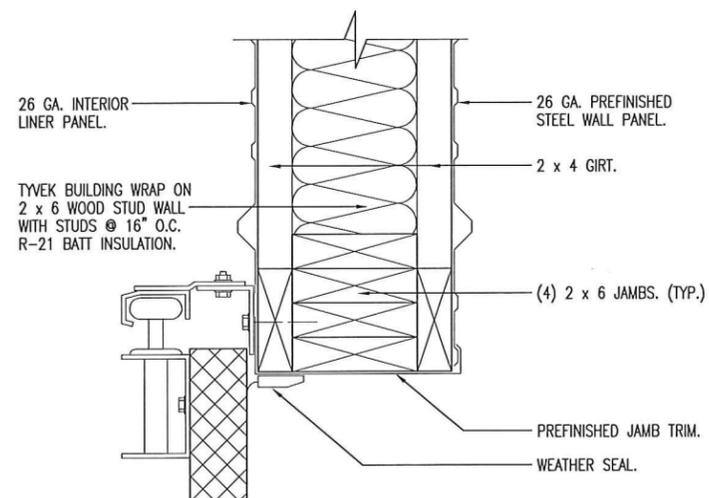
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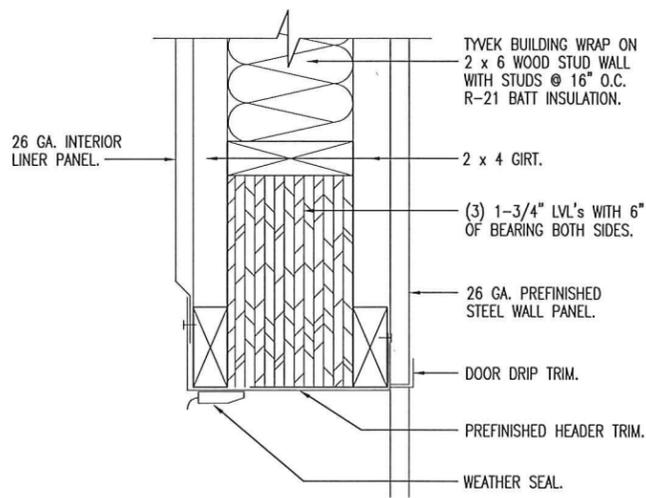
E JAMB SIMILAR
DOOR HEAD
14 SCALE: 1-1/2" = 1'-0"



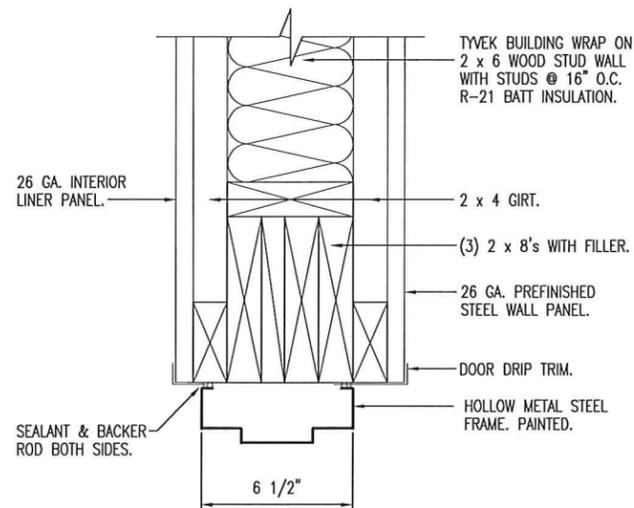
F JAMB & SILL SIMILAR
WINDOW HEAD
14 SCALE: 1-1/2" = 1'-0"



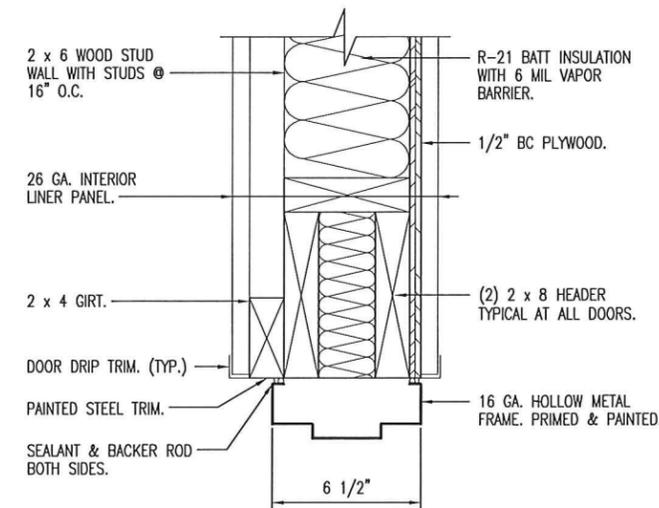
A GARAGE DOOR JAMB
14 SCALE: 1-1/2" = 1'-0"



B GARAGE DOOR HEAD
14 SCALE: 1-1/2" = 1'-0"



C DOOR HEADER/JAMB
14 SCALE: 1-1/2" = 1'-0"



D DOOR HEADER/JAMB
14 SCALE: 1-1/2" = 1'-0"

MISSOURI DEPARTMENT OF TRANSPORTATION
MARION THOMAS HALL
NUMBER 1913
2/17/2017

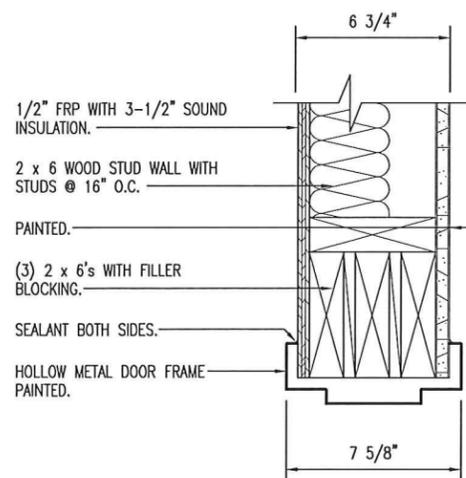
HEAD & JAMB DETAILS

MISSOURI DEPARTMENT
OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

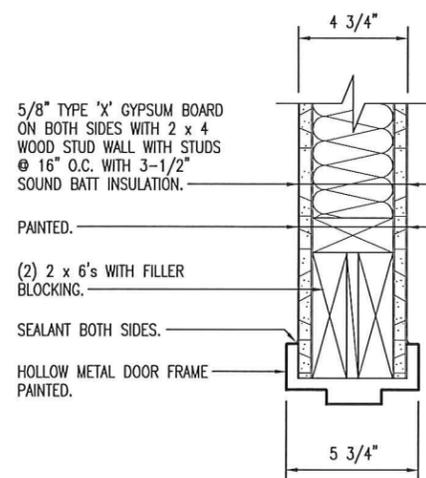
Bunker Mechanics & Cold Storage Building
Southeast District - Dent County
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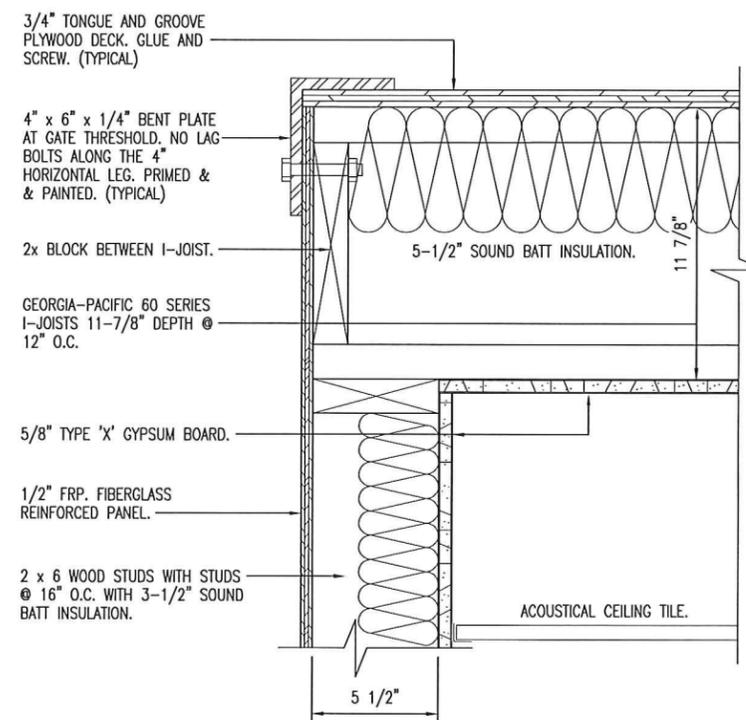
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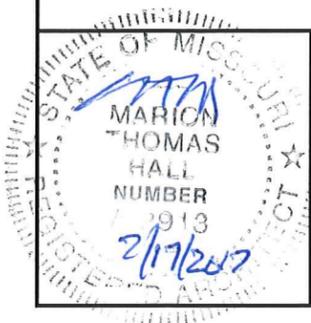
A JAMB SIMILAR DOOR HEAD
15 SCALE: 1-1/2" = 1'-0"



B JAMB SIMILAR DOOR HEAD
15 SCALE: 1-1/2" = 1'-0"



C SILL @ MEZZANINE GATE
15 SCALE: 1-1/2" = 1'-0"

