

Beaverton School District
16550 SW Merlo Road Beaverton, Oregon 97003

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S1101	GENERAL INFORMATION
S1401	ROOF PLAN
S5301	STRUCTURAL DETAILS
S5302	STRUCTURAL DETAILS
S5303	STRUCTURAL DETAILS

SCIENCE CLASSROOM
A120

ROOM NAME & NUMBER

DOOR OR WINDOW TYPE

KEYNOTE REFERENCE

CEILING PLANE HEIGHT - ALL REFERENCES TO FINISH FLOOR ELEVATION

INTERIOR FINISH TYPE

HORIZONTAL ELEVATION PLANE HEIGHT - ALL REFERENCES TO F.F.E.

SPOT ELEVATION - ALL REFERENCES TO F.F.E.

WALL TYPE WITH RATING WHERE APPLICABLE

WALL TYPE WITH RATING WHERE APPLICABLE

DOOR REFERENCE - SEE DOOR SCHEDULE

RELITE NUMBER - SEE RELITE SCHEDULE

DRAWING ORIENTATION NORTH

GRID LINE

DRAWING NUMBER

BUILDING SECTION

SHEET NUMBER

DRAWING NUMBER

WALL SECTION

SHEET NUMBER

DRAWING NUMBER

EXTERIOR ELEVATION

SHEET NUMBER

DRAWING NUMBER

INTERIOR ELEVATION

SHEET NUMBER

DETAIL NUMBER

DETAIL

SHEET NUMBER

REVISION CLOUD

[illegible]

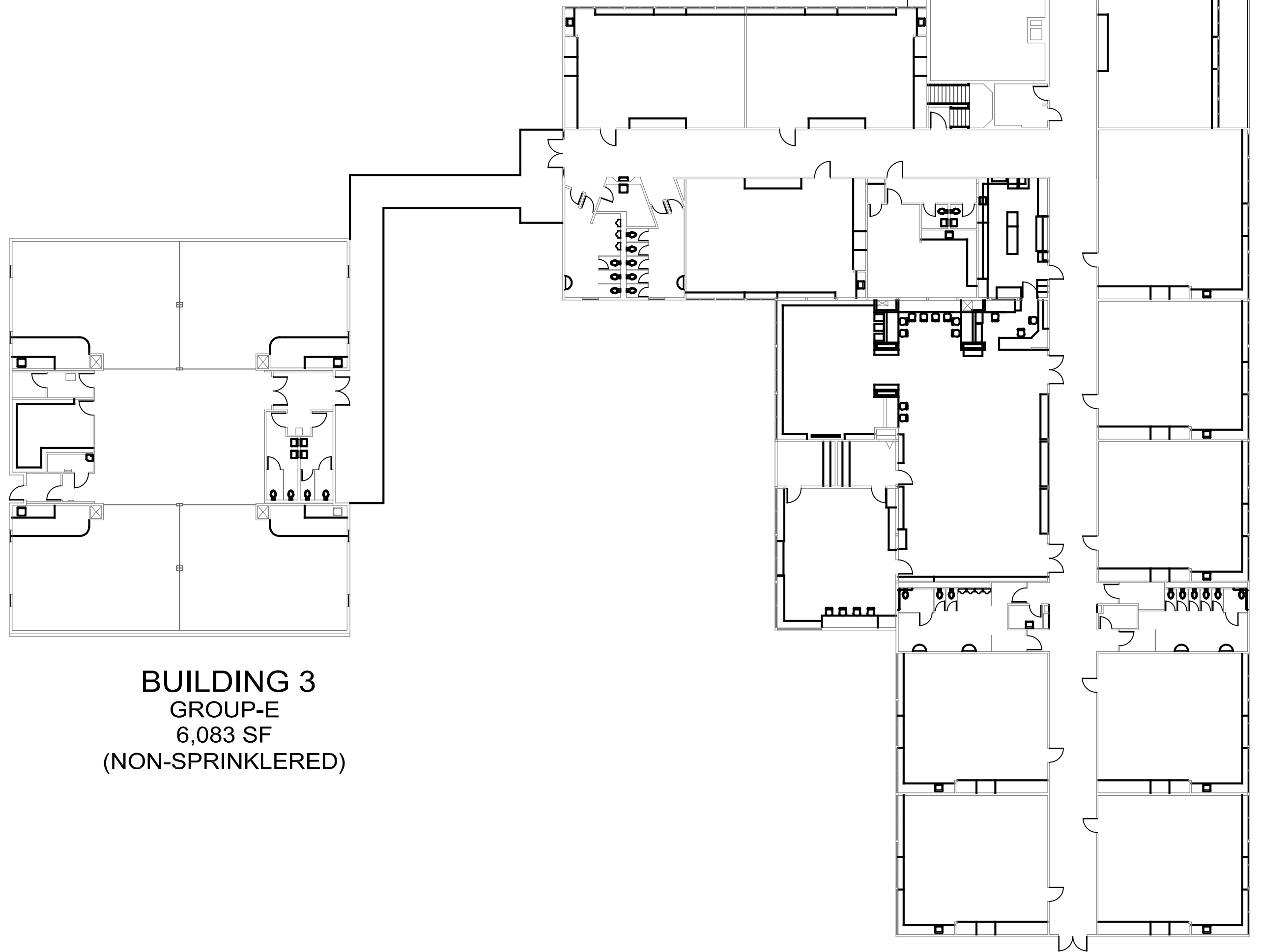
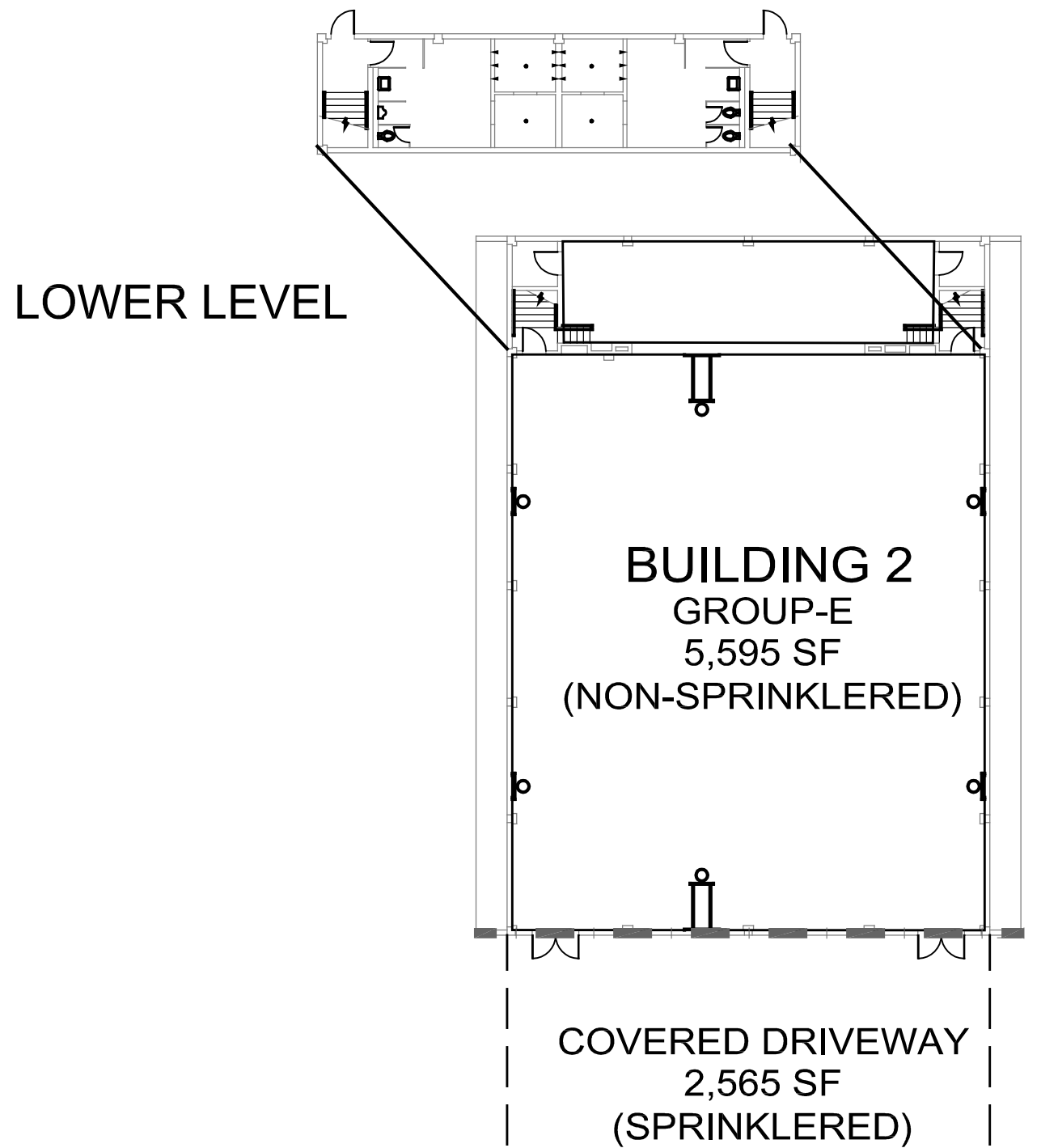
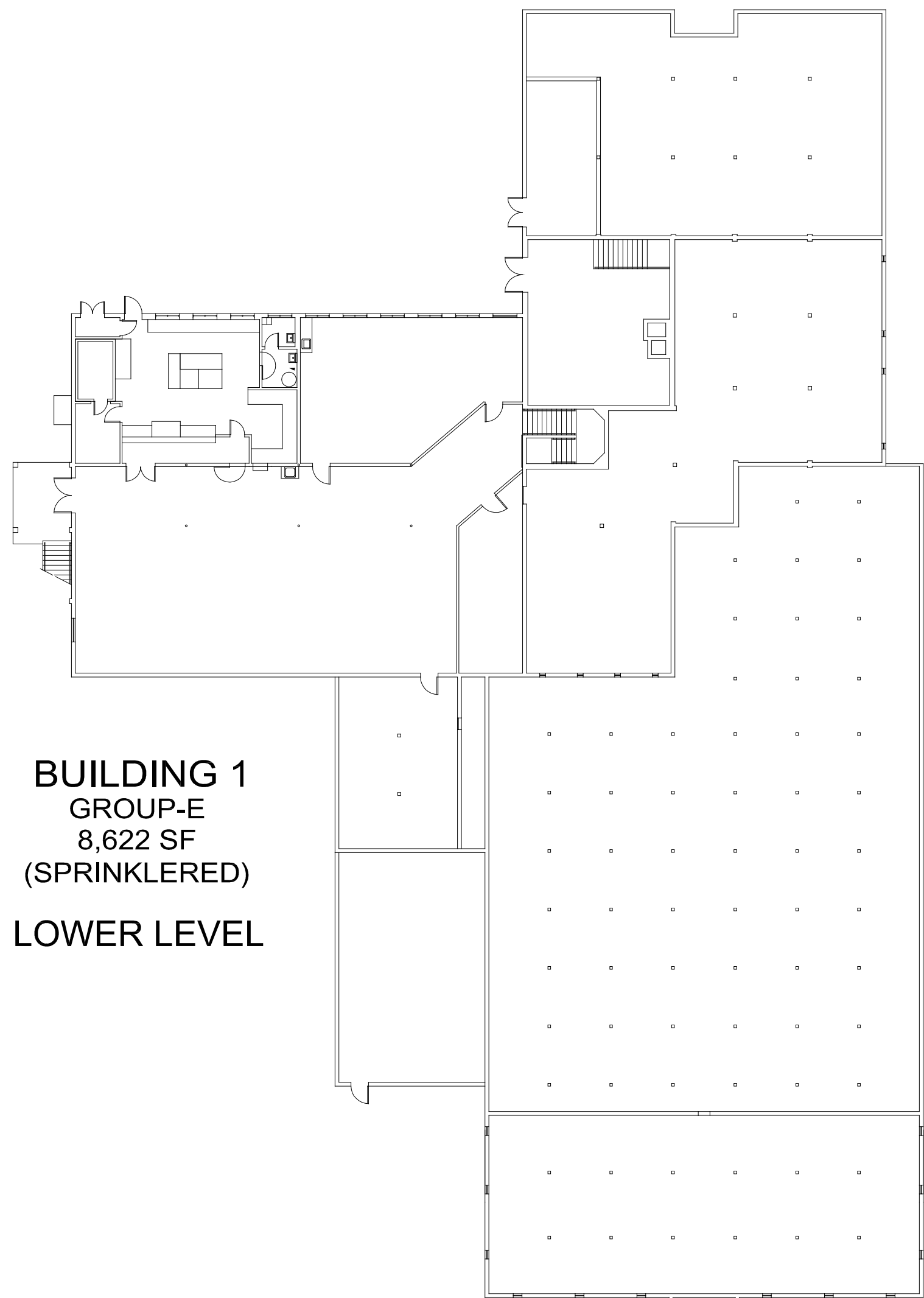
West Tualatin View Elementary School
8800 SW Leahy Road, Portland, OR 97225
Phone: (503) 356-2510
AHJ: Washington County
Tax Lot #: 1S102AD00600

FALL PROTECTION

L	ANGLE	FDN	FOUNDATION	O.D.	OVERFLOW DRAIN
L	AND	FE	FIRE EXTINGUISHER	OD	OUTSIDE DIAMETER
AB	ANCHOR BOLT	FEC	FIRE EXTINGUISHER CABINET	OH	OVERHEAD
ACT	ACUSTICAL CEILING TILE	FF	FINISH FLOOR	OPN	OPENING
AD	ADDENDUM	FFE	FINISH FLOOR ELEVATION	OPP	OPPOSITE
A.F.F.	ABOVE FINISH FLOOR	FIN	FIN	OS	OUTSIDE
A.L.	AUTHORITY-HAVING JURISDICTION	FL	FLOOR	OSPL	OUTSIDE PLACE
AL	ALIGHT STANDARD	FO	FACE OF	PL	PROPERTY LINE
ALUM	ALUMINUM	FOC	FACE OF CONCRETE	PLAS	PLASTER
ANOD	ANODIZED	FOF	FACE OF FINISH	PLYWD	PLYWOOD
AN	AND	FB	FACE OF BRICK	PSF	PER SQUARE FOOT
BD	BOARD	FOIS	FACE OF STUD	P.T.	PRESSURE TREATED
BLDG	BUILDING	FOIS	FURNISHED BY OWNER INSTALLED	PVMT	PAVEMENT
BLOC	BLOCK	BY CONTRACTOR		RADIUS	
B.M.	BENCH MARK	FRT	FURNISHED BY OWNER INSTALLED	R.D.	ROOF DRAIN
BM	BEAM	BY OWNER		REF	REFERENCE
BOT	BOTTOM	FRI	FIRE RETARDANT TREATED	REFR	REFRIGERATOR
BTU	BRITISH THERMAL UNIT	FTG	FOOTING	RECD	REQUIRED
BTWN	BETWEEN	FURR	FURRING	REV	REVISE OR REVISION
COR C	CHANNEL	GA	GAUGE	RM	ROOM
CB	CATCH BASIN	GALV	GALVANIZED	R.O.	ROUGH OPENING
CCTV	CLOSED CIRCUIT TV	GB	GRAB BAR	RCF	REFLECTED CEILING PLAN
CG	CORNER GUARD	GC	GENERAL CONTRACTOR	SC	SOLID CORE
CL	CEILING	GL	GLASS	SECT	SECTION
CLR	CLEAR	GNU	GROUND	SF	SQUARE FOOT
CJ	CONTROL JOINT	GVP	GYPSUM VENEER PLASTER	SHG	SHEDDING
CM	CONCRETE MASONRY UNIT	GVS	GYPSUM WALL BOARD	SHWR	SHEAR
CONT	CONTINUOUS	HBS	HOLE BIB	SHT	SHEET
CORR	CORRIDOR	HC	HANDICAP	SIM	SIMILAR
CS.J	CONSTRUCTION JOINT	HDWR	HARDWARE	SJ	SEISMIC JOINT
CSMT	CASEMENT	HM	HOLLOW METAL	SH	SHEET METAL
CT	CERAMIC TILE	HW	HOT WATER	SPEC	SPECIFICATION
CTR	CENTRAL	HVAC	HEATING, VENTILATION AND AIR CONDITIONING	SQ	SQUARE
CS	CASELINE	SS	STEEL	SS	STAINLESS STEEL
DBL	DOUBLE	INSUL	INSULATION	STD	STANDARD
DTL	DETAIL	INT	INTERIOR	STL	STEEL
DR	DRINKING FOUNTAIN	JAN	JANITOR	STOR	STORAGE
DIA	DIAMETER	JT	JOINT	STRUCT	STRUCTURAL
DIAG	DIAGONAL	JO	JOIST	SUSP	SUSPENDED
DM	DIMENSION	L	LENGTH		TEMPERED GLAZING
DISP	DISPENSER	LAV	LAVATORY	TC	TOP OF CURB
DN	DOWN	LB	LAG BOLT	TEL	TELEPHONE
DP	DAMPPOOFING	LKR	LOCKER	T&G	TONGUE AND GROOVE
DR	DOOR	LS	LANDSCAPING	THK	THICK
DS	DOWN SPOUT	LVR	LOUVER	TJ	TOILET JOINT
DWG	DRAWING	MATL	MATERIAL	TP	TOP OF PAVEMENT
E	EACH	MAX	MAXIMUM	TB	TUBE STEEL
EF	EXHAUST FAN	MCHL	MECHANICAL	TYPE	TYPICAL
EJ	EXPANSION JOINT	MD	MEDIUM	TOD	TOP OF (MATERIAL)
EL	ELEVATION	MEZZ	MEZZANINE	UNFIN	UNFINISHED
ELEC	ELECTRICAL	MFR	MANUFACTURER	UNO	UNLESS NOTED OTHERWISE
E.O.S.	EDGE OF SLAB	MH	MANHOLE	VB	VAPOR BARRIER
ENGR	ENGINEER	MIN	MINIMUM	VERT	VERTICAL
EP	ELECTRICAL PANEL	MIR	MIRROR	VEST	VESTIBULE
EQ	EQUAL	MISC	MISCELLANEOUS	VFY	VERIFY
EQUIP	EQUIPMENT	MTC	MOUNTED	W	WITH
ES	EACH SIDE	MTL	METAL	W	WATER CLOSET
EW	EACH WAY	NA	NOT APPLICABLE	W	WOOD
EXST	EXISTING	NIC	NOT IN CONTRACT	WF	WIDE FLANGE
(E) EXISTING		NOM	NOMINAL	WG	WIRE GLASS
EXP	EXPANSION	NS	NELSON STUD	W	WATER HEATER
EXT	EXTERIOR	NTS	NOT TO SCALE	W/O	WITHOUT
FA	FIRE ALARM	OA	OVERALL	WP	WATERPROOFING
F	FURNISHED BY OTHERS	OC	ON CENTER	WRB	WATER RESISTIVE BARRIER
FSD	FLOOR DRAIN			WT	WEIGHT