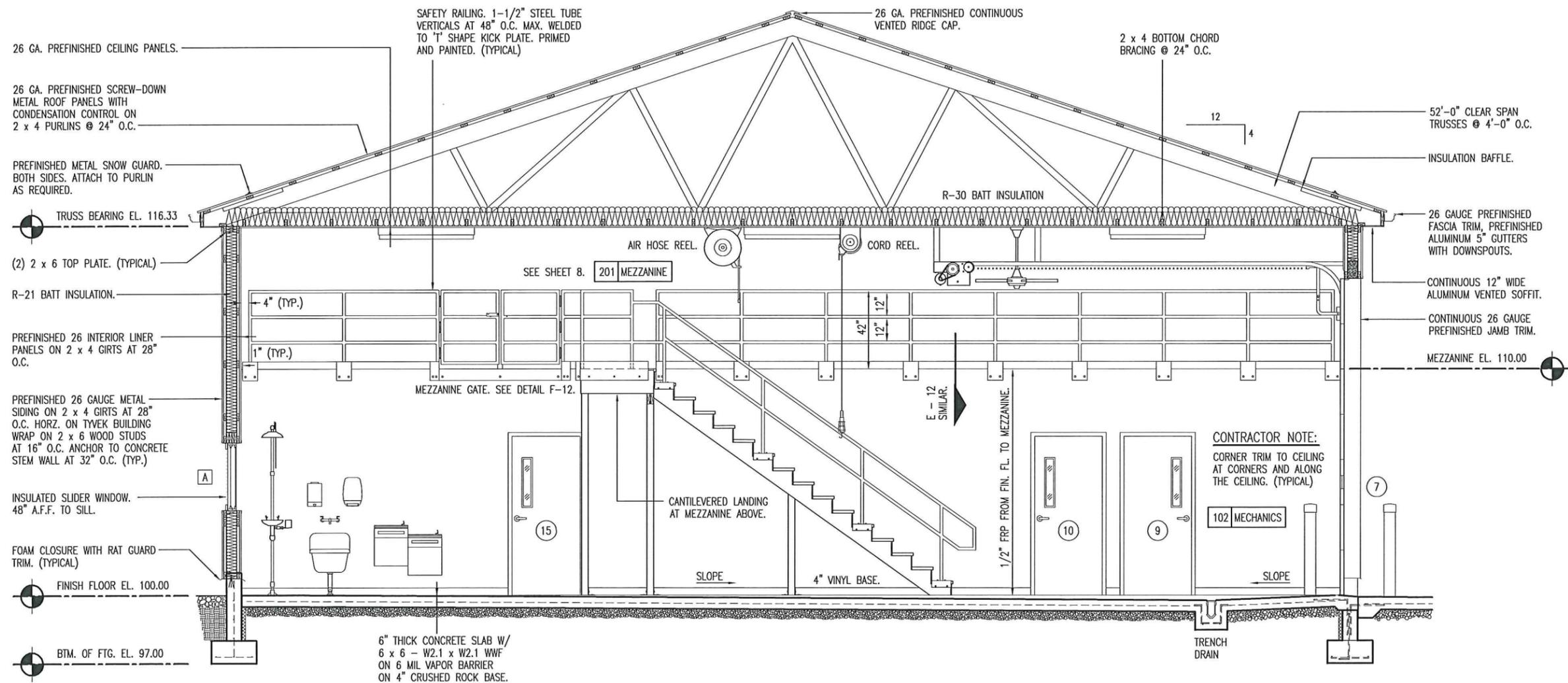


HEAD & JAMB DETAILS

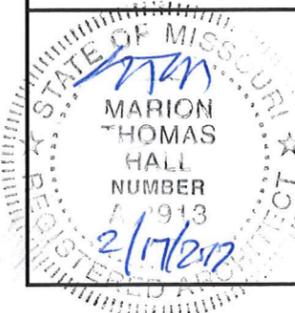
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A BUILDING SECTION
16 SCALE: 3/16" = 1'-0"

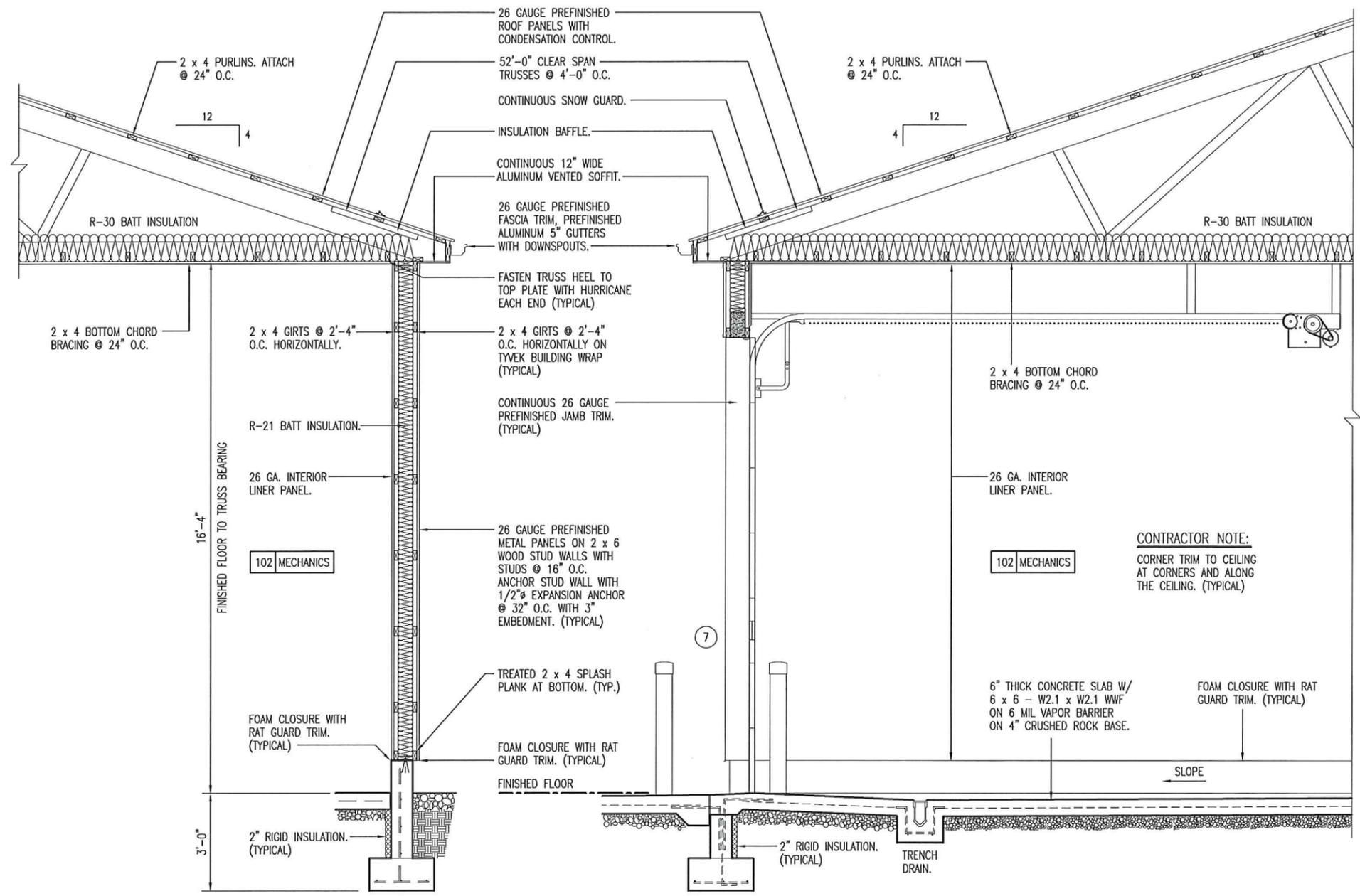


BUILDING SECTION

MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
FACILITIES MANAGEMENT

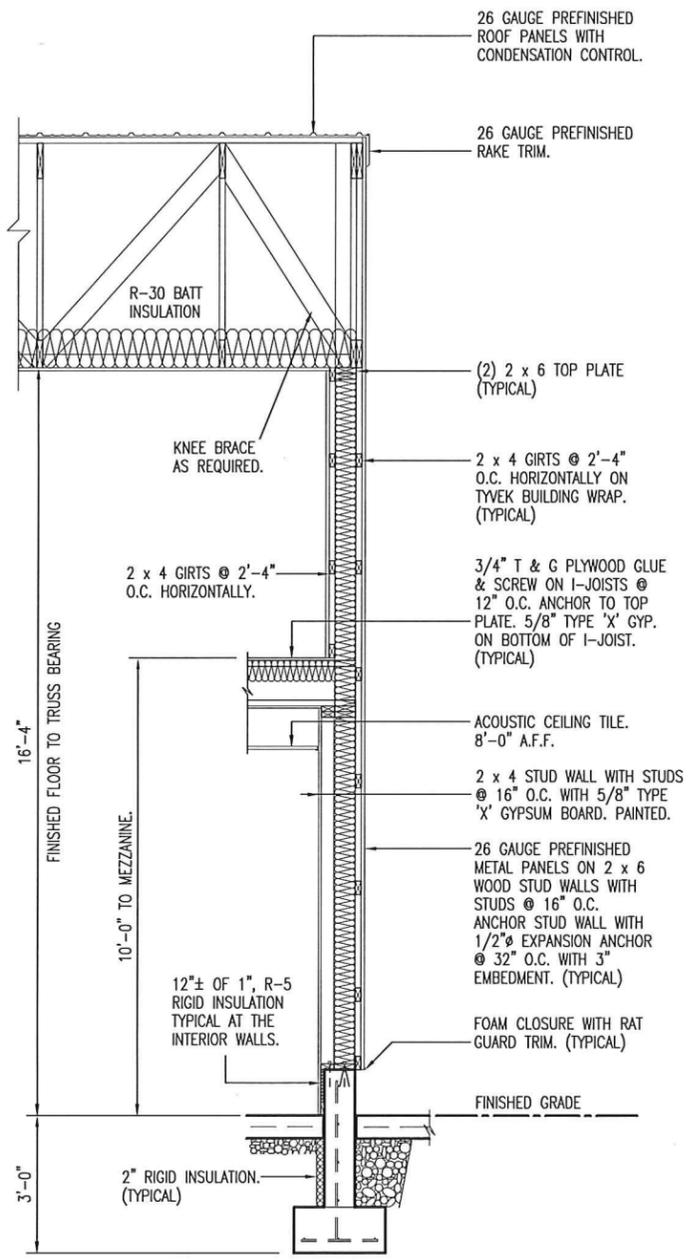
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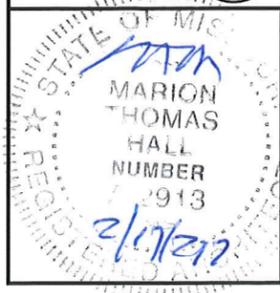


A SIDEWALL SECTION
17 SCALE: 1/4" = 1'-0"

B OVERHEAD DOOR SECTION
17 SCALE: 1/4" = 1'-0"



C ENDWALL SECTION
17 SCALE: 1/4" = 1'-0"

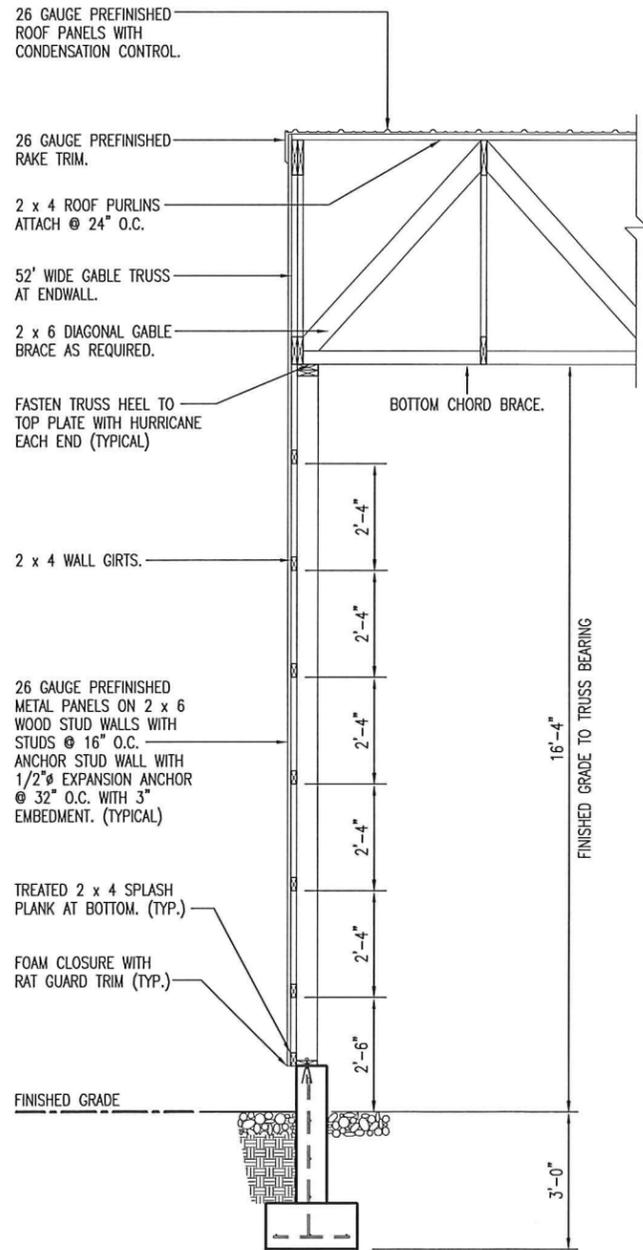


WALL SECTIONS

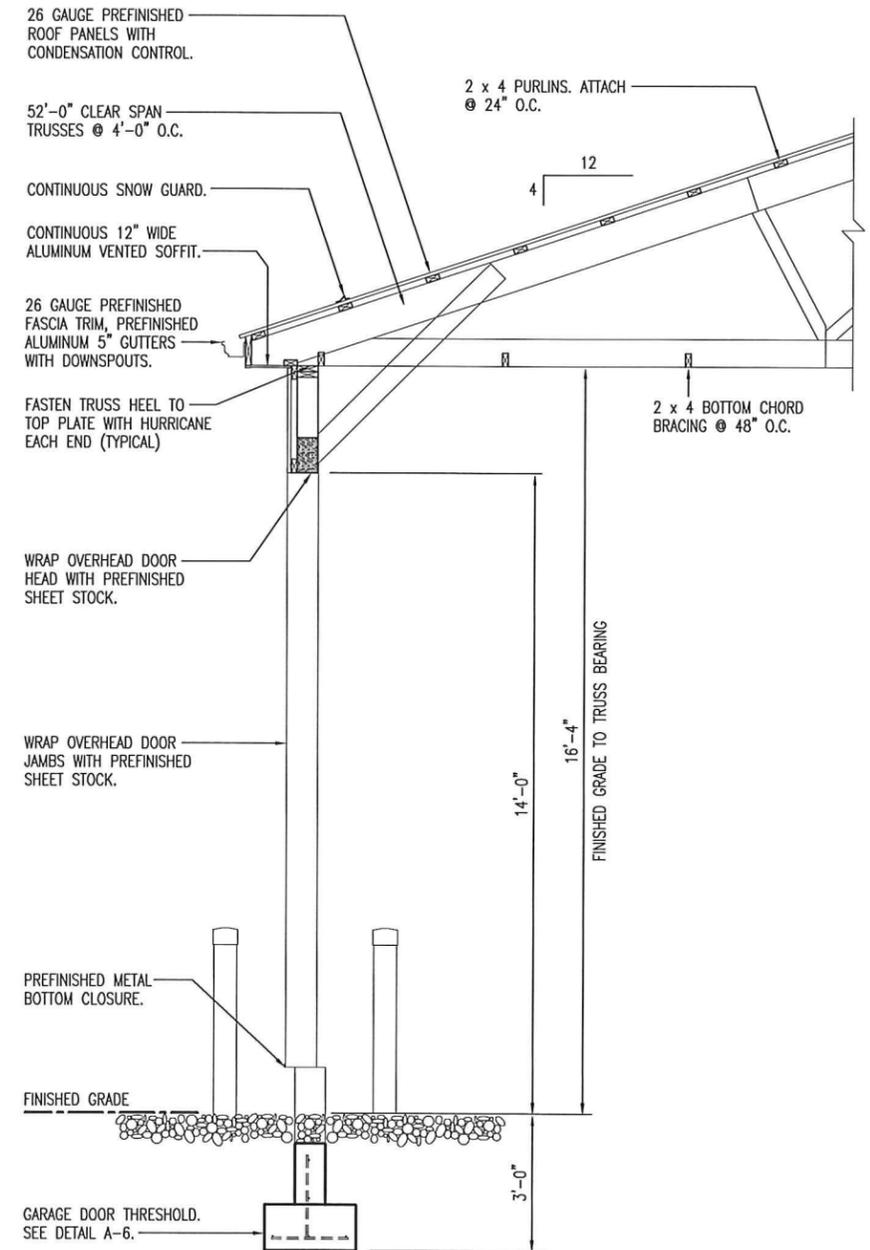
MISSOURI DEPARTMENT OF TRANSPORTATION
DIVISION OF GENERAL SERVICES
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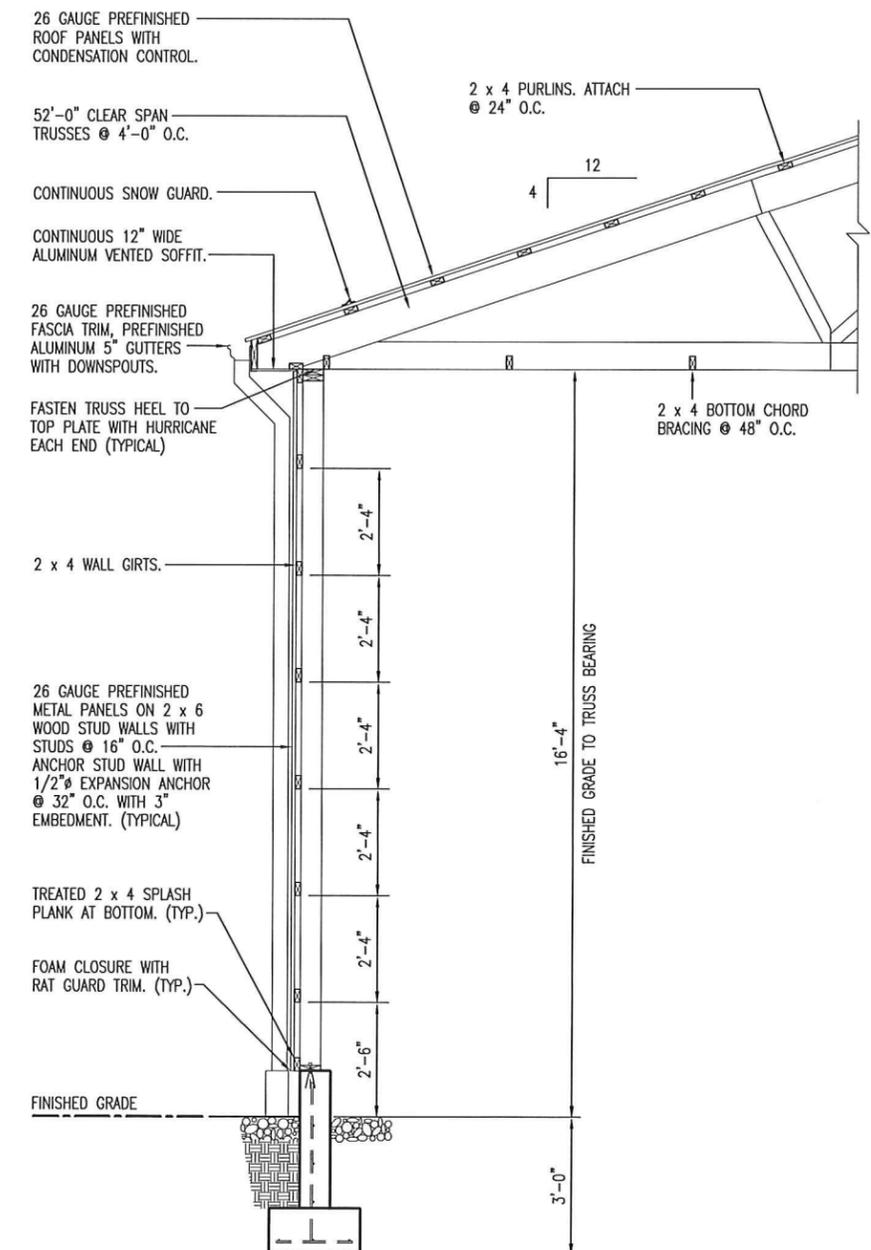
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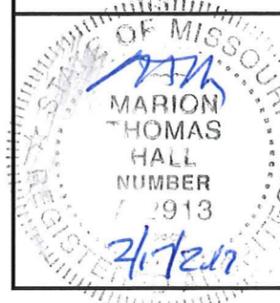
A ENDWALL SECTION
18 SCALE: 1/4" = 1'-0"



B OVERHEAD DOOR SECTION
18 SCALE: 1/4" = 1'-0"



C SIDEWALL SECTION
18 SCALE: 1/4" = 1'-0"