BID DOCUMENTS

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BUILDING 3
GROUP-E
6,083 SF
(NON-SPRINKLERED)

CODE REVIEW PLAN

SCALE: 1"=20'-0"

1



CODE REVIEW NOTES:

1. THIS CODE REVIEW IS BASED ON THE 2014 O.S.S.C.
2. THE SCOPE OF WORK FOR THIS PROJECT INCLUDES REROOFING AND SEISMIC UPGRADE OF ROOF DECK.
3. THE ESTIMATED VALUE OF WORK FOR THIS PROJECT IS \$XXX,XXX.

LEGEND:

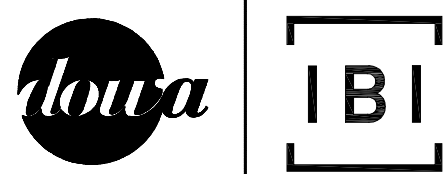
EXISTING 2-HOUR FIREWALL

ALLOWABLE AREA ANALYSIS:

BUILDING 1
SUMMARY:
'BUILDING 1' IS SINGLE-STORY COMBUSTIBLE CONSTRUCTION WITH PARTIAL OPEN FRONTAGE AND AN AUTOMATIC SPRINKLER SYSTEM
USE & OCCUPANCY:
EDUCATIONAL GROUP E
CONSISTING OF CLASSROOMS, OFFICES, CAFETERIA, COVERED DRIVE
CONSTRUCTION TYPE:
TYPE V-B PER TABLE 503
ALLOWABLE HEIGHT:
40' (PER TABLE 503)
ALLOWABLE NUMBER OF STORIES:
1 STORY (PER TABLE 503) + 1 STORY FOR SPRINKLERS
ALLOWABLE AREA:
9,500 SF PER TABLE 503
AREA MODIFICATION: (PER SECTION 506)
$$I_r = \left[\frac{F}{P} - 0.25 \right] \frac{W}{30} = \left[\frac{776'}{871'} - 0.25 \right] \frac{30}{30} = 0.64$$
$$I_a = 2 \text{ (PER 506.3)}$$
$$A_a = A_1 + \left[A_1 \times I_r \right] + \left[A_1 \times I_a \right]$$
$$A_a = 9,500 + \left[(9,500) (0.64) \right] + \left[(9,500) (2) \right]$$
$$A_a = 9,500 + 6,080 + 19,000 = 34,580 \text{ SF}$$
TOTAL ALLOWABLE AREA PER FLOOR: 34,580 SF
TOTAL ACTUAL AREA: 26,616 SF < 34,580 SF = OK
(ACTUAL IS LESS THAN ALLOWABLE. THEREFORE, BUILDING 1 AREA IS OK)

BUILDING 2
SUMMARY:
'BUILDING 2' IS SINGLE STORY COMBUSTIBLE CONSTRUCTION WITH PARTIAL OPEN FRONTAGE. IT DOES NOT HAVE AN AUTOMATIC SPRINKLER SYSTEM
USE & OCCUPANCY:
EDUCATIONAL GROUP E
CONSISTING OF GYMNASIUM
CONSTRUCTION TYPE:
TYPE V-B PER TABLE 503
ALLOWABLE HEIGHT:
40' (PER TABLE 503)
ALLOWABLE NUMBER OF STORIES:
1 STORY (PER TABLE 503)
ALLOWABLE AREA:
9,500 SF PER TABLE 503
AREA MODIFICATION: (PER SECTION 506)
$$I_r = \left[\frac{F}{P} - 0.25 \right] \frac{W}{30} = \left[\frac{258'}{320'} - 0.25 \right] \frac{30}{30} = 0.56$$
$$I_a = A_1 + \left[A_1 \times I_r \right]$$
$$A_a = 9,500 + \left[(9,500) (0.56) \right]$$
$$A_a = 9,500 + 5,320 = 14,820 \text{ SF}$$
TOTAL ALLOWABLE AREA PER FLOOR: 14,820 SF
TOTAL ACTUAL AREA: 5,595 SF < 14,820 SF = OK
(ACTUAL IS LESS THAN ALLOWABLE. THEREFORE, BUILDING 2 AREA IS OK)

BUILDING 3
SUMMARY:
'BUILDING 3' IS SINGLE-STORY COMBUSTIBLE CONSTRUCTION WITH PARTIAL OPEN FRONTAGE. IT DOES NOT HAVE AN AUTOMATIC SPRINKLER SYSTEM
USE & OCCUPANCY:
EDUCATIONAL GROUP E
CONSISTING OF CLASSROOMS AND A COVERED PLAY AREA
CONSTRUCTION TYPE:
TYPE V-B PER TABLE 503
ALLOWABLE HEIGHT:
40' (PER TABLE 503)
ALLOWABLE NUMBER OF STORIES:
1 STORY (PER TABLE 503)
ALLOWABLE AREA:
9,500 SF PER TABLE 503
AREA MODIFICATION: (PER SECTION 506)
$$I_r = \left[\frac{F}{P} - 0.25 \right] \frac{W}{30} = \left[\frac{255'}{312'} - 0.25 \right] \frac{30}{30} = 0.57$$
$$I_a = A_1 + \left[A_1 \times I_r \right]$$
$$A_a = 9,500 + \left[(9,500) (0.57) \right]$$
$$A_a = 9,500 + 5,415 = 14,915 \text{ SF}$$
TOTAL ALLOWABLE AREA PER FLOOR: 14,915 SF
TOTAL ACTUAL AREA: 6,083 SF < 14,915 SF = OK
(ACTUAL IS LESS THAN ALLOWABLE. THEREFORE, BUILDING 3 AREA IS OK)



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Beaverton School District

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phase Bid Documents

date February 22, 2019

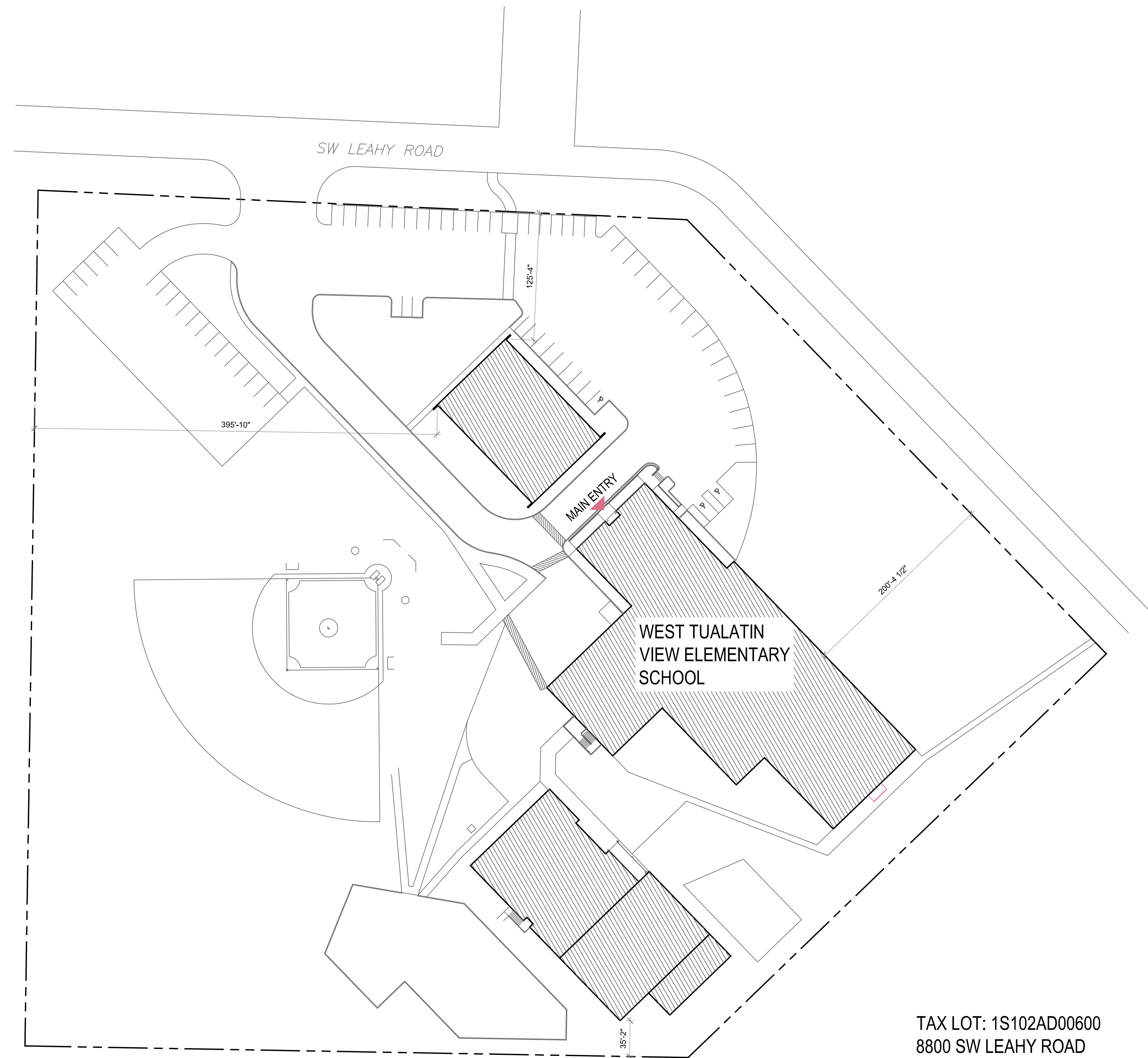
revisions

project # 119190

Code Review

G1101

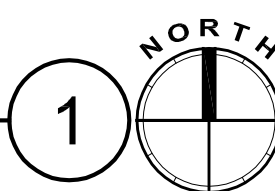
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TAX LOT: 1S102AD00600
8800 SW LEAHY ROAD
PORTLAND, OR 97225

WEST TUALATIN VIEW ELEMENTARY SCHOOL - SITE PLAN

SCALE: 1"=60'-0"



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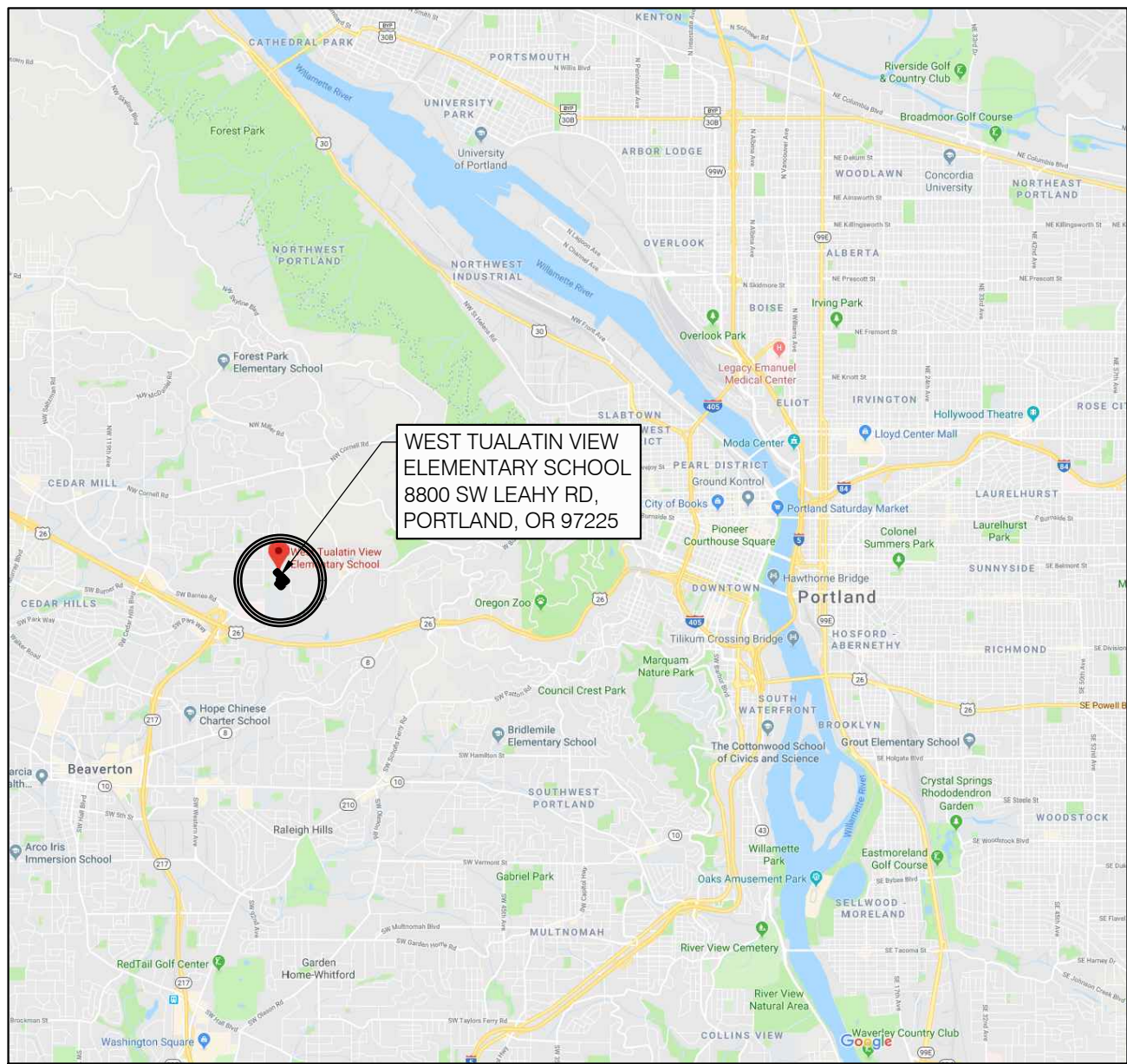


phase	Bid Documents
date	February 22, 2019
revisions	
project #	119190
	Site Plan Washington County