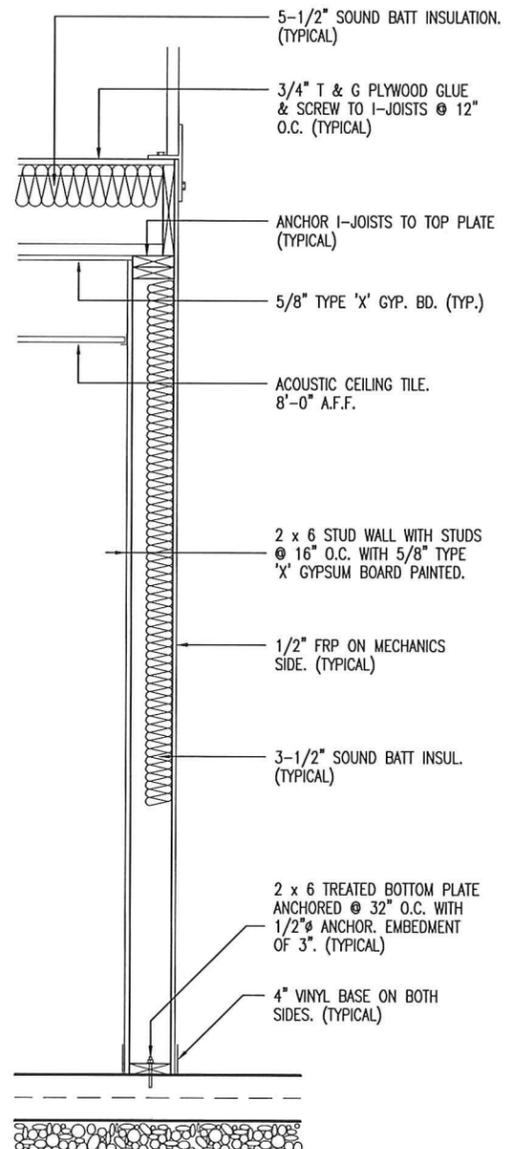
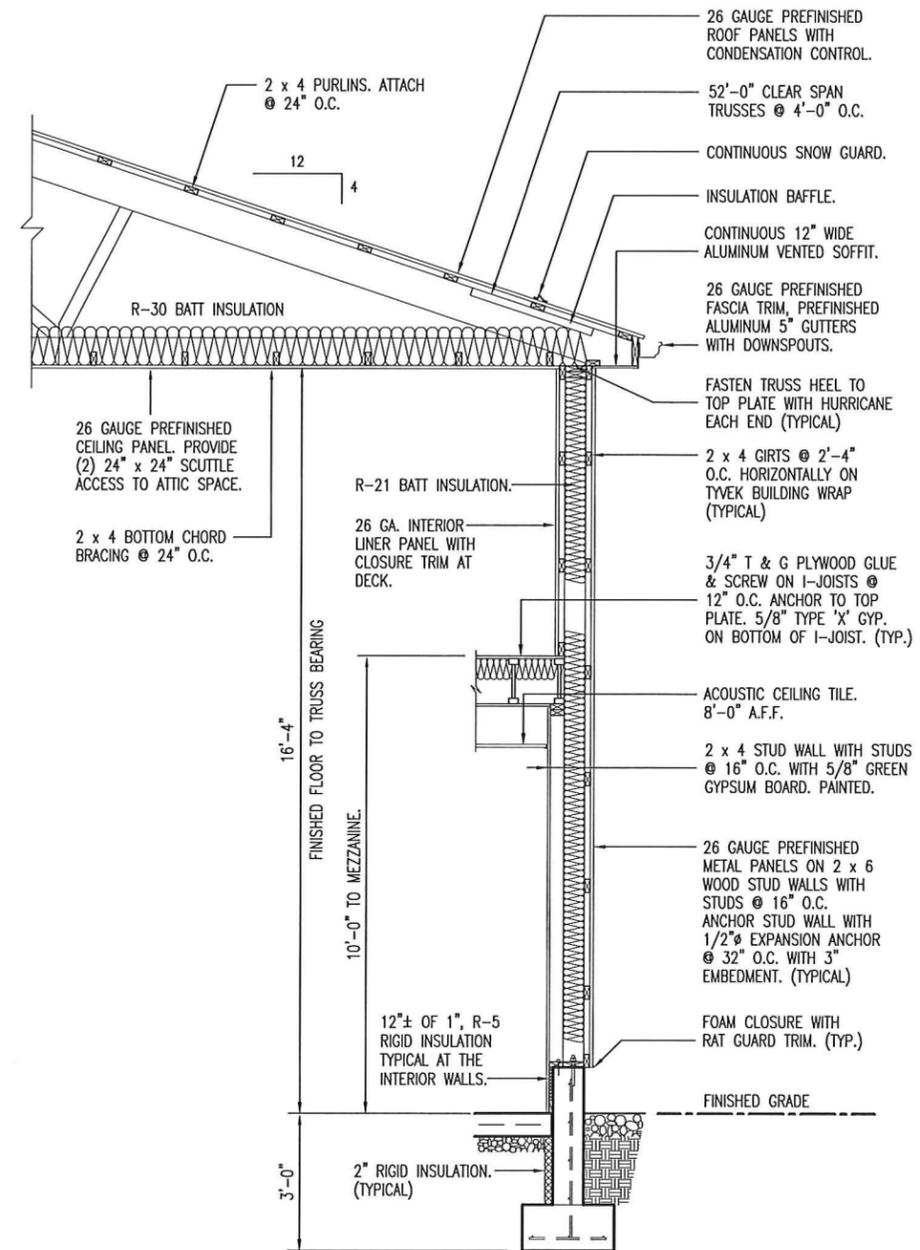


WALL SECTIONS

MISSOURI DEPARTMENT
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Bunker Mechanics & Cold Storage Building
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18 of 27



A SIDEWALL SECTION
19 SCALE: 1/4" = 1'-0"

B WALL SECTION
19 SCALE: 1/2" = 1'-0"

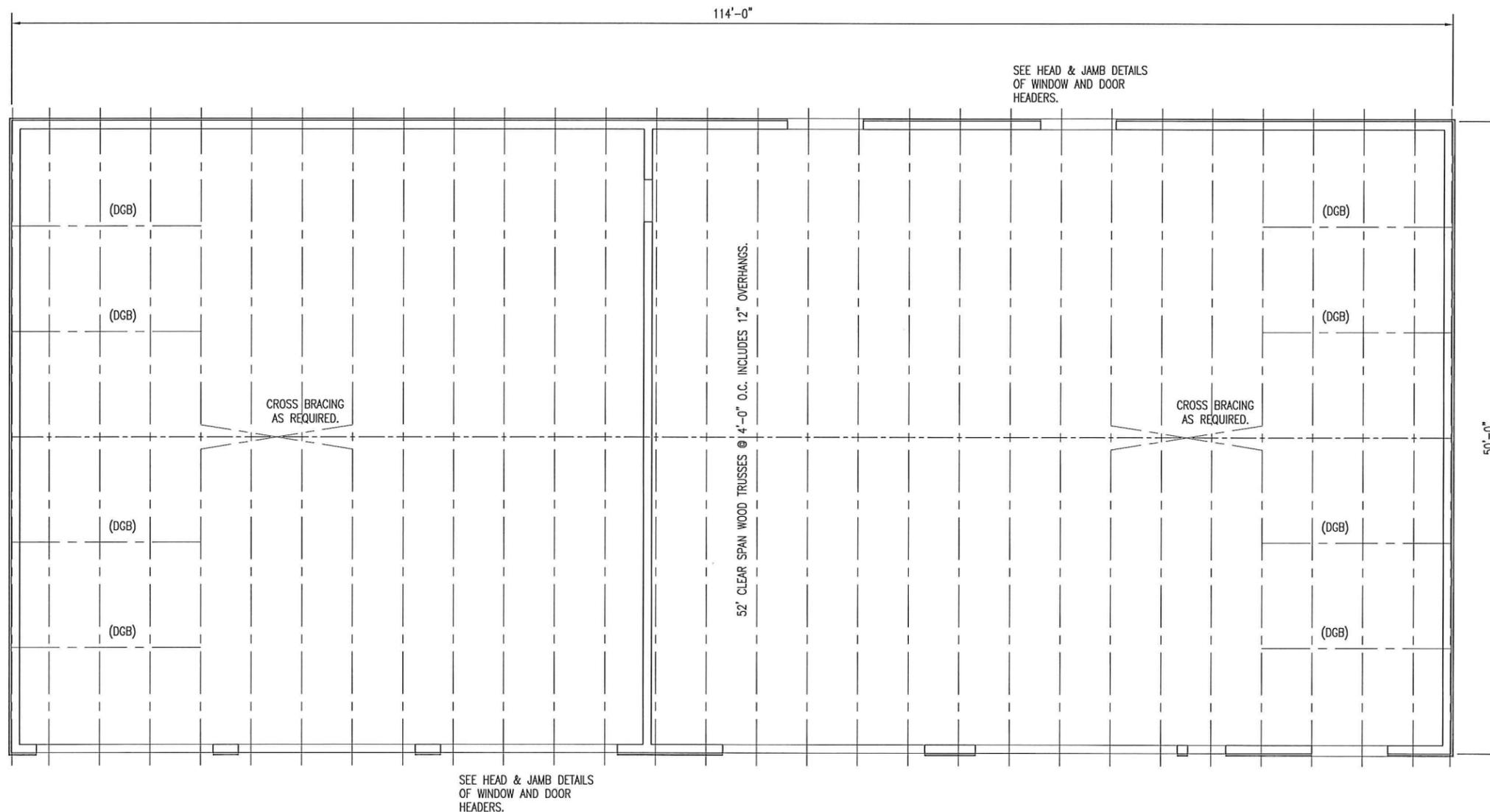


WALL SECTIONS

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Bunker Mechanics & Cold Storage Building
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(DGB) DIAGONAL GABLE BRACING AS REQUIRED.

(DGB)

(DGB)

CROSS BRACING AS REQUIRED.

(DGB)

(DGB)

52' CLEAR SPAN WOOD TRUSSES @ 4'-0" O.C. INCLUDES 12" OVERHANGS.

CROSS BRACING AS REQUIRED.

(DGB)

(DGB)

(DGB)

(DGB)

50'-0"

114'-0"

SEE HEAD & JAMB DETAILS OF WINDOW AND DOOR HEADERS.

SEE HEAD & JAMB DETAILS OF WINDOW AND DOOR HEADERS.

A
20 ROOF FRAMING PLAN
SCALE: 3/32" = 1'-0"



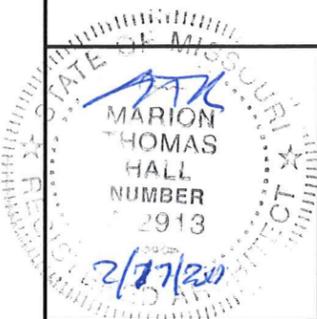
ROOF FRAMING NOTES

DESIGN LOADING FOR ROOF TRUSSES SHALL MEET THE FOLLOWING CRITERIA:

ROOF LIVE LOAD	25 PSF
ROOF DEAD LOAD	4 PSF
BOTTOM CORD DEAD LOAD	5 PSF
EARTHQUAKE	ZONE 1, LATEST EDITION IBC
WIND	90 MPH, EXPOSURE B
DEFLECTION	L/360
SPACING	48" O.C. MAXIMUM

TRUSS DESIGN SUBMITTALS SHALL BE SEALED AND SIGNED BY A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF MISSOURI.

ROOF TRUSSES AND RAFTERS SHALL BE ANCHORED TO THE TOP PLATE OF LOAD BEARING WALLS WITH SEISMIC AND HURRICANE ANCHORS EQUAL TO SIMPSON STRONG-TIE LUS24Z ANCHORS.



ROOF FRAMING PLAN

MISSOURI DEPARTMENT
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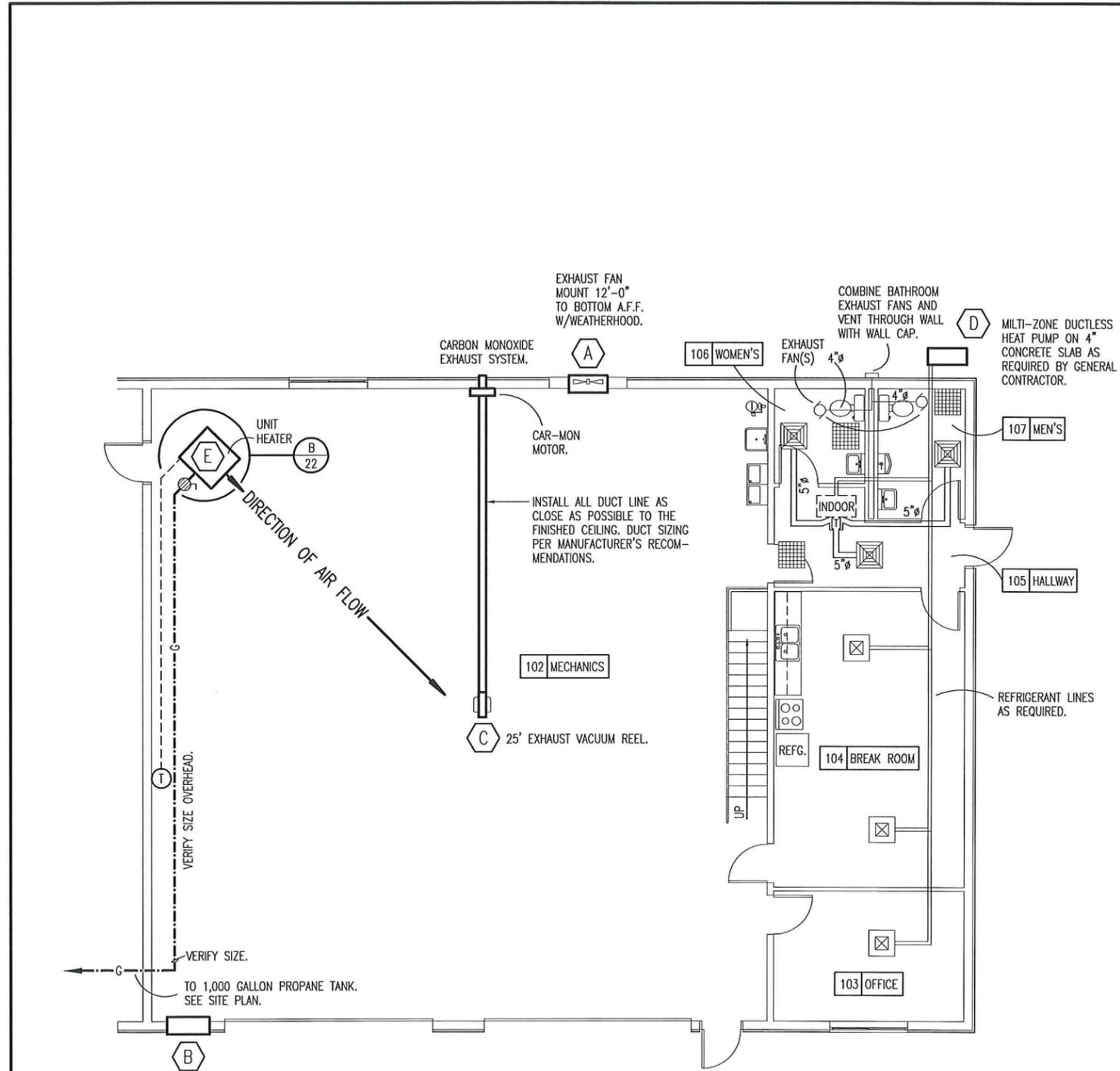
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D HVAC: MULTI-ZONE DUCTLESS HEAT PUMP - CARRIER OR EQUAL.

OUTDOOR UNIT:
 (ONE) 38VMA036HDS3-1, VFR 60 Hz R410A
 36,000 Btu/h COOL, 40,000 Btu/h HEAT.

107 MEN'S:
 (ONE) 5" Ø INSULATED SUPPLY DUCT FROM VFR INDOOR UNIT
 MOUNTED TO BOTTOM OF I-JOIST TO 24" x 24" GRILL.

106 WOMEN'S:
 (ONE) 5" Ø INSULATED SUPPLY DUCT FROM VFR INDOOR UNIT
 MOUNTED TO BOTTOM OF I-JOIST TO 24" x 24" GRILL.

105 HALLWAY:
 (ONE) HALL-RESTROOM 40VMM009---3, VFR INDOOR UNIT
 TC: 8,758 Btu/h, SC: 6,495 Btu/h, TH: 9,731 Btu/h
 (ONE) WIRED 40WA9000022 THERMOSTAT.
 DRAIN AS REQUIRED TO NEAREST VENT STACK.
 TRUNK DUCT SIZE [T]: 5" x 12" FROM INDOOR UNIT.
 ADD DIVERTERS FOR EQUAL STATIC PRESSURE INTO
 INSULATED DUCT(S) TO SUPPLY GRILL(S).

104 BREAK ROOM:
 (TWO) 40VMC009---3 CASSETTE
 TC: 8,758 Btu/h, SC: 6,495 Btu/h, TH: 9,731 Btu/h
 (ONE) WIRED 40WA9000022 THERMOSTAT.

103 OFFICE:
 (ONE) 40VMC007---3 CASSETTE
 TC: 6,812 Btu/h, SC: 5,052 Btu/h, TH: 7,785 Btu/h
 (ONE) WIRED 40WA9000022 THERMOSTAT.

PROVIDE 40VM900031 Y-JOINTS AS REQUIRED.

PLENUM RETURN

24" x 24"
 RETURN GRILL
 HART & COOLEY
 OR EQUAL.

DUCTED SUPPLY

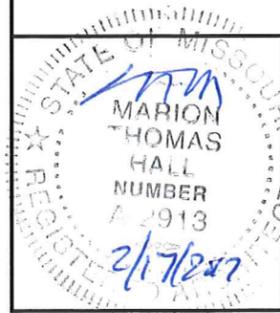
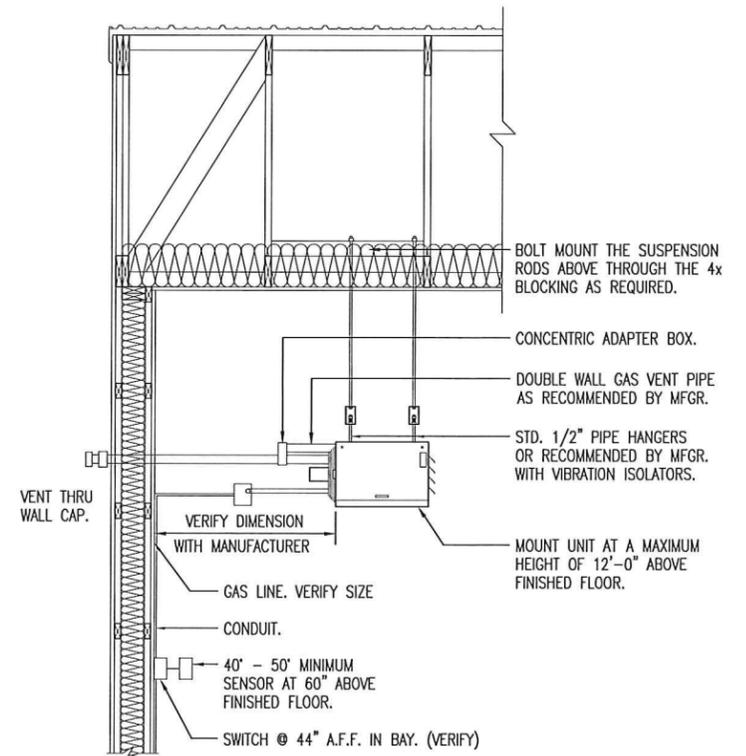
24" x 24"
 SUPPLY GRILL
 HART & COOLEY
 OR EQUAL.

REFRIGERANT LINES

24" x 24"
 SUPPLY GRILL
 CASSETTE
 OR EQUAL.

SEE SHEET 23 FOR THE
 MECHANICAL NOTES.

SEE SHEET 9 FOR HVAC
 FIXTURE SCHEDULE.

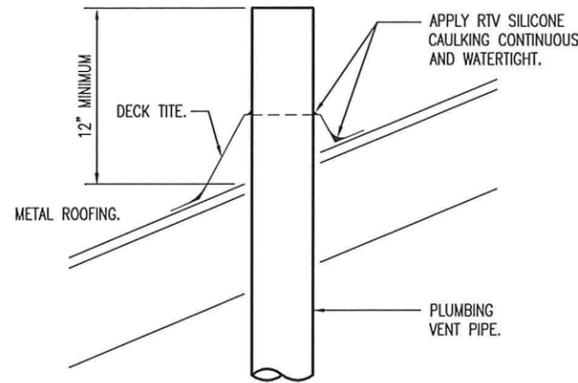


MECHANICAL PLAN

MISSOURI DEPARTMENT
 OF TRANSPORTATION
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 FACILITIES MANAGEMENT

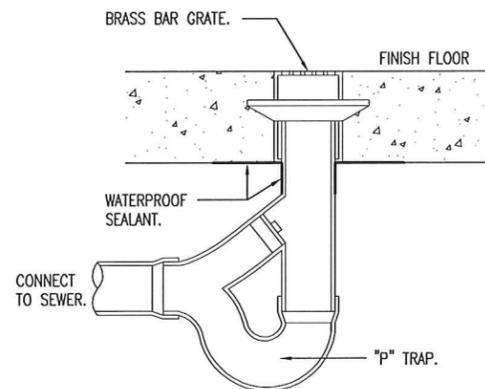
Bunker Mechanics & Cold Storage Building
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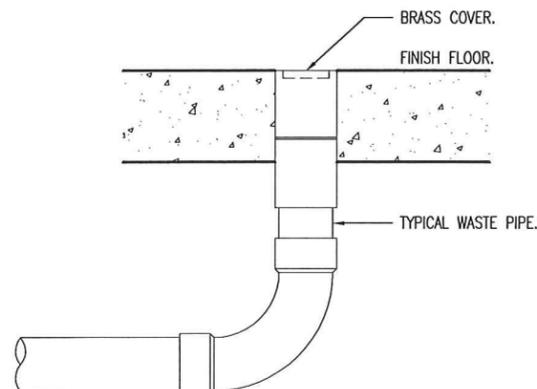
VENT THROUGH ROOF DETAIL