G1102

BEAVERTON SCHOOL DISTRICT WEST TUALATIN VIEW ELEMENTARY SCHOOL

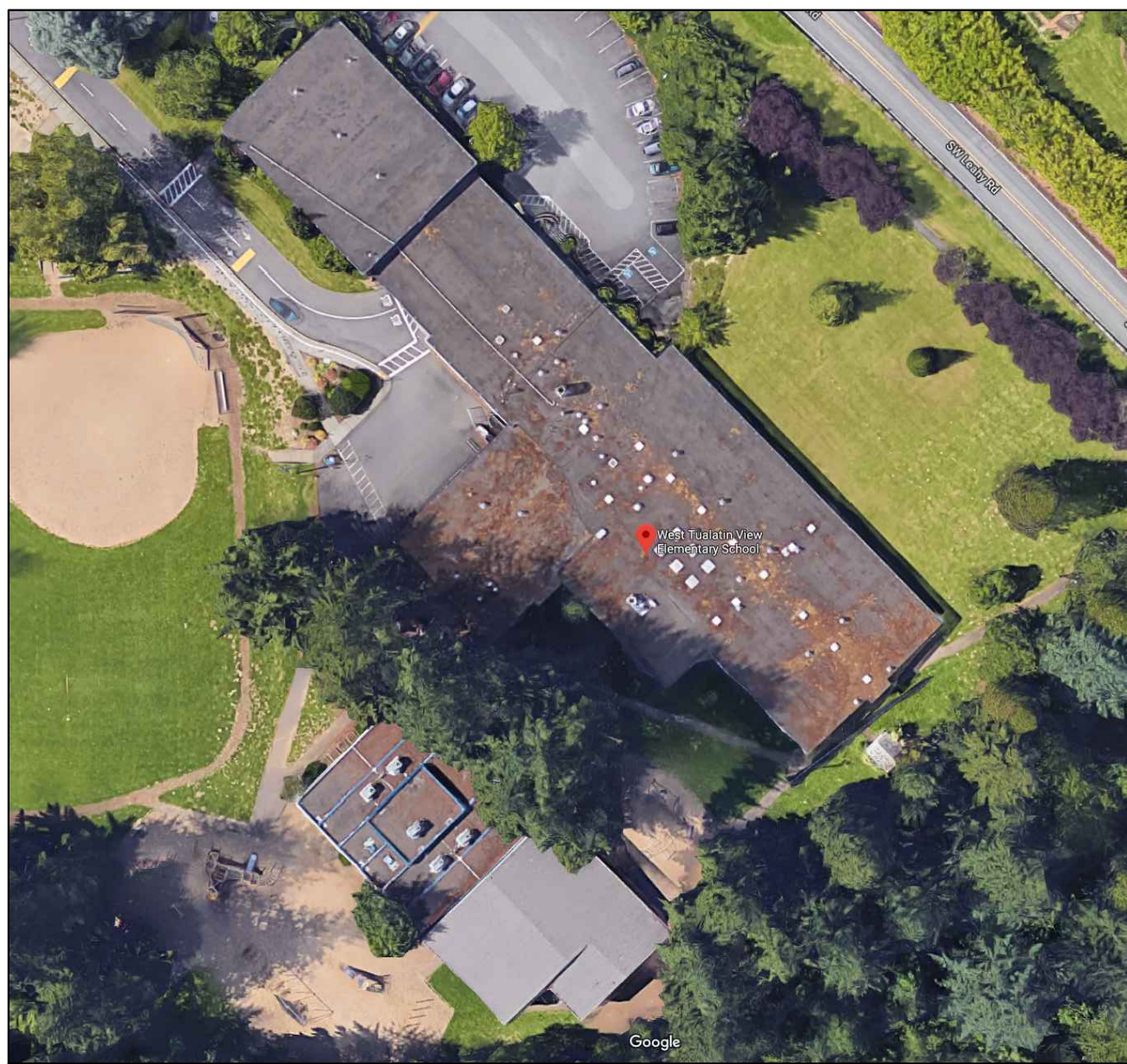
SITE MAPS



1 LOCATION MAP
SCALE: NTS



2 VICINITY MAP
SCALE: NTS



3 CAMPUS PLAN
SCALE: NTS

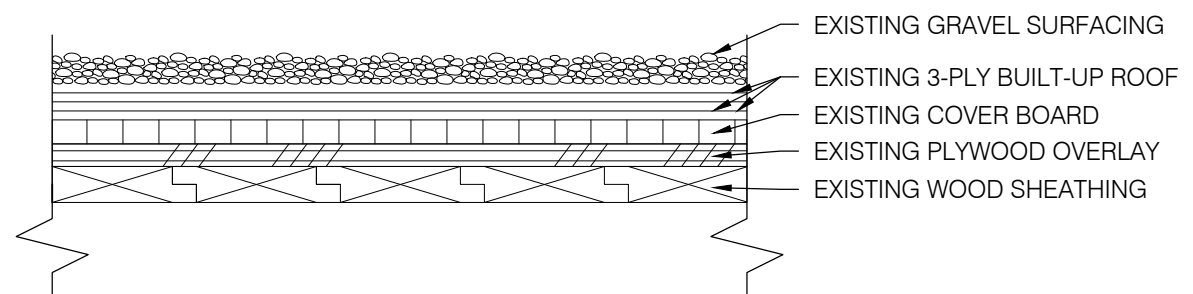
DRAWING SCHEDULE

GI-1	GENERAL INFORMATION
R100	OVERALL ROOF PLAN
R101	PARTIAL ROOF PLAN AREAS A, B & I
R102	PARTIAL ROOF PLAN AREAS C, D, E, F & G
R200	DETAILS
R201	DETAILS
R202	DETAILS
R203	DETAILS

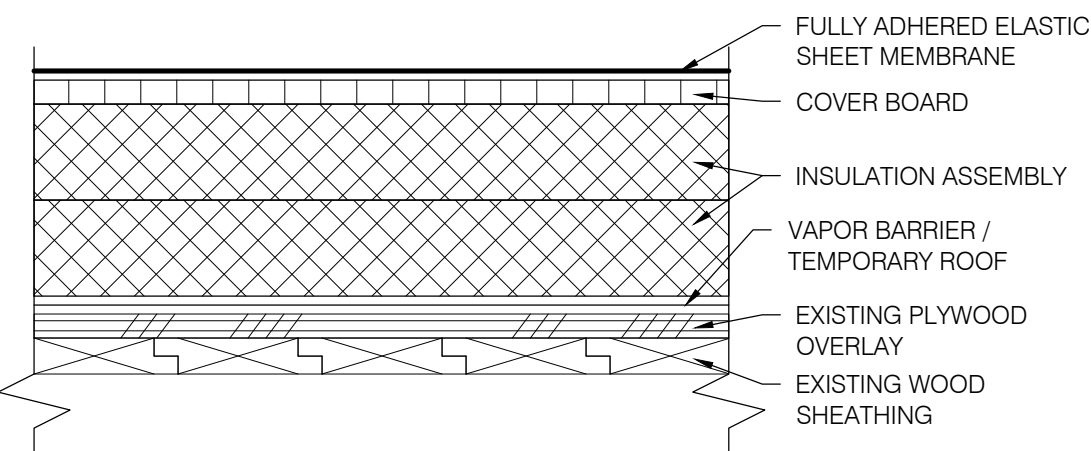
GENERAL NOTES

- CONTRACTOR IS RESPONSIBLE FOR VERIFYING ALL DIMENSIONS AND CONDITIONS OF THE PROJECT, INCLUDING VERIFICATION OF EXISTING ROOF SYSTEM CONSTRUCTION AND MATERIALS.
- CONTRACTOR STAGING AND STORAGE AREAS SHALL BE AS DIRECTED BY THE OWNER'S REPRESENTATIVE AT THE PRE-CONSTRUCTION MEETING. CONTRACTOR SHALL ASSUME A REASONABLE AMOUNT OF STORAGE AND STAGING SPACE WILL BE MADE AVAILABLE.
- CONTRACTOR SHALL BE RESPONSIBLE FOR PROTECTING BUILDING SURFACES, FINISHES, AND SYSTEMS FROM DAMAGE, DISCOLORATION, ETC. DURING THE COURSE OF ALL CONSTRUCTION ACTIVITIES.
- PERSONAL FALL PROTECTION DEVICES ARE NOT, NOR WILL BE, PROVIDED BY THE OWNER ON ANY ROOF AREA DESIGNATED TO RECEIVE WORK. PERSONAL FALL PROTECTION IS THE RESPONSIBILITY OF THE CONTRACTOR.
- EXISTING MATERIALS AND CONSTRUCTION ARE NOTED ON THE DRAWINGS AS EXISTING OR EXIST. ALL OTHER NOTATIONS INDICATE NEW MATERIALS, PRODUCTS, AND CONSTRUCTION UNLESS OTHERWISE STATED OR INDICATED.
- ALL CONSTRUCTION SHALL CONFORM TO THE 2014 OREGON STRUCTURAL SPECIALTY CODE, AND ALL LOCAL GOVERNING BUILDING CODES AND ORDINANCES.
- IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO LOCATE ALL EXISTING UTILITIES WHETHER SHOWN HEREIN OR NOT, AND TO PROTECT UTILITIES FROM DAMAGE. THE CONTRACTOR SHALL BEAR ALL EXPENSES OF REPAIR OR REPLACEMENT OF UTILITIES OR OTHER PROPERTY DAMAGED BY OPERATIONS IN CONJUNCTION WITH THE EXECUTION OF THE WORK.
- THIS PROJECT INCLUDES A BASE BID FOR A ROOF REPLACEMENT PROJECT AT ROOF AREAS A AND B AND AN ALTERNATE BID FOR ROOF AREAS C, D, E AND F INCLUDING, BUT NOT LIMITED TO THE FOLLOWING: REMOVAL OF EXISTING GRAVEL SURFACED BUILT-UP ROOF ASSEMBLY DOWN TO EXISTING SHEATHING, SHEATHING REPAIRS, PERIMETER WOOD NAILERS AND WOOD FRAMED PARAPET WALLS, DEMOLITION OF EXISTING ATTIC VENTILATION, ABANDONED UNITS AND DECOMMISSIONED MASONRY CHIMNEY AND COVERING OF EXISTING OPENINGS, MODIFICATION OF THROUGH ROOF PENETRATIONS AND CURBS TO ESTABLISH REQUIRED CLEARANCES ABOVE FINISHED ROOF INCLUDING DISCONNECTION AND RE-CONNECTION OF MECHANICAL UNITS, REPLACEMENT OF UNIT SKYLIGHTS, INSTALLATION OF VAPOR BARRIER / TEMPORARY ROOF, INSTALLATION OF DECK LEVEL RIGID INSULATION AND COVER BOARD, INSTALLATION OF FULLY ADHERED 90-MIL EPDM SINGLE PLY ROOFING MEMBRANE, REMOVAL AND REPLACEMENT OF ROOF RELATED SHEET METAL FLASHINGS AND TRIM, REMOVAL AND REPLACEMENT OF EXTERIOR HANGING GUTTERS AND DOWNSPOUTS, INSTALLATION OF FALL PROTECTION ANCHORS, INSTALLATION OF ACCESS LADDERS, STUCCO AND METAL PANEL CLADDING ASSEMBLIES. WORK DOES NOT INCLUDE ANY INCREASE IN AREA OR CHANGES IN OCCUPANCY.
- ROOF ACCESS BY MEANS OF EXTERNAL STAIR TOWER / SCAFFOLDING, LADDERS, EXTERNAL LIFT, OR OTHER APPROVED DEVICE - PROVIDED BY CONTRACTOR.

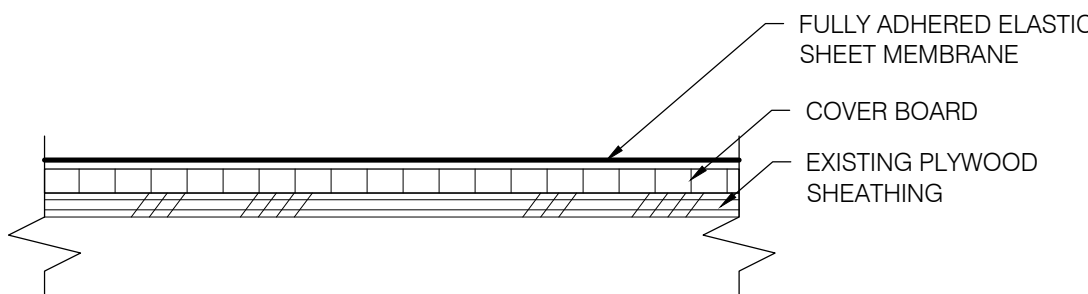
ROOF SYSTEM ASSEMBLIES



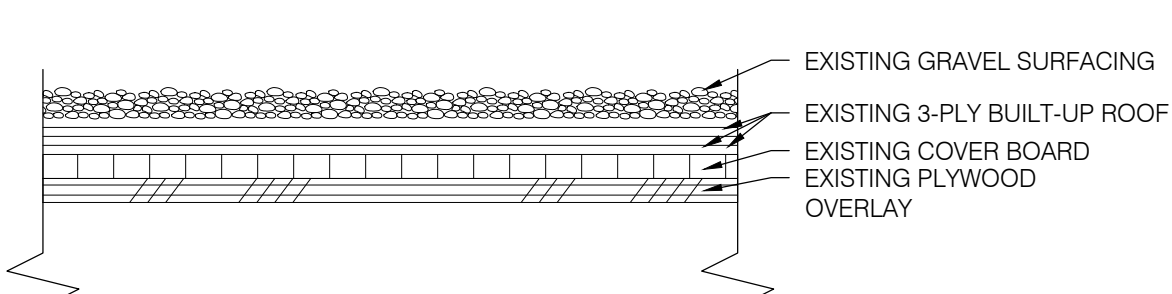
4 EXISTING ROOF ASSEMBLY
ROOF AREA A & B (BASE BID)
SCALE: 3" = 1'-0"



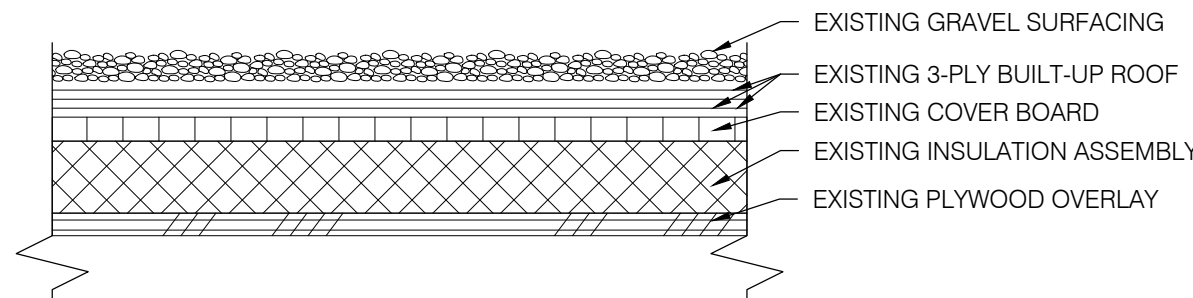
5 NEW ROOF ASSEMBLY
ROOF AREA A & B (BASE BID)
SCALE: 3" = 1'-0"



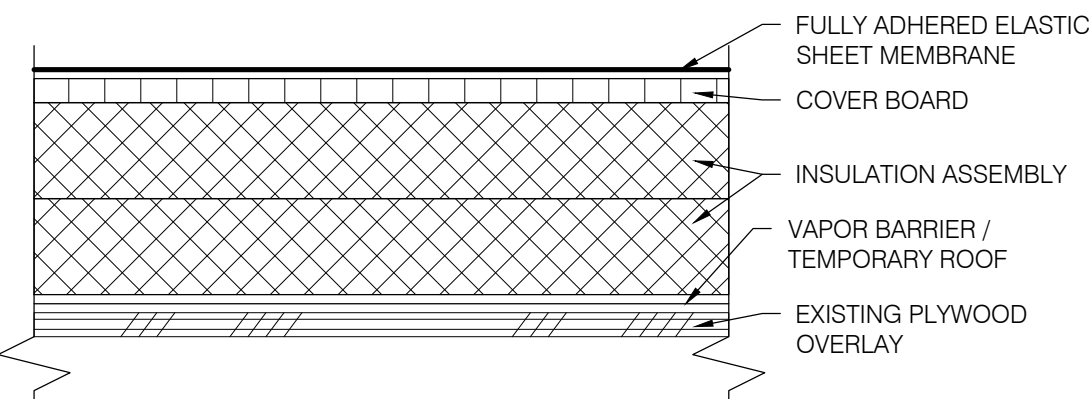
6 NEW ROOF ASSEMBLY
ROOF AREA C & D (ALTERNATE BID)
SCALE: 3" = 1'-0"



7 EXISTING ROOF ASSEMBLY
ROOF AREA C & D (ALTERNATE BID)
SCALE: 3" = 1'-0"



8 EXISTING ROOF ASSEMBLY
ROOF AREA E & F (ALTERNATE BID)
SCALE: 3" = 1'-0"



9 NEW ROOF ASSEMBLY
ROOF AREA E & F (ALTERNATE BID)
SCALE: 3" = 1'-0"

PROJECT TEAM

OWNER

Beaverton School District
16550 SW Merlo Rd
Beaverton Oregon 97006
tel: (503) 591-4255 cell: (630) 726-2179
fax: (503) 591-4475
Contact: Michael Lamberty

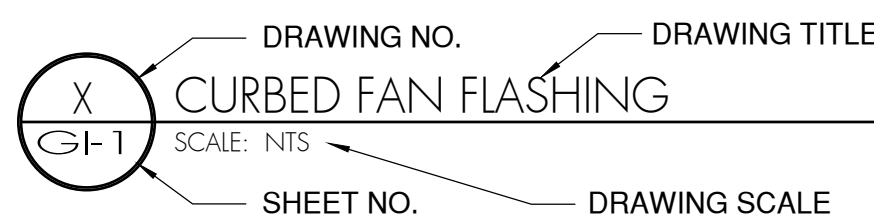
ARCHITECT

DOWA / IBI Group
907 SW Harvey Milk St.
Portland, Oregon 97205
tel: (503) 226-6950
Contact: Jim Fitzpatrick

ROOF CONSULTANT

Professional Roof Consultants, Inc.
1108 SE Grand Ave., Suite 300
Portland, Oregon 97214
tel: (503) 280-8759
fax: (503) 280-8866
Contact: Jose Ponce, RRO

DRAWING SYMBOLS



REPAIR NOTE REFERENCE

DETAIL REFERENCE ON PLAN
DRAWINGS - SIM. INDICATES
SIMILAR CONSTRUCTION AS
SHOWN ON DETAIL NOTED.

KEY NOTE REFERENCE

DRAWING REVISION

WEST TUALATIN VIEW ELEMENTARY SCHOOL REROOF

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phase Bid Documents

date February 22, 2019

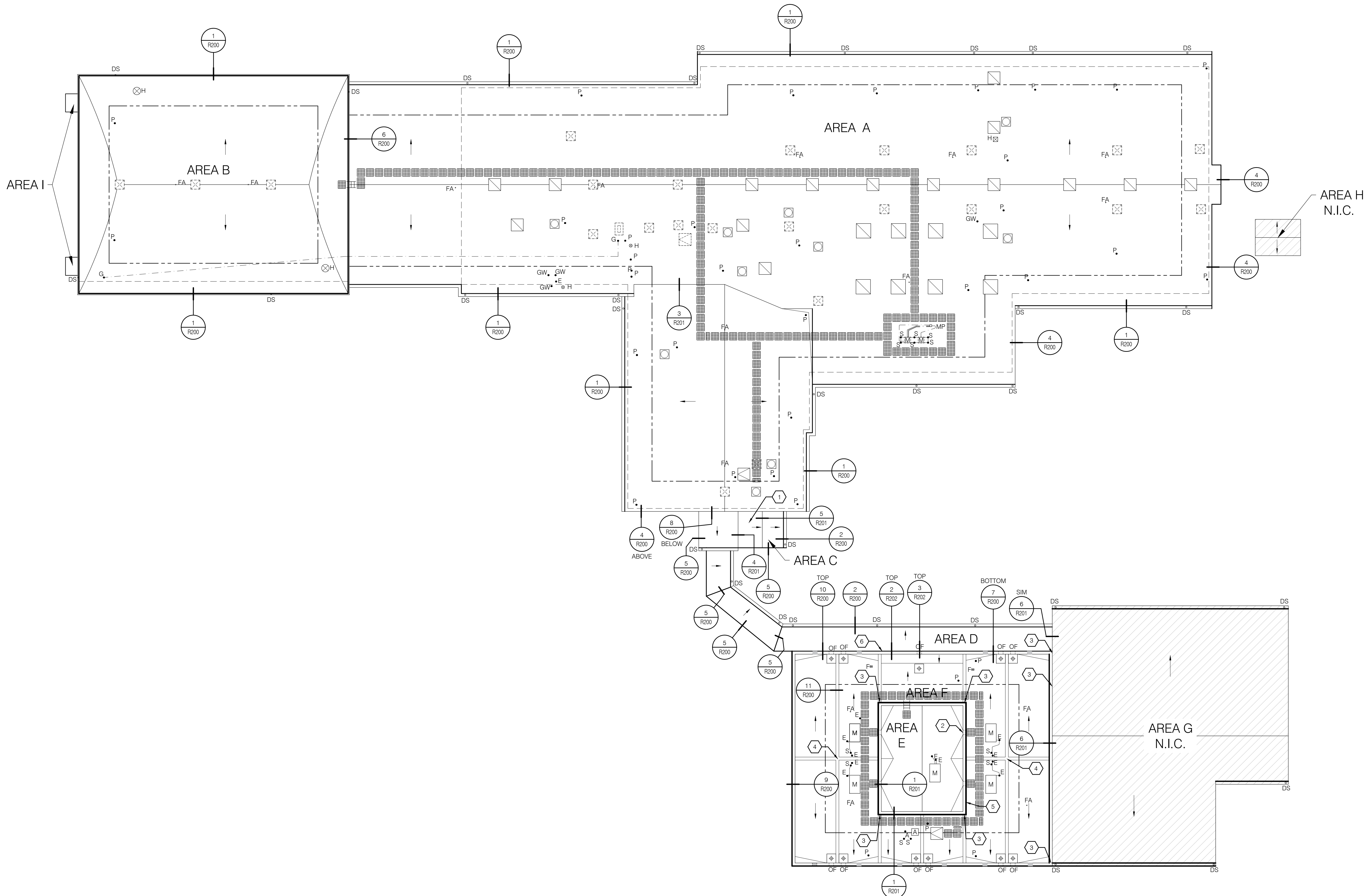
revisions

project # 119190

General Information

GI-1

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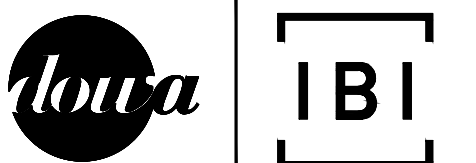


LEGEND

- 5 R203 EXISTING ABANDONED PENETRATION - DEMO AND CLOSE
- 5 R203 EXISTING OPENING PER STRUCTURAL
- 5 R203 EXISTING ELECTRICAL PENETRATION
- 5 R203 EXISTING GAS PENETRATION
- 5 R203 EXISTING GUY WIRE PROVIDE ROOF MANUFACTURER APPROVED FLASHING DETAIL
- 5 R203 EXISTING VENT PIPE PENETRATION
- 5 R203 EXISTING STRUCTURAL PENETRATION
- 5 R203 MULTI-PIPE PENETRATION
- 5 R203 FALL PROTECTION ANCHOR
- 5 R203 EXISTING CURBED VENT (HOT)
- 5 R203 EXISTING FLANGED PENETRATION (HOT)
- 5 R203 EXISTING FLANGED PENETRATION
- 5 R203 GUTTER DOWNSPOUT
- 5 R203 OVERFLOW SCUPPER
- 5 R203 UNIT SKYLIGHT
- 5 R203 EXISTING CURBED MECHANICAL UNIT
- 5 R203 EXISTING CURBED FAN UNIT
- 5 R203 EXISTING ROOF DRAIN
- 5 R203 EXISTING CURBED VENT
- 5 R203 EXISTING MECHANICAL UNITS - DEMO EXISTING CURBS AND RAISE UNIT ONTO ELEVATED STANDS ATTACHED PER STRUCTURAL DRAWINGS
- 5 R203 NEW OR EXISTING ROOF ACCESS HATCH - RAISE TO ESTABLISH REQUIRED CLEARANCE ABOVE FINISHED ROOF
- 5 R203 ROOF ACCESS LADDER - REMOVE AND REPLACE ATTACH PER STRUCTURAL DRAWINGS
- 5 R203 EXISTING CONDUIT OVER ROOF - RAISE TO ACCOMMODATE HEIGHT OF NEW ROOF ASSEMBLY AND PLACE ON PIPE SUPPORTS - BASIS OF DESIGN: 60% HEIGHT ADJUSTABLE STRUT PIPE SUPPORT OR APPROVED
- 5 R203 INDICATES DIRECTION OF EXISTING ROOF SLOPE
- 5 R203 HATCHED AREA INDICATE ROOF AREA NOT IN CONTRACT
- 5 R203 DECOMMISSIONED CHIMNEY DEMO TO BELOW ROOF DECK COVER SHEATHING OPENING PER STRUCTURAL
- 5 R203 DECOMMISSIONED LADDER REPAIR PENETRATIONS TO ESTABLISH WATERTIGHT INTEGRITY MATCH EXISTING FINISHES AS NECESSARY
- 5 R203 DECOMMISSIONED OVERFLOW SCUPPER OPENING CLOSE EXISTING OPENING WITH 1/2 INCH PLYWOOD SHEATHING ON BOTH SIDES OF OPENING MATCH EXISTING STUCCO
- 5 R203 DECOMMISSIONED ACCESS HATCH DEMO AND CLOSE SHEATHING OPENING PER STRUCTURAL
- 5 R203 PERIMETER WARNING LINE
- 5 R203 DECOMMISSIONED ATTIC VENTS DEMO AND CLOSE SHEATHING OPENING PER STRUCTURAL DRAWINGS
- 5 R203 WALK PADS

KEY NOTES

- REMOVE EXISTING METAL PANEL ROOF SYSTEM
- RESIZE ALL FOUR EXISTING PRIMARY SCUPPER OPENINGS AT ROOF AREA E TO ESTABLISH A 4' HEIGHT X 7' WIDTH ROUGH OPENING. INFILL EXISTING OPENING WITH NEW SHEATHING AS NECESSARY.
- PROVIDE 24 GAUGE STAINLESS STEEL SADDLE FLASHINGS WITH SOLDERED SEAMS AT PARAPET AND DIVIDING WALL VERTICAL INTERFACE TERMINATIONS. REFERENCE 11/R203.
- PROVIDE ONE PIECE FOUR WAY INTERSECTION SHEET METAL COPING PIECE. CONNECT TO STRAIGHT SECTIONS WITH STANDING SEAM. REFERENCE 10/R203.
- DEMO AND REPLACE EXISTING METAL WALL PANEL CLADDING REFERENCE DETAILS.
- DEMO EXISTING METAL WALL PANEL REMOVE ALL PROTRUSIONS AND SURFACE IRREGULARITIES TO ESTABLISH A SUITABLE SUBSTRATE FOR APPLICATION OF WEATHER BARRIER SYSTEM. PRIME SUBSTRATE PRIOR TO INSTALLING WATER RESISTIVE BARRIER.



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WEST TUALATIN VIEW ELEMENTARY SCHOOL REROOF

Beaverton School District

16550 SW Merlo Road
Beaverton, Oregon 97003
t: (503) 591-8000

phase | Bid Documents

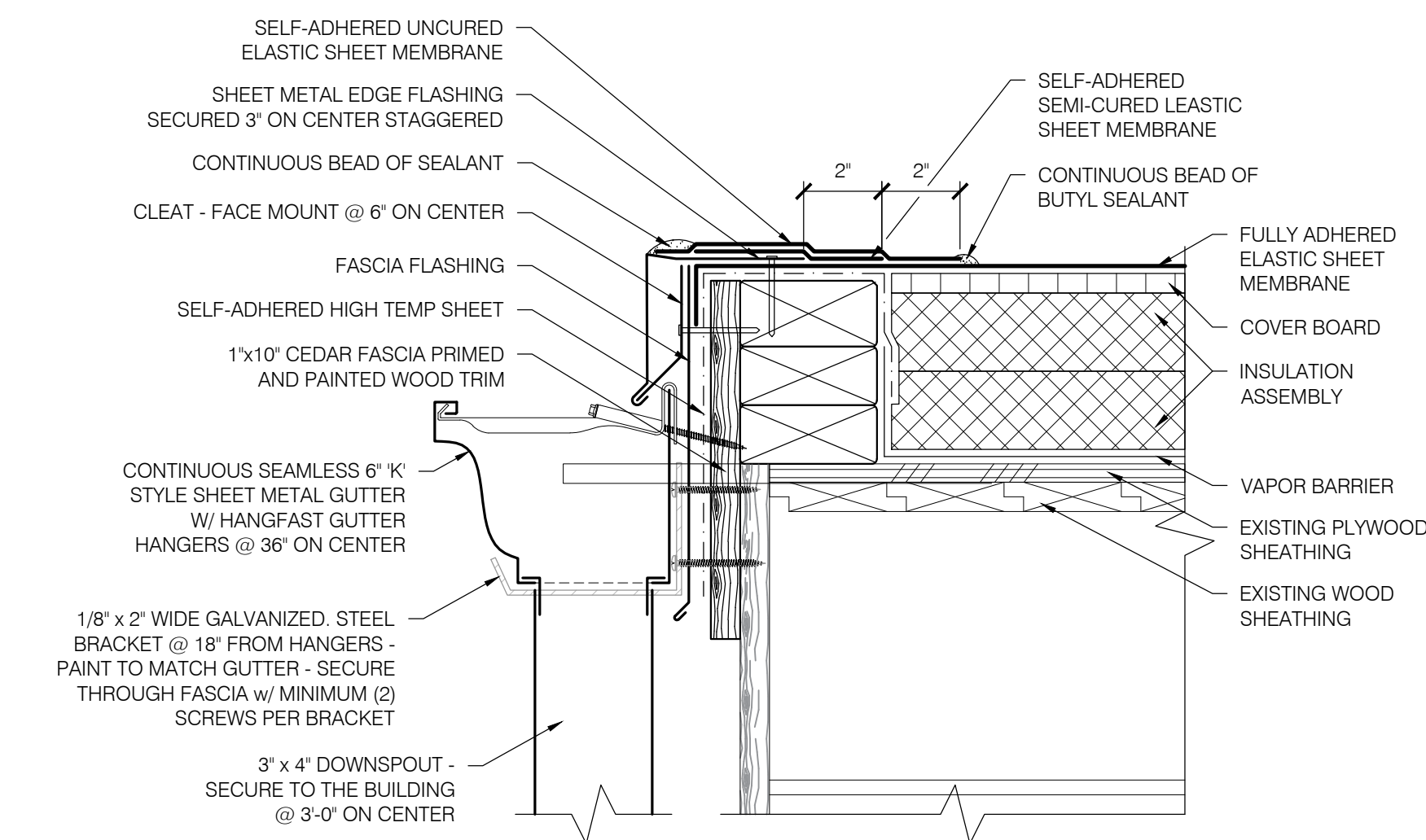
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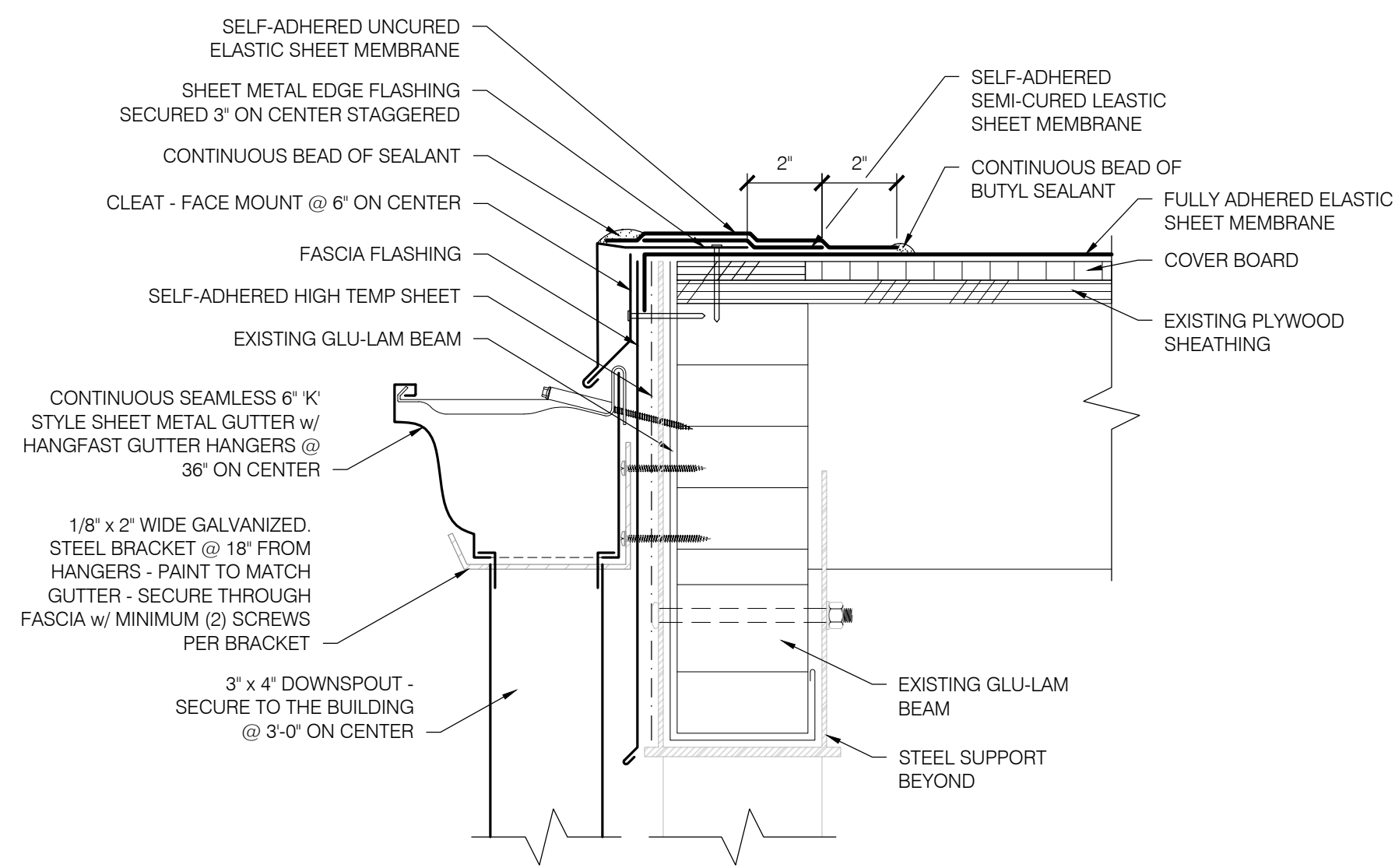
project # | 119190