SCALE: NONE



FLOOR DRAIN DETAIL

SCALE: NONE



FLOOR CLEANOUT DETAIL

SCALE: NONE

SYM.	FIXTURE	PIPE CONNECTION				REMARKS
		CW	HW	S&W	VENT	
WC	WATER CLOSET	1/2"		3"	2"	EQUAL TO AMERICAN STANDARD #2467.016 FLOOR MOUNT. PRESSURE ASSISTED, 1.6 GPF/6.0 LPF, ELONGATED WATER-SAVER "CADET RIGHT HEIGHT" WATER CLOSET. 16-1/2" HIGH TO RIM. INCLUDE OPEN FRONT SEAT WITH LID. (WHITE)
U	URINAL	3/4"		1-1/2"	1-1/2"	EQUAL TO AMERICAN STANDARD #6601.021 "LYNBROOK" 1.0 GALLON URINAL WITH SLOAN ROYAL 180-1 FLUSH VALVE.
LV	LAVATORY	1/2"	1/2"	2"	2"	EQUAL TO AMERICAN STANDARD #4867.024, 20" x 18" ENAMELED, CAST IRON "REGALYN" WALL MOUNT LAVATORY WITH 4" CENTERSET SYMMONS SYMMETRIX S-20-2-BH SINGLE LEVER LAVATORY FAUCET. INCLUDE AN ADA APPROVED INSULATION KIT.
SS	SERVICE SINK	1/2"	1/2"	3"	2"	EQUAL TO KOHLER, K-6718, 22.25" x 18.25" ENAMELED, CAST IRON "BANNON" SERVICE SINK WITH CLEARWATER, K-7853 LEVER HANDLE FAUCET, AND K-6673-NA, P-TRAP.
EW	EMERGENCY EYE WASH	1-1/4"	3/4"			EQUAL TO BRADLEY "MODEL S19-310" DRENCH SHOWER/EYE WASH UNIT SAFETY YELLOW. S19-2100 THERMOSTATIC MIXING VALVE.
WH	WATER HEATER	3/4"	3/4"			A.O. SMITH MODEL NUMBER EES-30 (2) 4500 WATT, 240 VOLT ELEMENTS, 30 GALLON ELECTRIC WITH PRESSURE RELIEF VALVE OR EQUAL. MOUNT ON MEZZANINE WITH DRAIN PAN.
HB-1	HOSE BIBB	3/4"				EXTERIOR - EQUAL TO WOODFORD MODEL 67 FREEZELESS WALL HYDRANT WITH 3/4" H.P.T. OUTLET, INTEGRAL VACUUM BREAKER-BACK FLOW PREVENTER. (N.I.C.)
HB-2	HOSE BIBB	3/4"				INTERIOR - EQUAL TO WOODFORD MODEL 26 WALL FAUCET WITH 3/4" H.P.T. OUTLET, INTEGRAL VACUUM BREAKER-BACKFLOW PREVENTER.
FD	FLOOR DRAIN			2"		PVC FLOOR DRAIN WITH P-TRAP, 6-1/2" DIA. NICKLE-BRONZE STRAINER, 2" FIP THREADED THROAT-BALL BACKWATER DEVICE. 1-1/2" PRE-INSTALLED FIP CLEAN-OUT THREADS.
CO	CLEAN OUT					BRASS WITH ADAPTER AND CAP EQUAL TO PIPE SIZE SHOWN.
AC	AIR COMPRESSOR					MODOT SUPPLIED. CONTRACTOR INSTALLED. CONTRACTOR TO PROVIDE 4" CONCRETE PAD. SIZE AS REQUIRED. VERIFY OPERABLE ELECTRICAL SERVICE BY ELECTRICAL CONTRACTOR.
AHR	AIR HOSE REEL					EQUAL TO REELCRAFT 7850 OLP 57 300 LOW PRESSURE HEAVY DUTY ALL STEEL CONSTRUCTION WITH ONE PIECE WRAP AROUND GUIDE ARM.
QD	QUICK DISCONNECT					VERIFY SIZE WITH MODOT MECHANIC. MOUNT AT 48" A.F.F. ATTACH RIGIDLY TO GIRTS.
SK	SINK	1/2"	1/2"	2"	2"	EQUAL TO AMERICAN STANDARD # 24DB.332284.290 DOUBLE BOWL ADA SINK WITH STANDARD 4 HOLE PATTERN AND QUINCE FAUCET #4433.001 CHROME SPOUT, SWIVEL AERATOR AND SPRAYER. PROVIDE INSINKERATOR BADGER 5, 1/2 HP, 6.3 AMP, GARBAGE DISPOSAL WITH WALL SWITCH.
BOH	BLOW-OFF HYDRANT	2"	-	-	-	KUPFERLE FOUNDRY COMPANY - MAINGUARD NO. 77. SUPPLY VALVE SHUT-OFF BOX, 3' BURY LENGTH, CURB STOP VALVE, 2" FIP HORIZONTAL INLET. INCLUDE APOLLO 2", 4A508A2F PRESSURE VACUUM BREAKER. INSTALL HYDRANT 22'-0" FROM NW CORNER NEW BUILDING.
IYH	YARD HYDRANT	1"	-	-	-	WOODFORD MODEL Y2, 1" BACKFLOW PROTECTED, AUTOMATIC DRAINING, FREEZELESS YARD HYDRANT WITH 3' BURY LENGTH. INSTALL SHUT-OFF IN VALVE BOX. INSTALL HYDRANT 22'-0" FROM NW CORNER OF NEW BUILDING.
DF	DRINKING FOUNTAIN	3/8"		1-1/4"		ELKAY, TWO STATION WALL MOUNT BARRIER-FREE MODEL VRCGRNTLBC OR EQUAL.
OS	OIL SEPARATOR			4"		EQUAL TO CHAMPION PRECAST INC. 1,200 GALLON OIL & GREASE INTERCEPTOR STOCK STANDARD NO. 140-00219D. HEAVY DUTY PRECAST CONCRETE. H-20 LOADING, 8" CAST IRON FRAME, LID AND COLLAR. PH: (573)384-5855. SEE DETAIL D-6.

MECHANICAL NOTES

1. DRAWINGS AND DIAGRAMS ARE DIAGRAMMATIC AND SHALL NOT BE SCALED. REFER TO ARCHITECTURAL DRAWINGS FOR DIMENSIONS.
2. MECHANICAL WORK SHALL BE INSTALLED IN STRICT COMPLIANCE WITH THE LATEST EDITION OF THE IBC MECHANICAL CODE.
3. PROVIDE EQUIPMENT AND APPURTENANCES NOT NECESSARILY SHOWN OR SPECIFIED BUT NEEDED FOR COMPLETE AND PROPER INSTALLATION.
4. ALL EQUIPMENT AND MATERIALS, IN PARTICULAR VALVES, FILTERS, MOTORS, AND CONTROLS SHALL BE ARRANGED TO PROVIDE PROPER CLEARANCE FOR SERVICE, MAINTENANCE AND INSPECTION.
5. MECHANICAL SUBCONTRACTOR SHALL FULLY COORDINATE ALL WORK WITH PLUMBING AND ELECTRICAL WORKERS PRIOR TO COMMENCING OF THE MECHANICAL INSTALLATION.
6. PROVIDE BLOCKING TO HVAC DEVICES AS REQUIRED FOR A SECURE APPLICATION.
7. MECHANICAL CONTRACTOR TO PROVIDE ALL DEVICES INCLUDING REFRIGERANT LINES AND DRAINS AS REQUIRED FOR A FUNCTIONAL SYSTEM.

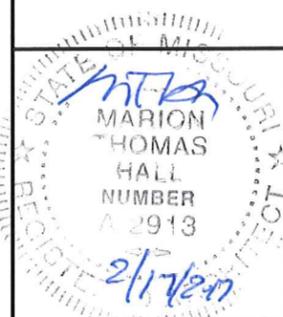
PLUMBING NOTES

1. DRAWINGS AND DIAGRAMS ARE DIAGRAMMATIC AND SHALL NOT BE SCALED. REFER TO ARCHITECTURAL DRAWINGS FOR DIMENSIONS.
2. PLUMBING SHALL BE INSTALLED IN STRICT COMPLIANCE WITH THE LATEST EDITION OF THE INTERNATIONAL PLUMBING CODE.
3. PLUMBING SHALL BE LOCATED AND PLACED UNDER THE SLAB PRIOR TO POURING OF CONCRETE. PIPING SHALL BE RUN IN SAND FILLED TRENCH UNDER THE BASE ROCK AND SLEEVED WITH PVC WHENEVER RUN THROUGH CONCRETE.
4. PROVIDE PLUMBING EQUIPMENT AND ACCESSORIES REQUIRED FOR COMPLETE AND OPERATIONAL PLUMBING SYSTEMS AS REQUIRED BY MANUFACTURER'S INSTRUCTIONS AND DIRECTIONS FOR SYSTEMS SPECIFIED.
5. PLUMBING VENTS ARE NOT SHOWN ON THE PLANS. ALL FIXTURES SHALL BE PROPERLY VENTED AS PER IBC PLUMBING CODE.
6. ROOF VENTS SHALL BE COMBINED WHEREVER IN COMPLIANCE WITH THE NATIONAL PLUMBING CODE TO MINIMIZE ROOF PENETRATIONS.
7. PROVIDE SHUT OFF VALVES AT EACH FIXTURE.
8. PROVIDE SHOCK ABSORBERS AS REQUIRED AT EACH FAUCET.
9. SEE MECHANICAL PLAN FOR GAS PIPING AND MECHANICAL REQUIREMENTS.
10. CONTRACTOR TO PROVIDE CAST IRON VENT PIPING IN PLENUM AS REQUIRED BY CODE. SECURE AS REQUIRED. VERTICAL VENT THROUGH PLENUM & ROOF TO BE AS CLOSE TO EXTERIOR WALL AS POSSIBLE.
11. PROVIDE DRAIN LINE FOR THE WATER HEATER PAN AS REQUIRED FOR A FUNCTIONAL SERVICE.