OVERALL ROOF PLAN

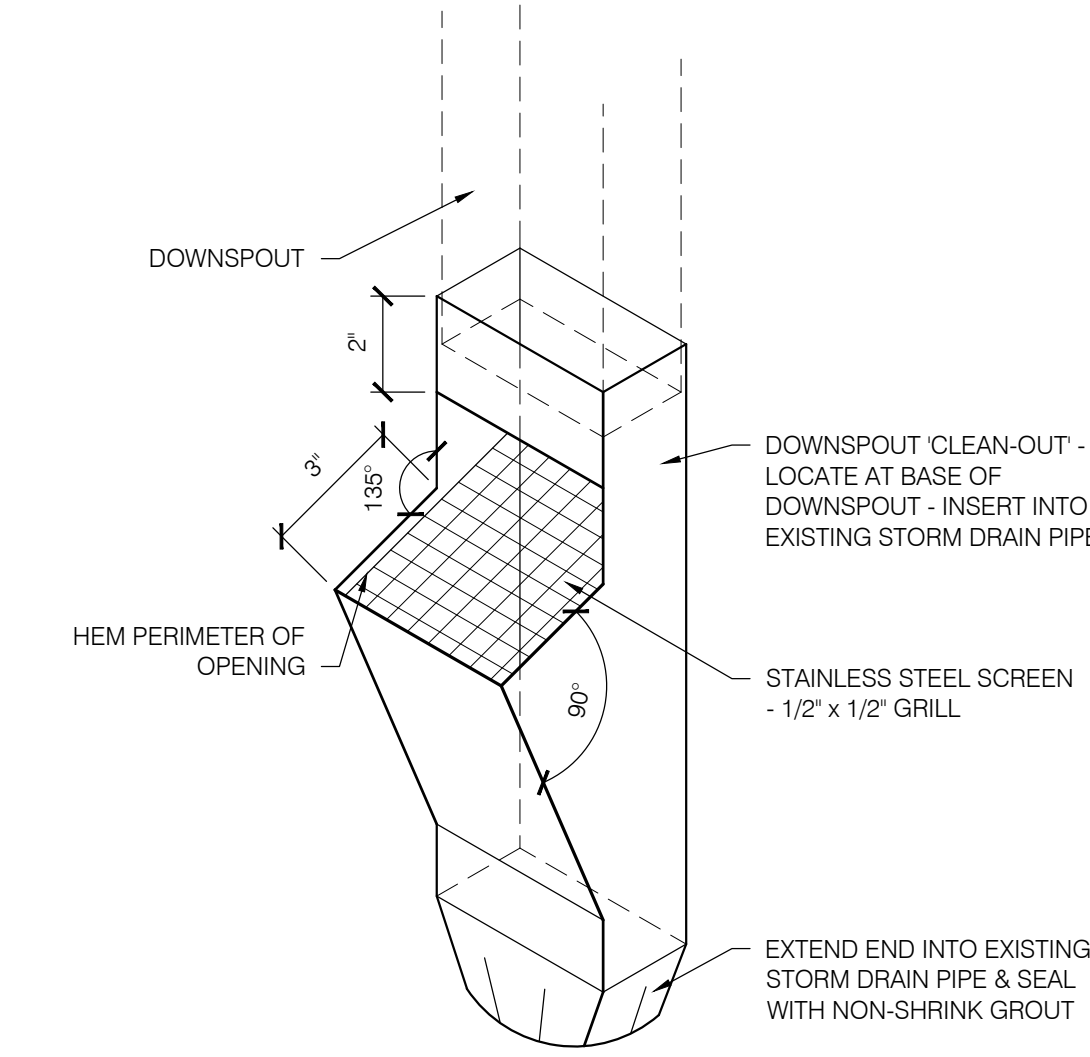
R100



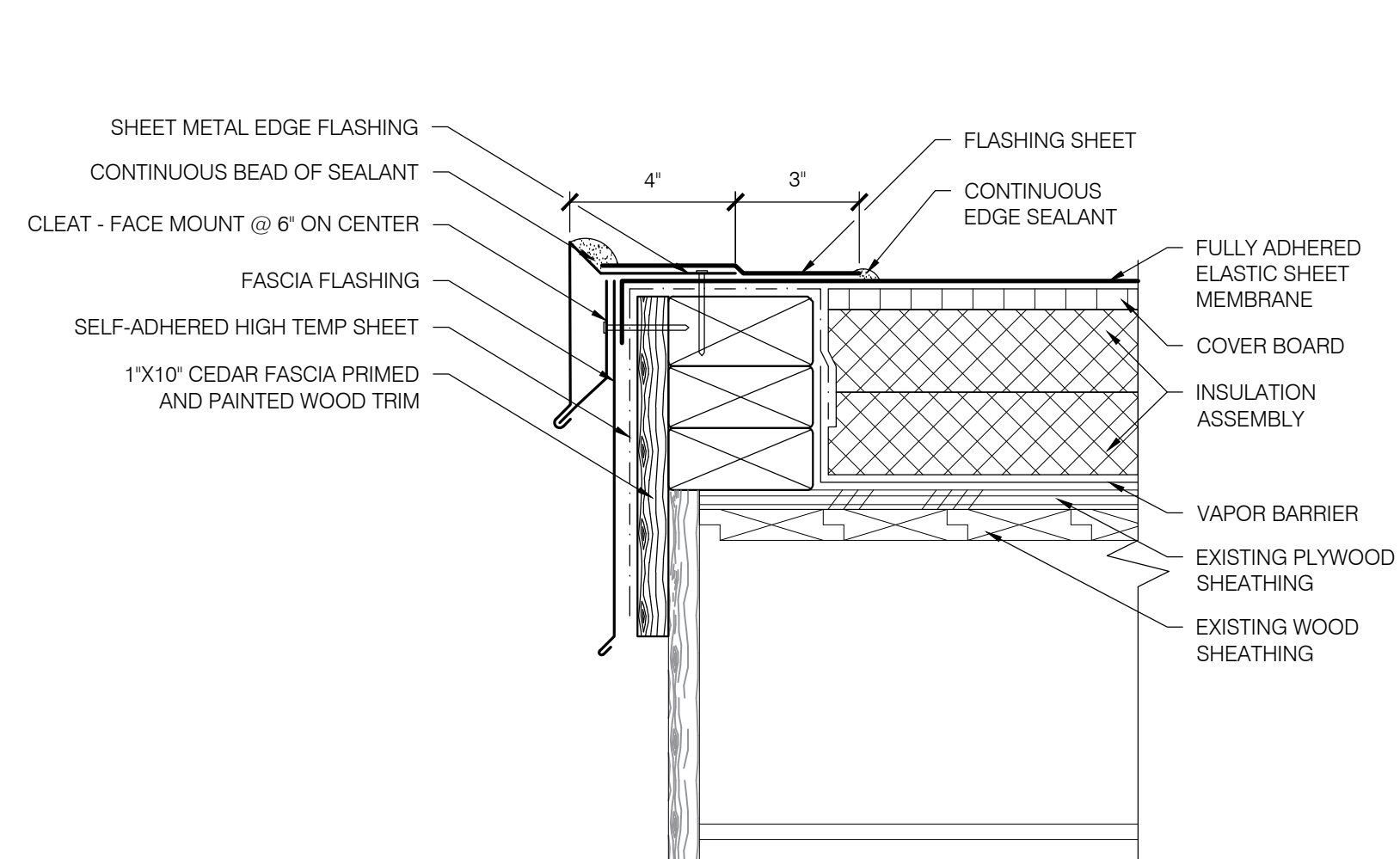
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R200 SCALE: 3" = 1'-0"