A
23

PLUMBING & MECHANICAL NOTES

SCALE: NONE



Plumbing & Mechanical Notes

MISSOURI DEPARTMENT
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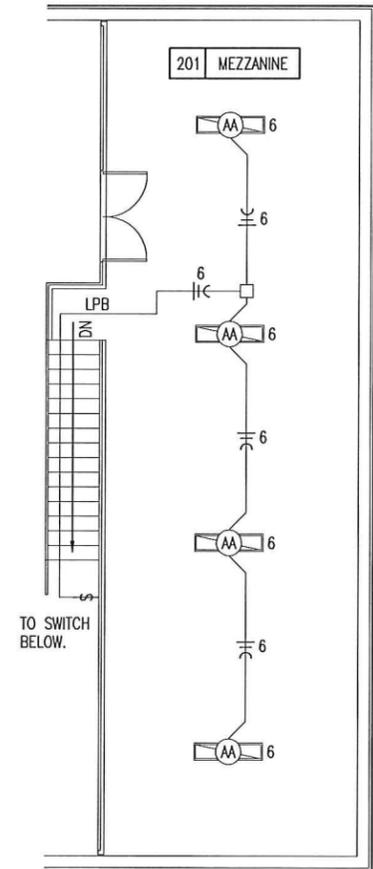
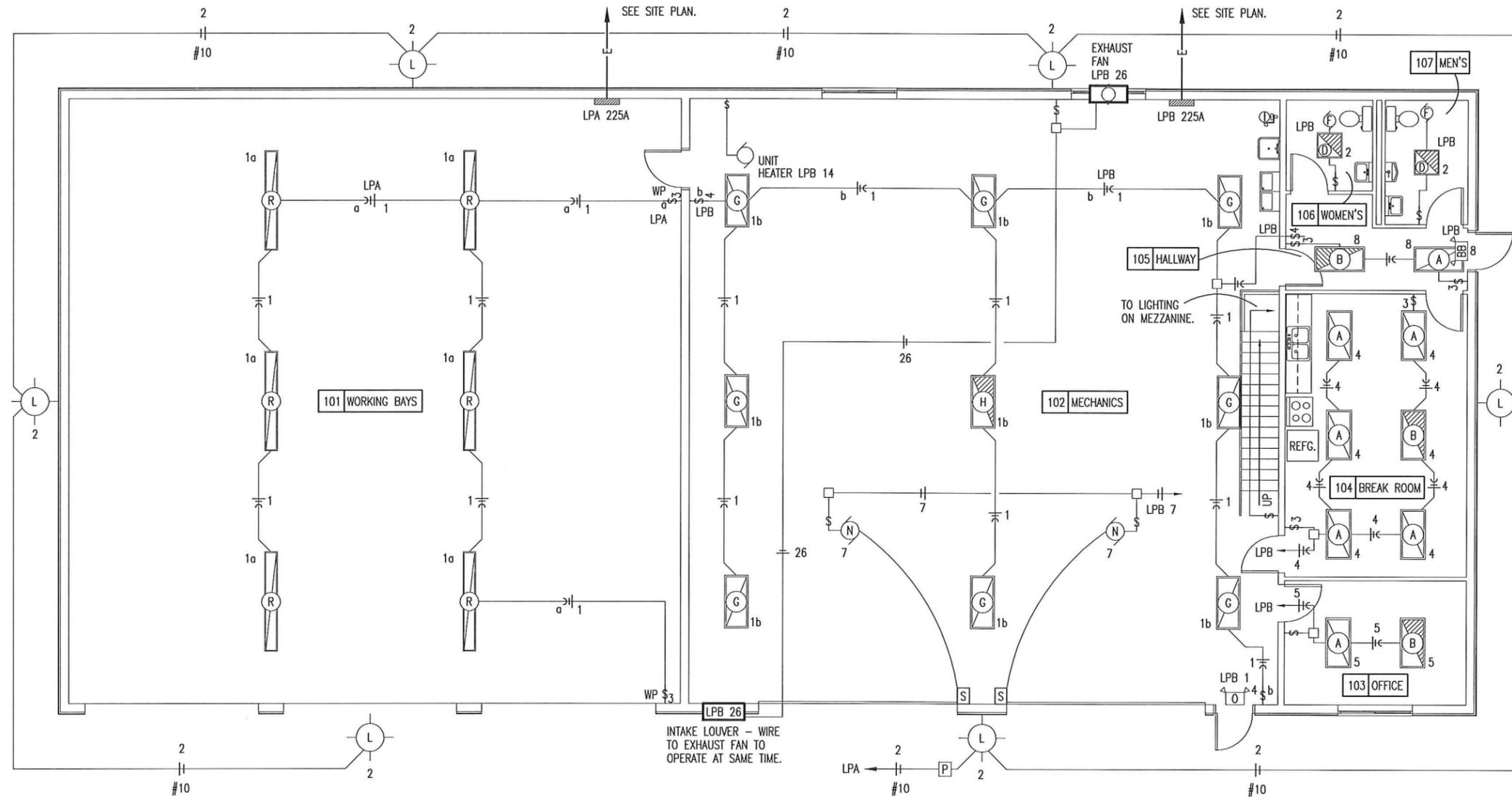
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DATE: 12-16-16

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SEE ELECTRICAL SCHEDULE
SHEET 26. LEGEND ON SHEET 25.



A
24 LIGHTING PLAN
SCALE: 3/32" = 1'-0"



B
24 MEZZANINE LIGHTING PLAN
SCALE: 3/32" = 1'-0"



LIGHTING PLAN

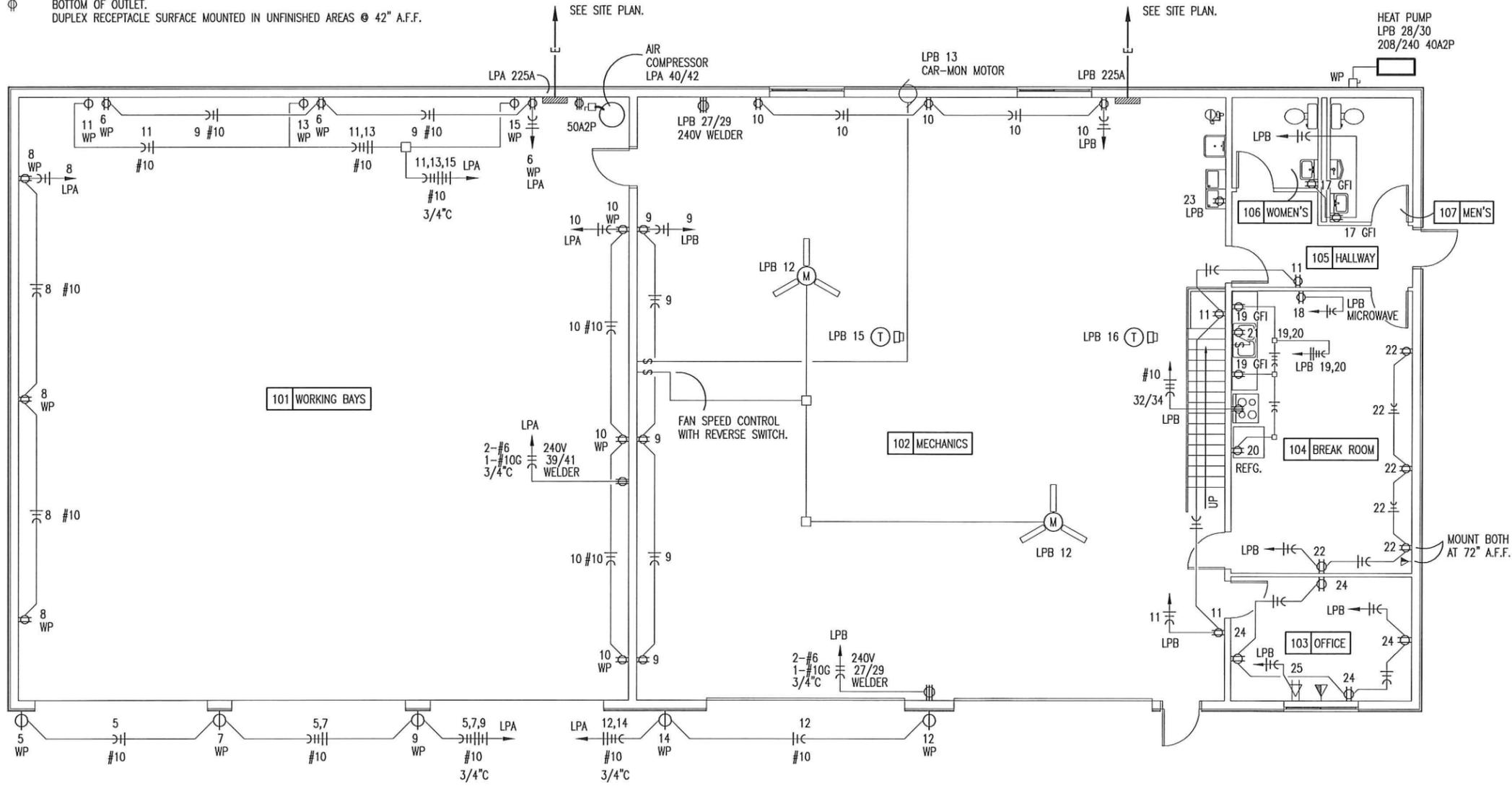
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LEGEND

- \$ WP SINGLE POLE OR 3-WAY SWITCH, MOUNT IN FS BOX WITH HUBBELL HBL7420 COVER.
- ⊕ WP DUPLEX RECEPTACLE MOUNTED IN FS BOX WITH HUBBELL HBL5221 COVER.
- ⊕ WP SINGLE RECEPTACLE MOUNTED IN FS BOX WITH HUBBELL HBL7423 COVER.
- \$ SINGLE POLE SWITCH, FLUSH MOUNTED IN FINISHED AREAS @ 48" A.F.F.
- \$³ 3-WAY SWITCH, SURFACE MOUNTED IN UNFINISHED AREAS @ 48" A.F.F.
- \$⁴ 4-WAY SWITCH, SURFACE MOUNTED IN FINISHED AREAS @ 48" A.F.F.
- ⊕ DUPLEX RECEPTACLE FLUSH MOUNTED IN FINISHED AREAS @ 18" A.F.F. TO BOTTOM OF OUTLET.
- ⊕ DUPLEX RECEPTACLE SURFACE MOUNTED IN UNFINISHED AREAS @ 42" A.F.F.
- ⊕ WELDER RECEPTACLE (LEVITON #5374) SURFACE MOUNTED 42" A.F.F., MOUNT IN 4" SQUARE BOX WITH RAISED COVER.
- ⊕ GFI DUPLEX RECEPTACLE WITH GROUND FAULT INTERRUPTER. PROVIDE SEPARATE GROUND PER CIRCUIT. TYPICAL.
- JUNCTION BOX, SIZE FOR WIRE, FILL ACCORDING TO ARTICLE 314-16 OF THE N.E.C.
- NON FUSED DISCONNECT SWITCH.
- ⊕ DEDICATED RECEPTACLE FLUSH MOUNTED IN FINISHED AREAS @ 18" A.F.F. TO BOTTOM OF OUTLET.
- ⊕ VOICE AND DATA OUTLET FLUSH MOUNTED IN FINISHED AREAS @ 18" A.F.F. TO BOTTOM OF OUTLET.
- #12 COPPER NEUTRAL CONDUCTOR UNLESS NOTED.
- #12 COPPER PHASE CONDUCTORS UNLESS NOTED.
- 1/2" EMT UNLESS NOTED.
- #12 COPPER GROUNDING CONDUCTOR UNLESS NOTED.

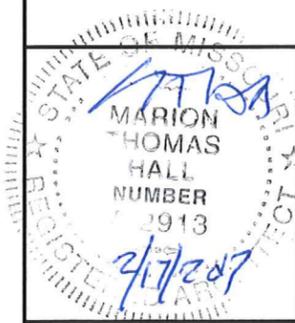


A POWER PLAN
25 SCALE: 3/32" = 1'-0"



SEE ELECTRICAL SCHEDULE SHEET 26.

B MEZZANINE POWER PLAN
25 SCALE: 3/32" = 1'-0"



POWER PLAN

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ELECTRIC SCHEDULE

MANUF.	MODEL	#	LAMPS TYPE	W	MNT	REMARKS
WILLIAMS A	50G-S24-LED*UT 50/835-RPC12125-ED*UT-UNV		LED	51	CLG	24" x 48" STATIC TROFFER FIXTURE, HOUSING: 22 GAUGE DIE FORMED C.R.S. SHIELDING: FROSTED ACRYLIC, PATTERN #12.
WILLIAMS B	50G-S24-LED*UT 50/835-RPC12125-EM/BSL310-ED*UT-UNV		LED	51	CLG	24" x 48" STATIC TROFFER FIXTURE, HOUSING: 22 GAUGE DIE FORMED C.R.S. SHIELDING: FROSTED PATTERN #12 & EMERGENCY DRIVER.
WILLIAMS D	50G-S22-LED*UT30/85-RPC12125-EM/BSL310-ED*UT-UNV		LED	25	CLG	24" x 24" STATIC TROFFER FIXTURE, HOUSING: 22 GAUGE DIE FORMED C.R.S. SHIELDING: FROSTED PATTERN #12 & EMERGENCY DRIVER.
BROAN E	GRAINGER #5NPZ7				CLG	80 CFM CEILING MOUNT BATHROOM VENTILATOR. BROAN WALL CAP, GRAINGER #4C388.
WILLIAMS G	GL-4-L200/840-WG11-DRV-UNV		LED	174	CLG	14-3/16" x 48" DIE-FORMED ALUMINUM HOUSING WITH WIRE GUARD.
WILLIAMS H	GL-4-L200/840-EM/BSL310-WG11-DRV-UNV		LED	174	CLG	14-3/16" x 48" DIE-FORMED ALUMINUM HOUSING WITH WIRE GUARD. BACK MOUNTED EMERGENCY LED DRIVER.
ELKO L	WPGL-1C-U -8105 LM, 5000K BRONZE +70CRI 120V-277 VOLT		LED	93	WALL	EXTERIOR, SURFACE MOUNT LIGHT FIXTURE, WITH ALUMINUM HOUSING. PRISMATIC GLASS LENS. (NO OTHERS ACCEPTED.)
CANARM M	CP60HPWP (NO OTHERS ACCEPTED.)				CLG	60" THREE-BLADE, HEAVY DUTY COMMERCIAL CEILING FAN. ADD SPEED CONTROL WITH REVERSE SWITCH. CANARM FRMCS.
N	OVERHEAD DOOR OPERATOR				WALL	115V, 1-PH, TROLLEY TYPE. SEE SPECIFICATION SECTION 08720.
LITHONIA O	LHQM P W3 R N		LED		WALL	QUANTUM THERMOPLASTIC EXIT/UNIT COMBO (2) LED 5.4 KRYPTON LAMPS.
TORK P	2001				WALL	120V PHOTO ELECTRIC CONTROL OF EXTERIOR LIGHTS.
WILLIAMS R	GLN-8-L210/8400 WG11-DRV-UNV		LED	171	WALL	8-11/16" x 96" FIXTURE. HEAVY GAUGE ALUMINUM HOUSING WITH WIRE GUARDS.
S	OVERHEAD DOOR CONTROL				WALL	THREE BUTTON OVERHEAD DOOR CONTROL AS SUPPLIED BY OVERHEAD DOOR MANUF. SEE SPECIFICATION SECTION 08720.
REELCRAFT T	L 4050 163 1				CLG	CEILING MOUNTED SPRING RETRACTABLE, ELECT. CORD REEL WITH INCANDESCENT LAMP & THREE PRONG OUTLET PLUG.
WILLIAMS AA	75L-4-LED*PH50/835-A12125-ED*PH-UNV		LED	51	CLG	2-3/4" x 48" 22 GAUGE DIE-FORMED C.R.S. SHIELDING: ACRYLIC PATTERN #12, .125" THICK.
PATHWAY BB	PLEXLEDXUR		LED		WALL	SOLID STATE 2-RATE CHARGER. NI-CAD BATTERY (2) LED LAMPS. 3.7 WATTS. 0.040 A.

ELECTRICAL FIXTURES AND EQUIPMENT ARE SCHEDULED BY MANUFACTURER AND MODEL NUMBER FOR DESIGN INTENT ONLY, APPROVED EQUALS MAY BE SUBSTITUTED.

SERVICE PANEL LPA

MAIN BUS: 225A MLO VOLTS: 240/120, 1PH, 3-WIRE BUS MATERIAL: COPPER MOUNTING: SURFACE		SQUARE "D" NQOD OR EQUAL W/ NEUTRAL BUS & GROUNDING BUS CIRCUIT BREAKERS BOLT-IN 10000 AIC		CONNECTED LOAD A PHASE 15015 VA B PHASE 13640 VA TOTAL 28155 VA 117 A				
CIR	SERVICE	VA	BKR	BKR	VA	SERVICE	CIR	
1	LIGHTS - 101 WORKING BAYS	317	20A1P	A	20A1P	558	EXTERIOR LIGHTING	2
3	SPARE	-	20A1P	B	20A1P	-	SPARE	4
5	EXTERIOR RECEPTACLE	1000	30A1P	A	30A1P	1000	EXTERIOR RECEPTACLE	6
7	EXTERIOR RECEPTACLE	1000	30A1P	B	20A1P	540	101- RECEPTACLES	8
9	EXTERIOR RECEPTACLE	1000	30A1P	A	20A1P	540	101 - RECEPTACLES	10
11	INTERIOR RECEPTACLE	1000	20A1P	B	20A1P	1000	EXTERIOR RECEPTACLE	12
13	INTERIOR RECEPTACLE	1000	20A1P	A	20A1P	1000	EXTERIOR RECEPTACLE	14
15	INTERIOR RECEPTACLE	1000	20A1P	B				16
17				A				18
19				B				20
21				A				22
23				B				24
25				A				26
27				B				28
29				A				30
31				B				32
33				A				34
35				B				36
37				A				38
39	101 - WELDER	4500	50A2P	B	50A2P	4600	AIR COMPRESSOR	40
41		4500		A		4600		42

⊙ CIRCUIT BREAKER SHALL BE GFI RATED

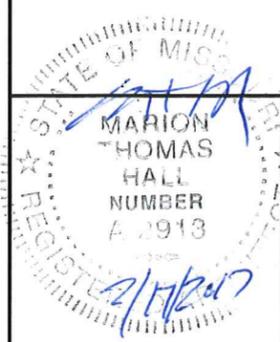
ELECTRICAL NOTES

- DRAWINGS AND DIAGRAMS ARE DIAGRAMMATIC AND SHALL NOT BE SCALED. REFER TO ARCHITECTURAL DRAWINGS FOR DIMENSIONS.
- ELECTRICAL WORK SHALL BE INSTALLED IN STRICT COMPLIANCE WITH THE LATEST EDITION OF THE NATIONAL ELECTRIC CODE (N.E.C.).
- PROVIDE ELECTRICAL EQUIPMENT AND ACCESSORIES REQUIRED FOR A COMPLETE AND OPERATIONAL ELECTRICAL SYSTEM AS REQUIRED BY MANUFACTURER'S INSTRUCTIONS AND DIRECTIONS FOR SYSTEMS SPECIFIED.
- SWITCHES AND RECEPTACLES SHALL BE EQUAL TO THE AMPERE RATING SHOWN IN THE PANEL SCHEDULE. RECEPTACLES SHALL BE GROUND-FAULT INTERRUPTION TYPE WHERE SHOWN OR AS REQUIRED BY CODE.
- RESTROOM EXHAUST FAN IS TO BE PROVIDED AND INSTALLED BY THE ELECTRICAL CONTRACTOR.
- SEE HVAC SCHEDULE FOR EQUIPMENT TO BE HARD WIRED, PROVIDE SERVICE DISCONNECT AT EACH.
- ALL RECEPTACLES IN MECHANICS AND COLD STORAGE AREA TO BE MOUNTED AT 48" A.F.F.
- COORDINATE WORK WITH OTHER TRADES PRIOR TO COMMENCING WITH ELECTRICAL WORK.

SERVICE PANEL LPB

MAIN BUS: 225A MLO VOLTS: 240/120, 1PH, 3-WIRE BUS MATERIAL: COPPER MOUNTING: SURFACE		SQUARE "D" NQOD OR EQUAL W/ NEUTRAL BUS & GROUNDING BUS CIRCUIT BREAKERS BOLT-IN 10000 AIC		CONNECTED LOAD A PHASE 24236 VA B PHASE 22230 VA TOTAL 46466 VA 194 A				
CIR	SERVICE	VA	BKR	BKR	VA	SERVICE	CIR	
1	LIGHTS - 102 MECHANICS	1572	20A1P	A	20A1P	160	LIGHTS - RESTROOMS	2
3	GARAGE DOOR OPENERS	2162	30A1P	B	20A1P	306	LIGHTS - BREAK ROOM	4
5	LIGHTS - 103 OFFICE	102	20A1P	A	20A1P	204	LIGHTS - MEZZANINE	6
7	MEZZANINE RECEPTACLES	900	20A1P	B	20A1P	106	LIGHTS - HALLWAY	8
9	102 - RECEPTACLES	540	20A1P	A	20A1P	540	102 - RECEPTACLES	10
11	102 - RECEPTACLES	540	20A1P	B	20A1P	156	102 - CEILING FANS	12
13	CARBON MONOXIDE	1553	20A1P	A	20A1P	900	GAS UNIT HEATER	14
15	CORD REEL	540	20A1P	B	20A1P	540	CORD REEL	16
17	RESTROOMS GFI RECEPTACLES	360	20A1P	A	20A1P	800	MICROWAVE	18
19	BREAK ROOM GFI RECEPTACLES	360	20A1P	B	20A1P	600	REFRIGERATOR	20
21	GARBAGE DISPOSAL	972	20A1P	A	20A1P	720	BREAK ROOM RECEPTACLES	22
23	DRINKING FOUNTAIN	480	20A1P	B	20A1P	720	OFFICE RECEPTACLES	24
25	OFFICE DEDICATED RECEPTACLE	180	20A1P	A	20A1P	813	EXHAUST FAN & LOUVER	26
27	102 - WELDER MECHANICS	4500	50A2P	B	40A2P	4320	HEAT PUMP	28
29		4500		A		4320		30
31	WATER HEATER	3000	30A2P	B	40A2P	3000	RANGE	32
33		3000		A		3000		34
35				B				36
37				A				38
39				B				40
41				A				42

⊙ CIRCUIT BREAKER SHALL BE GFI RATED



ELECTRICAL PANELS

MISSOURI DEPARTMENT
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Bunker Mechanics & Cold Storage Building
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DESIGN BY: LARRY CARVER

DATE: 2-16-17

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