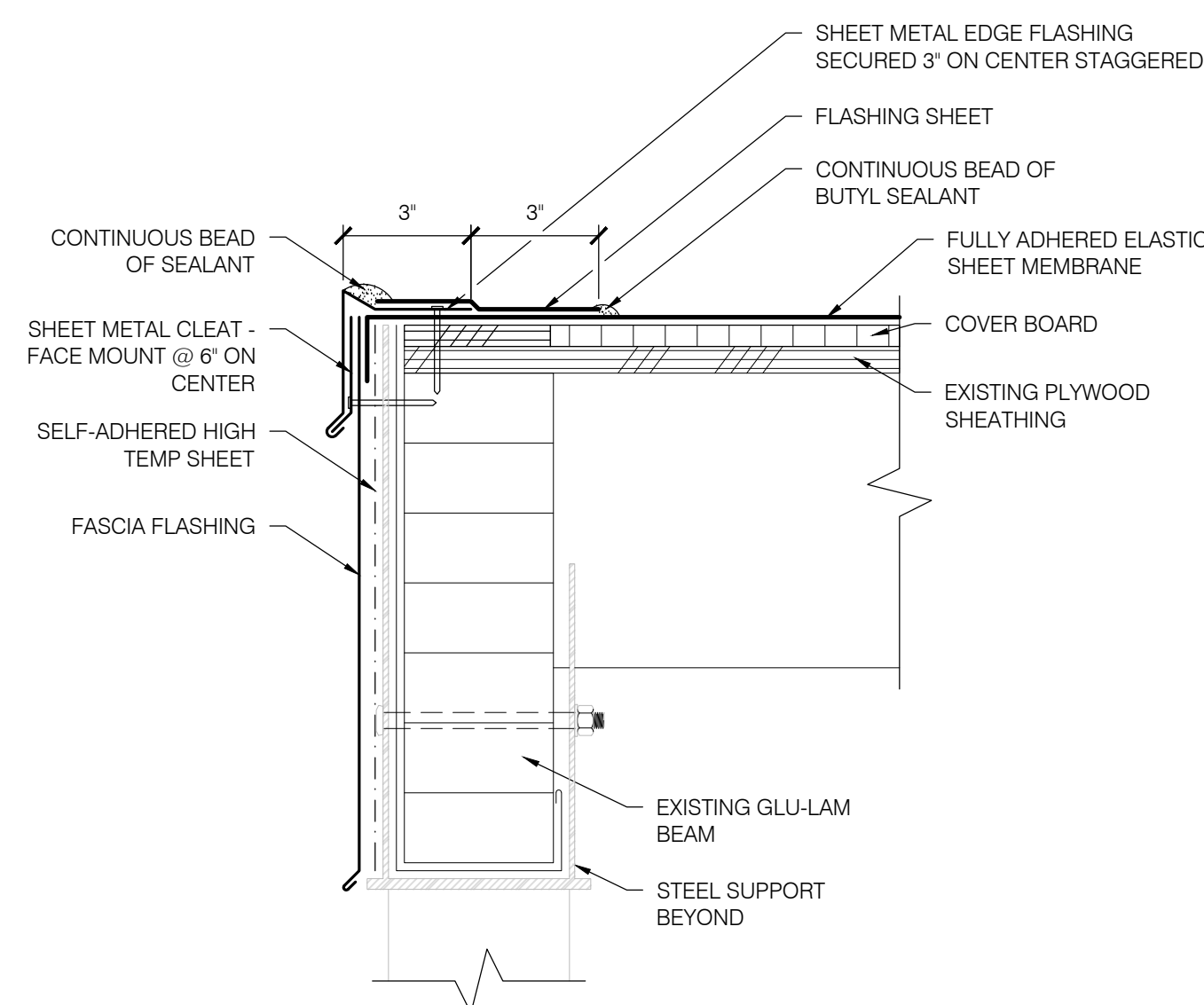
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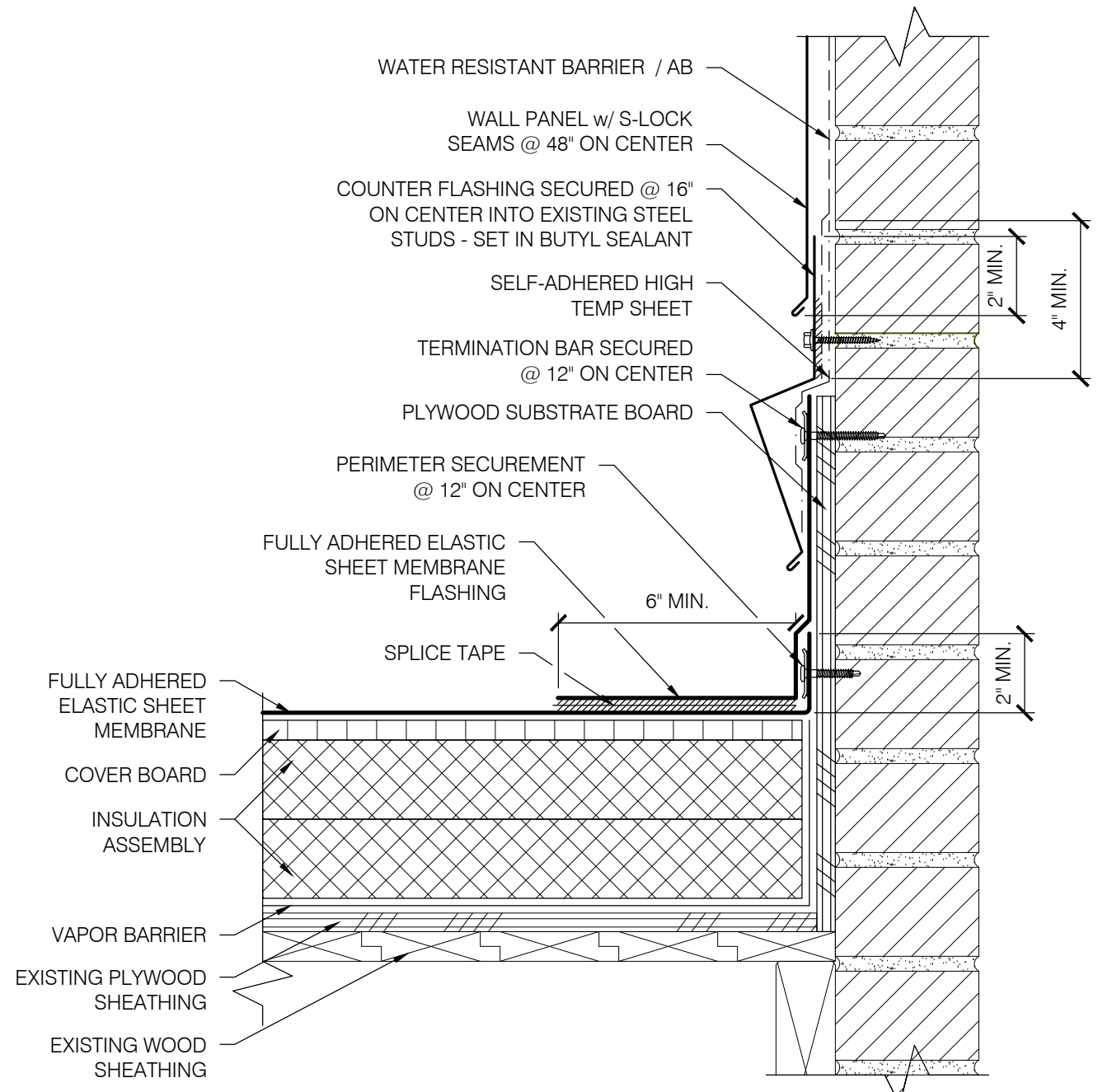
3 DOWNSPOUT CLEAN-OUT
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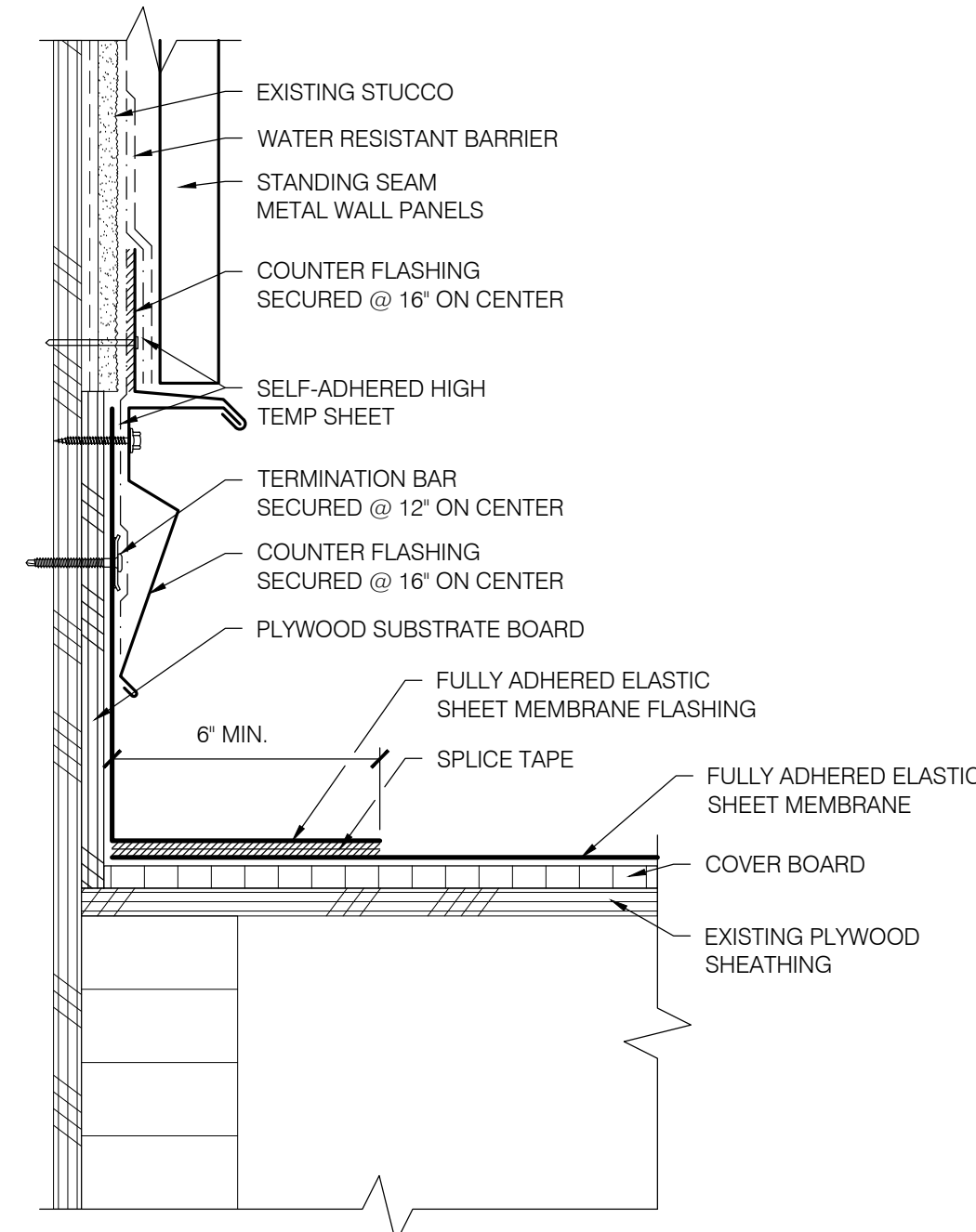
4 RAKE EDGE
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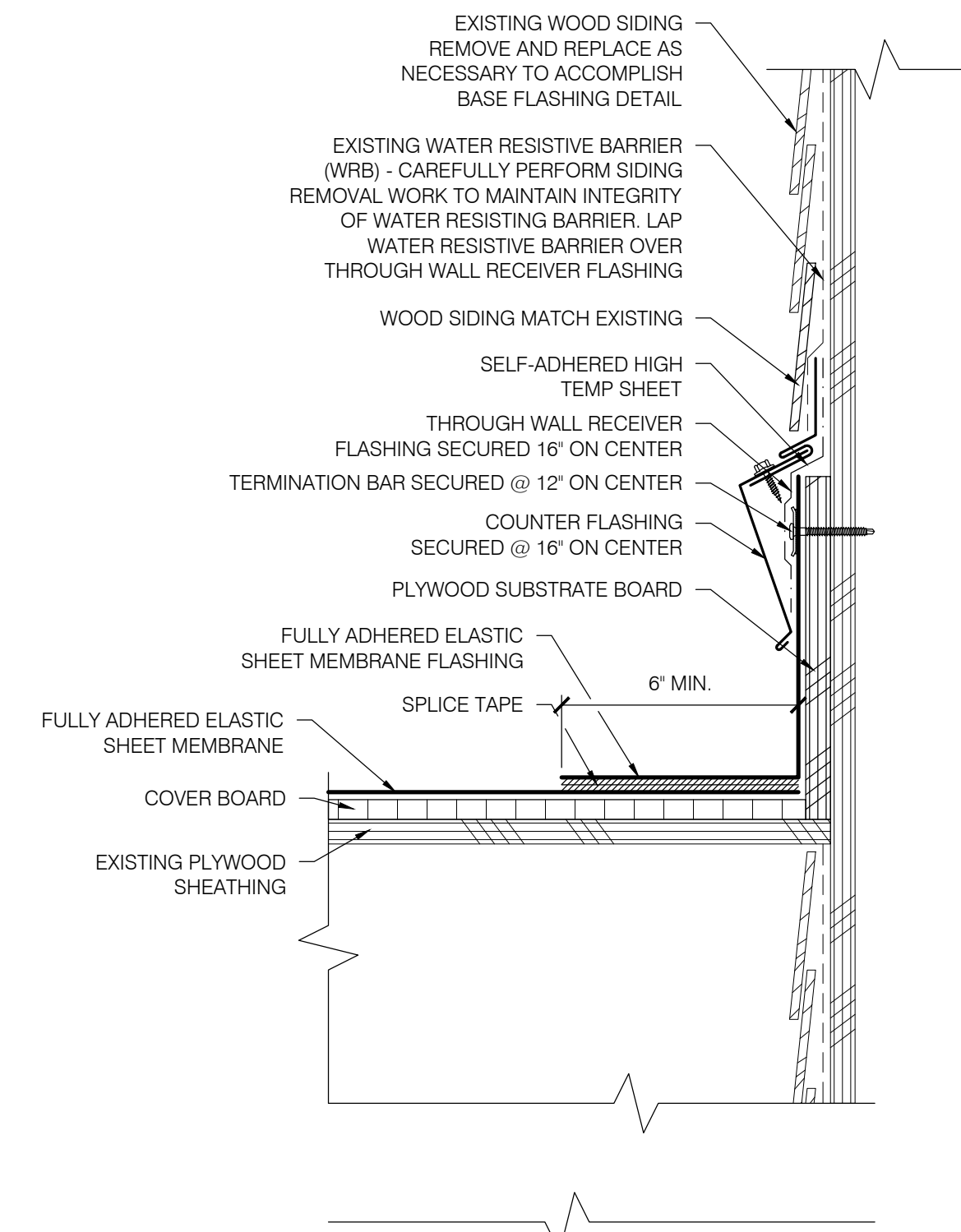
5 RAKE EDGE
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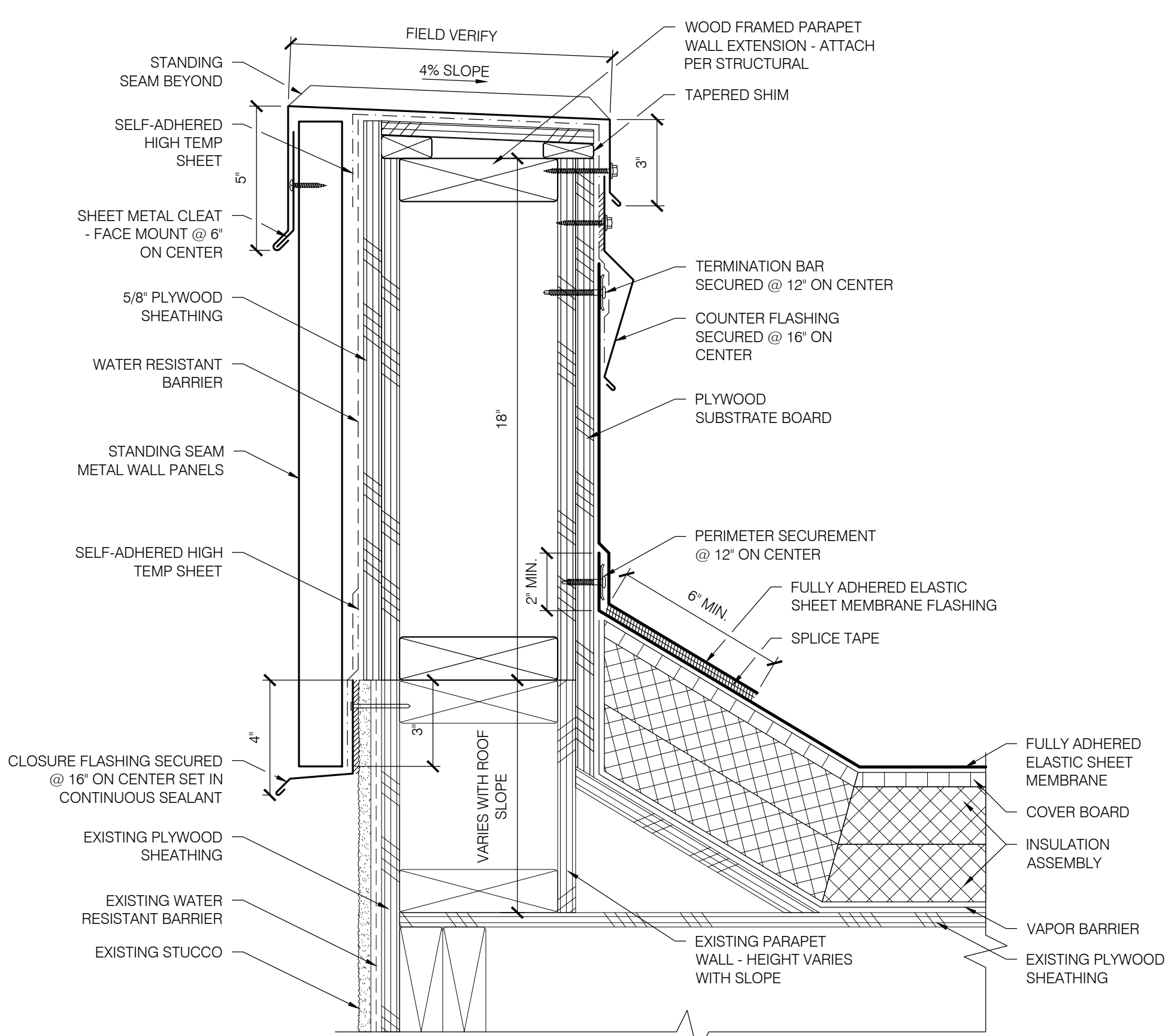
6 HIGH WALL BASE FLASHING
R200 SCALE: 3" = 1'-0"



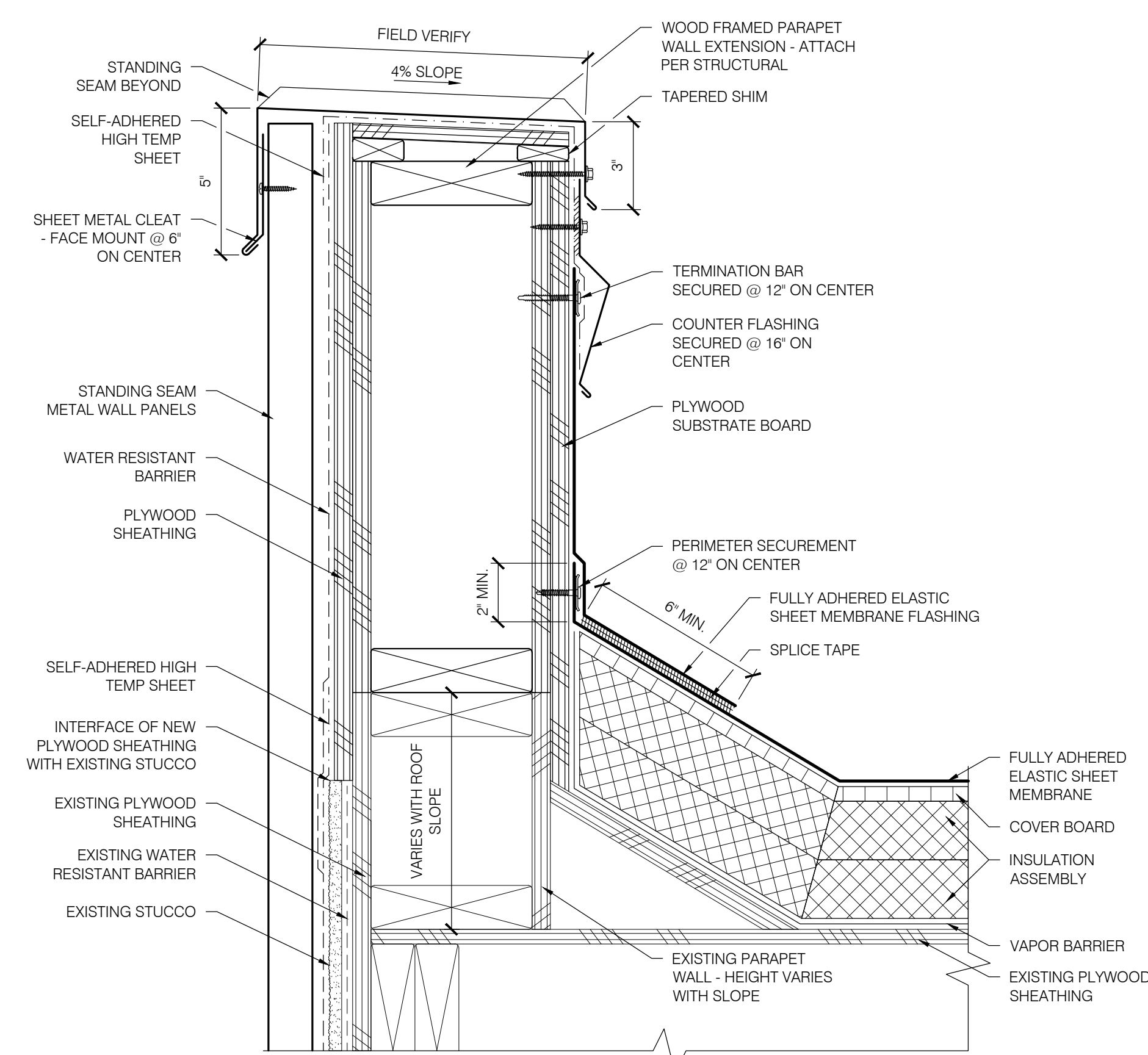
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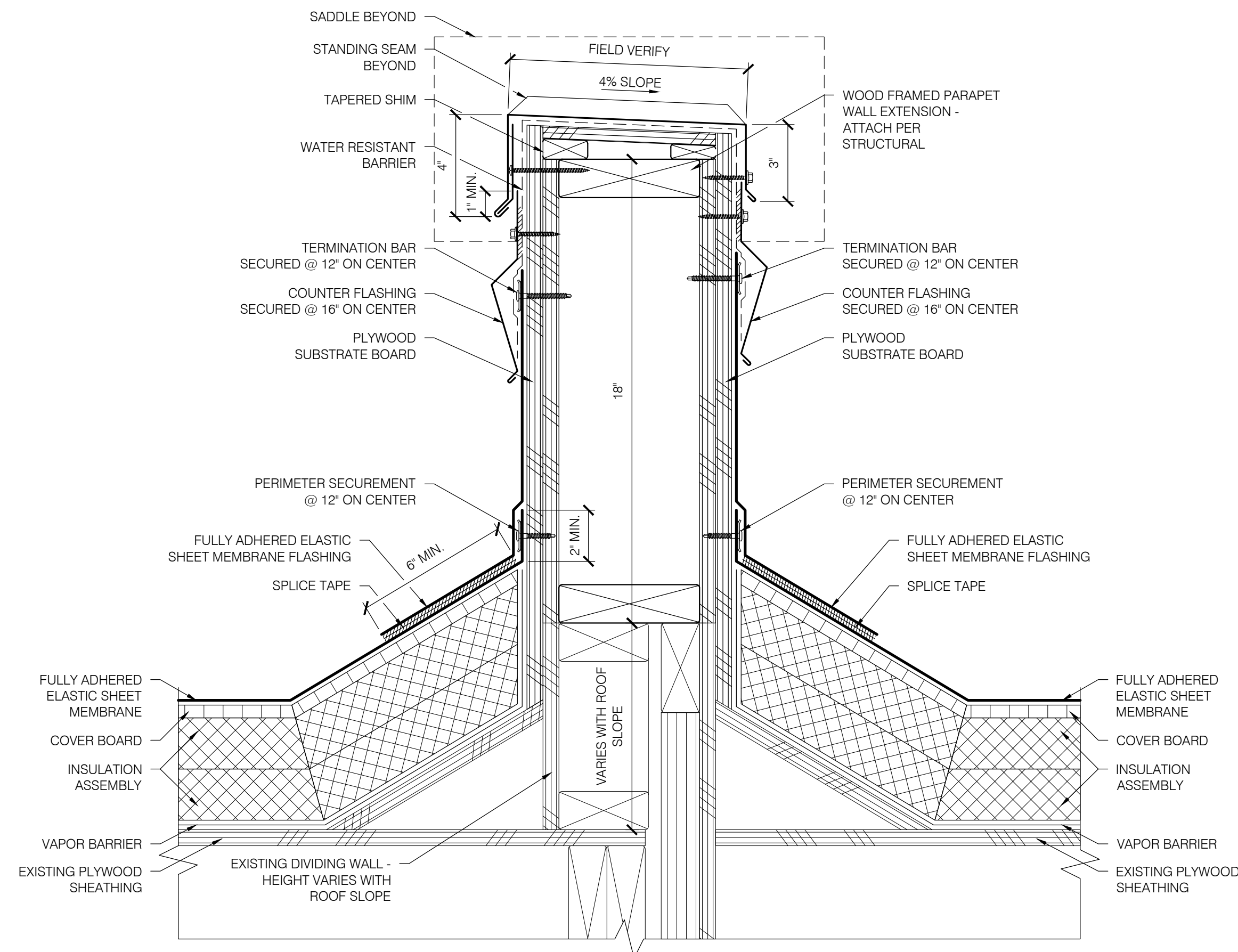
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R200 SCALE: 3" = 1'-0"



9 PARAPET WALL
R200 SCALE: 3" = 1'-0"



10 PARAPET WALL
R200 SCALE: 3" = 1'-0"



11 DIVIDING WALL
R200 SCALE: 3" = 1'-0"

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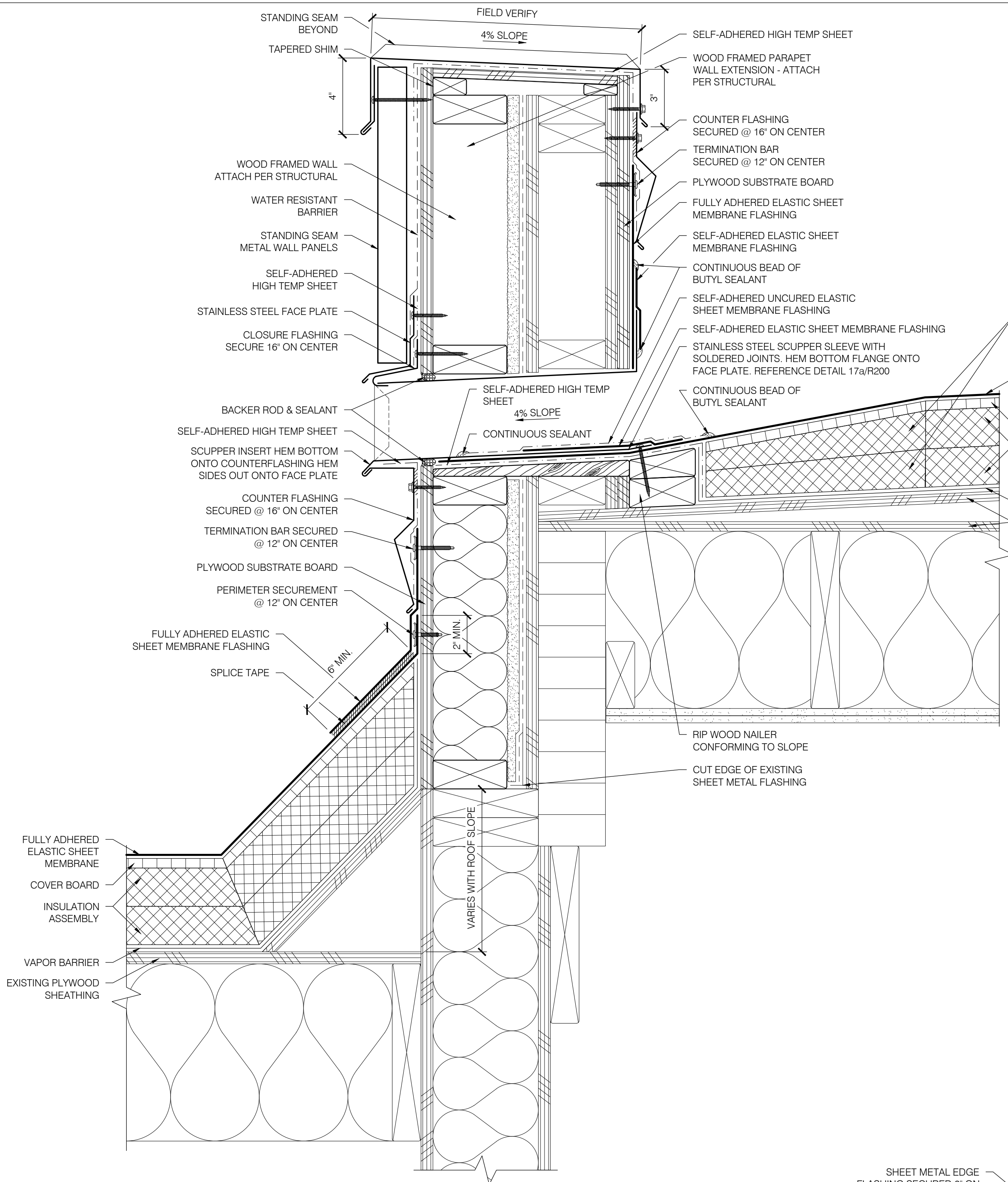


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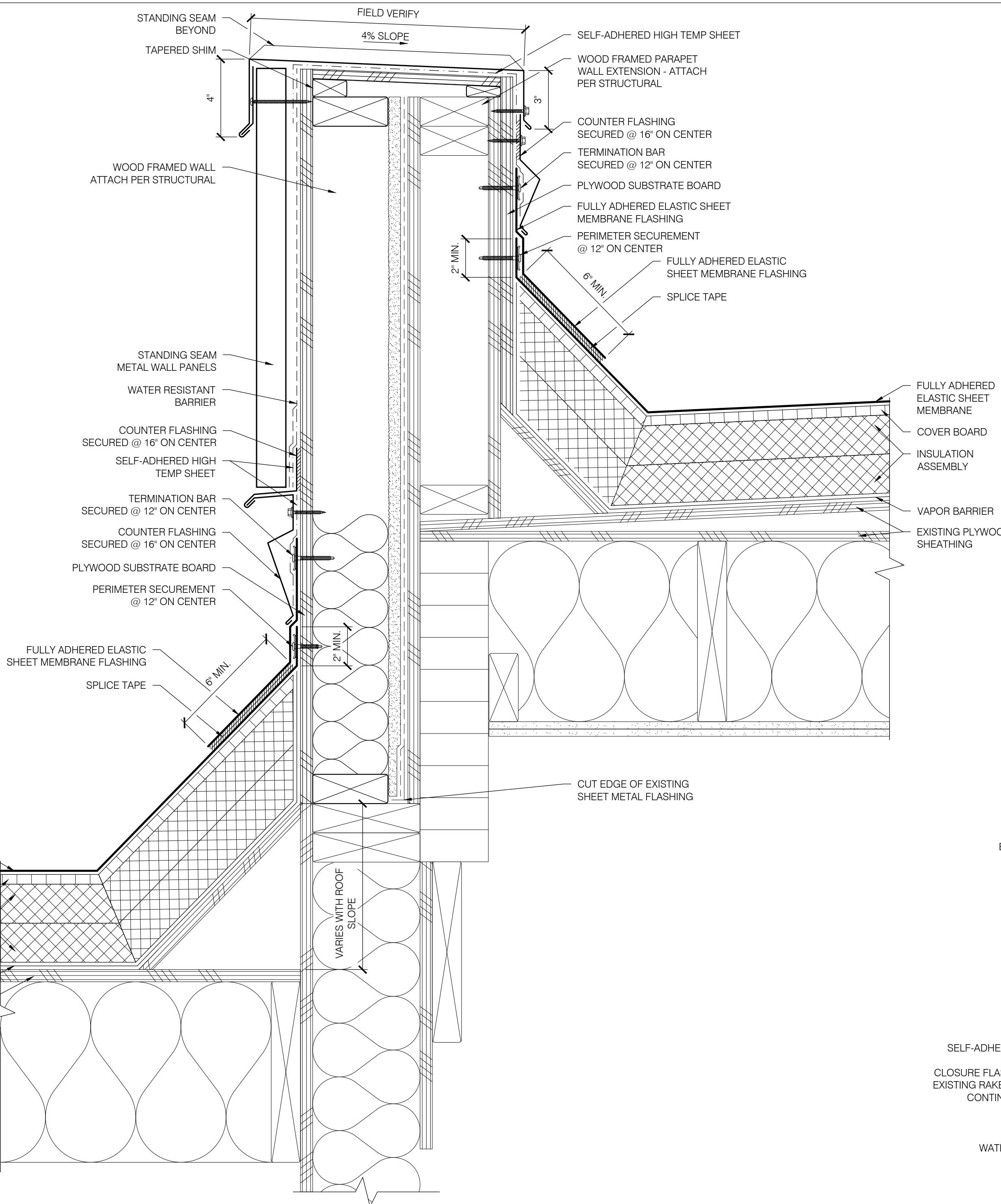
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Details

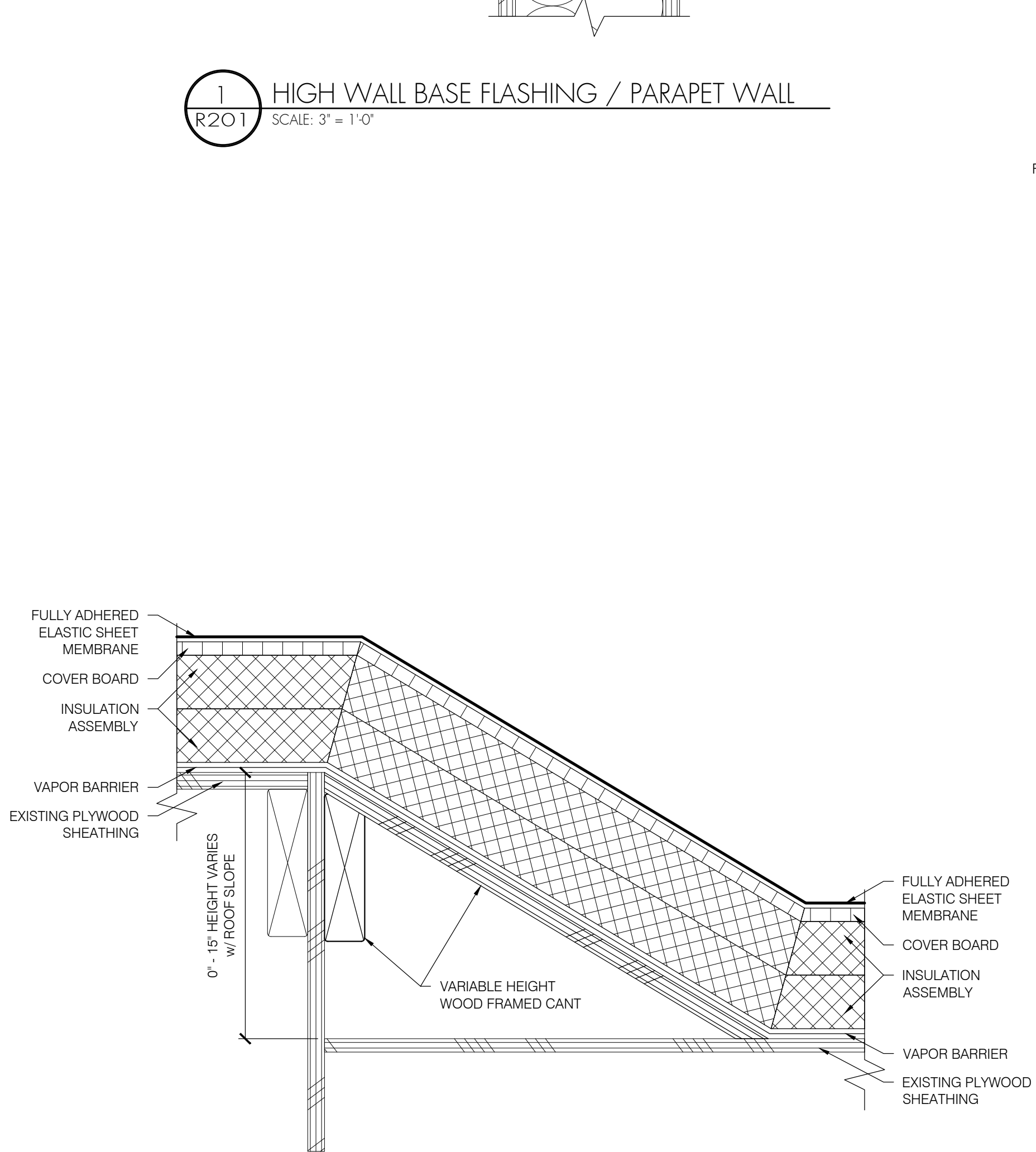
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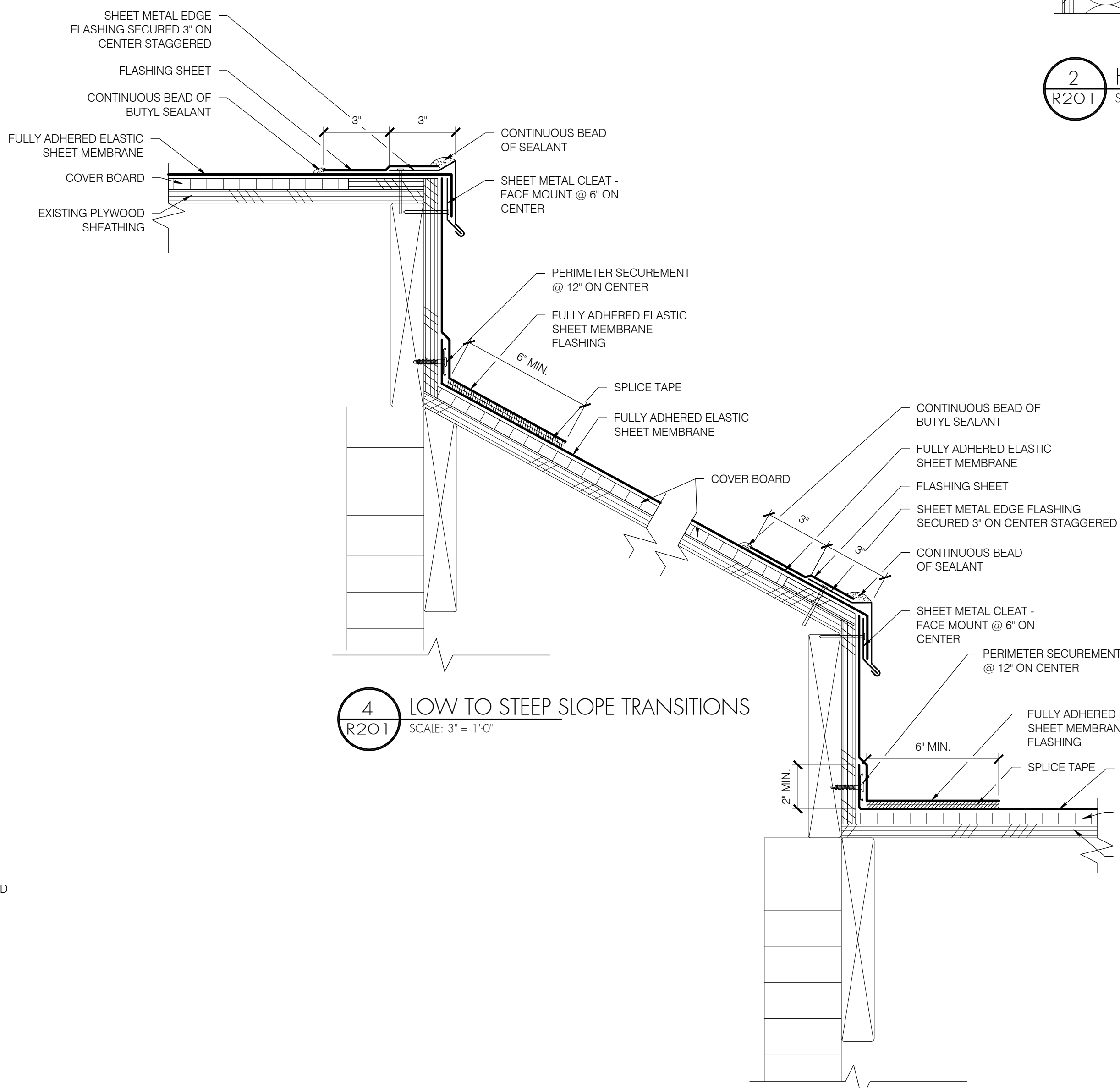
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SCALE: 3" = 1'-0"



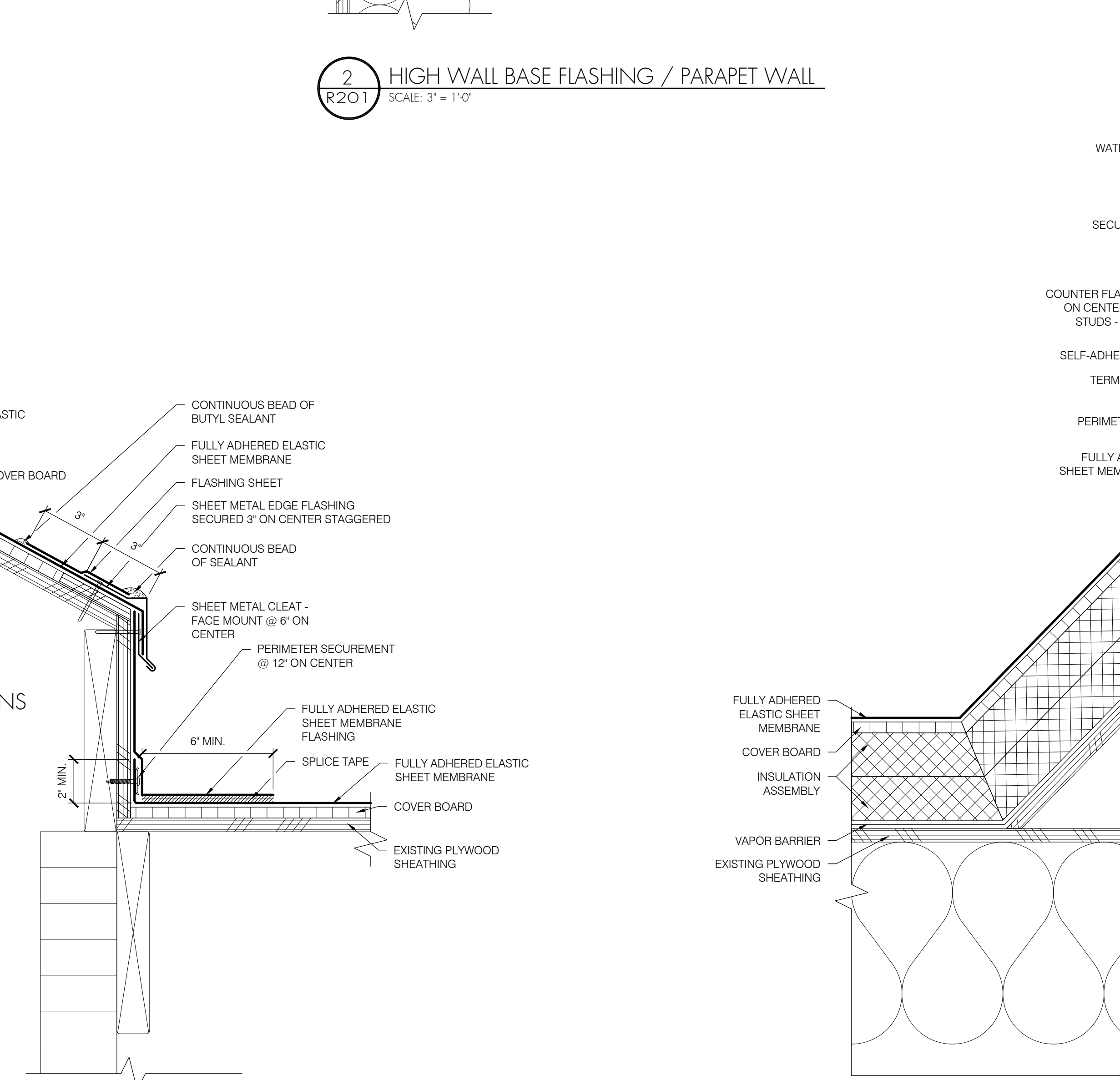
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SCALE: 3" = 1'-0"



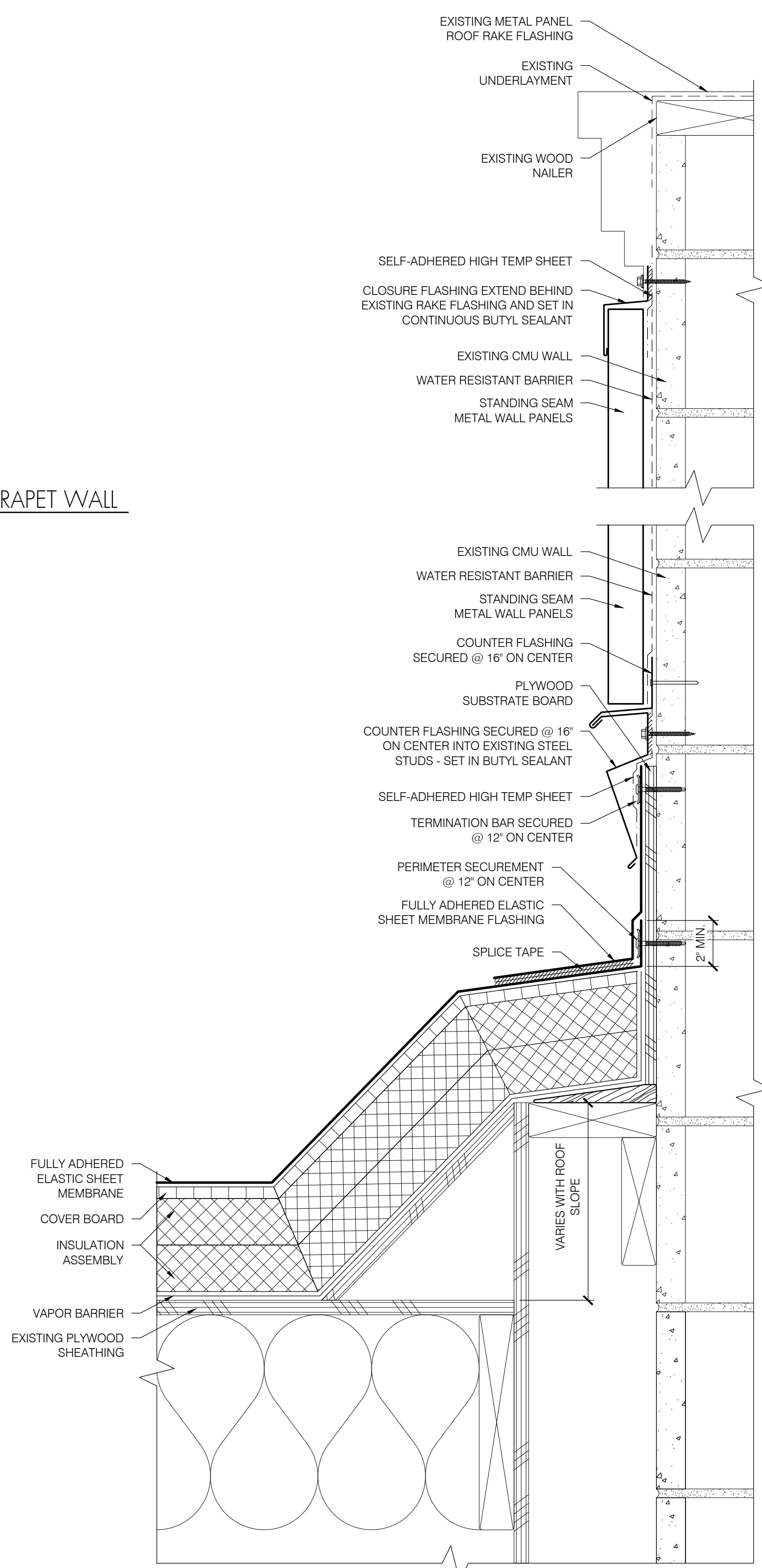
3 TRANSITION
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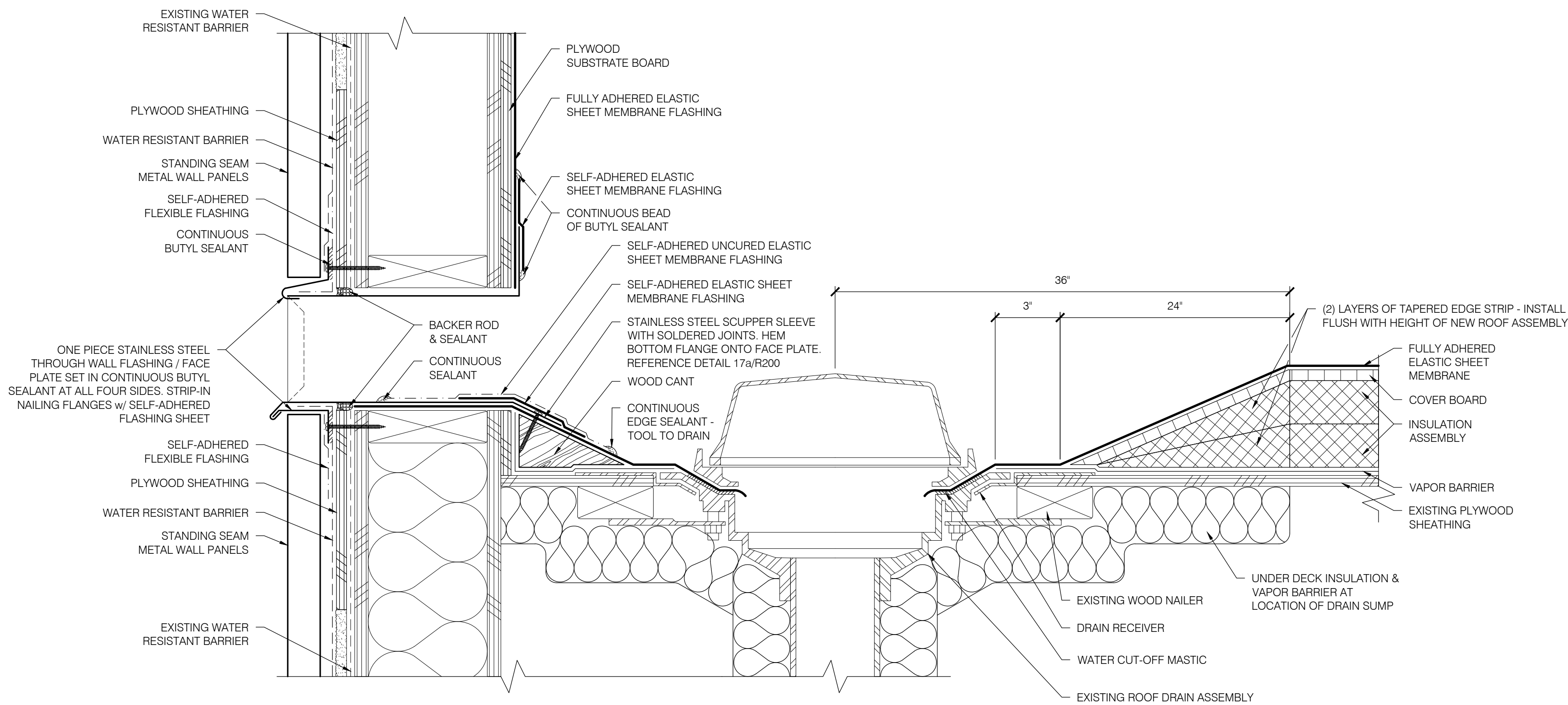
4 LOW TO STEEP SLOPE TRANSITIONS
SCALE: 3" = 1'-0"



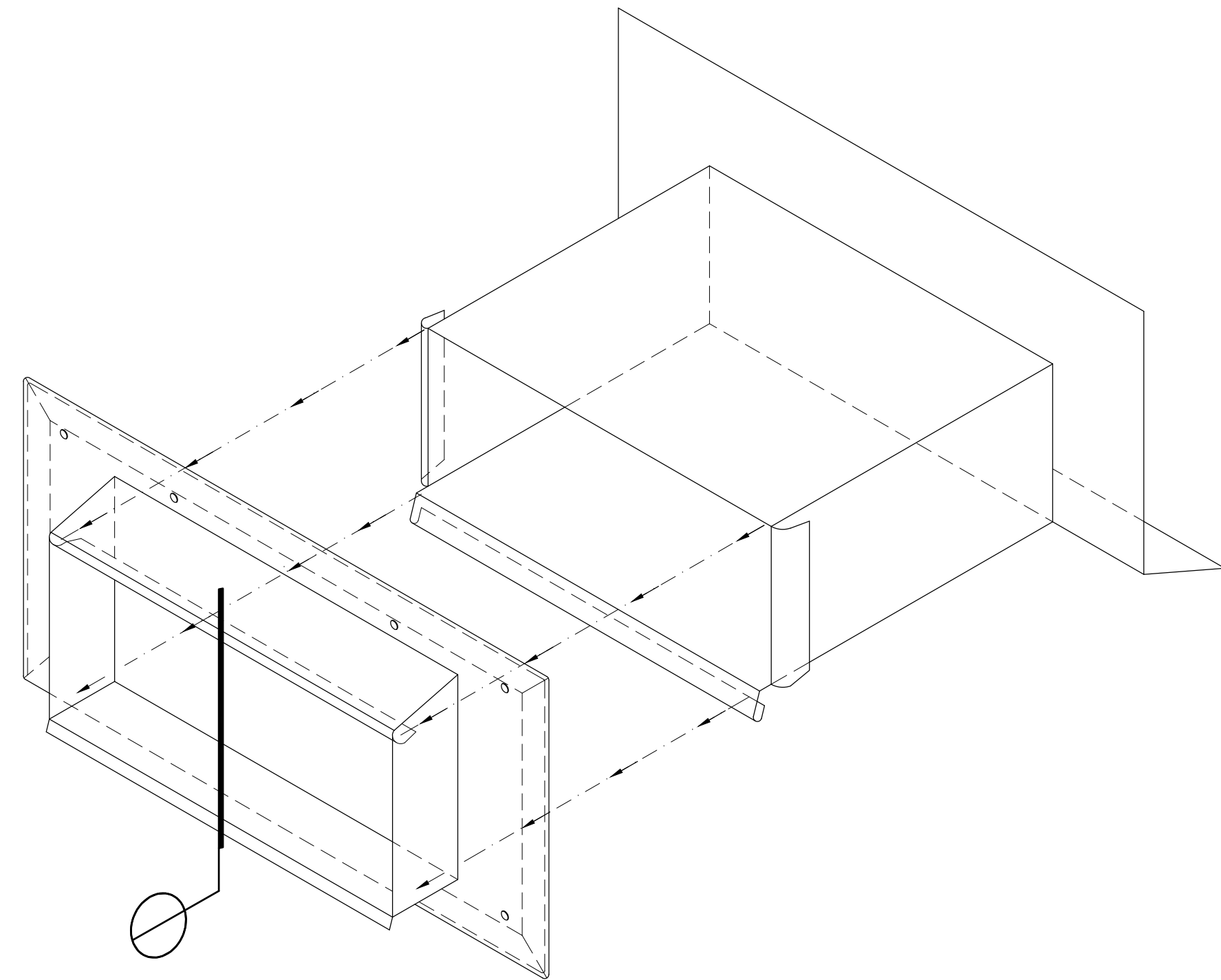
5 LOW TO STEEP SLOPE TRANSITIONS
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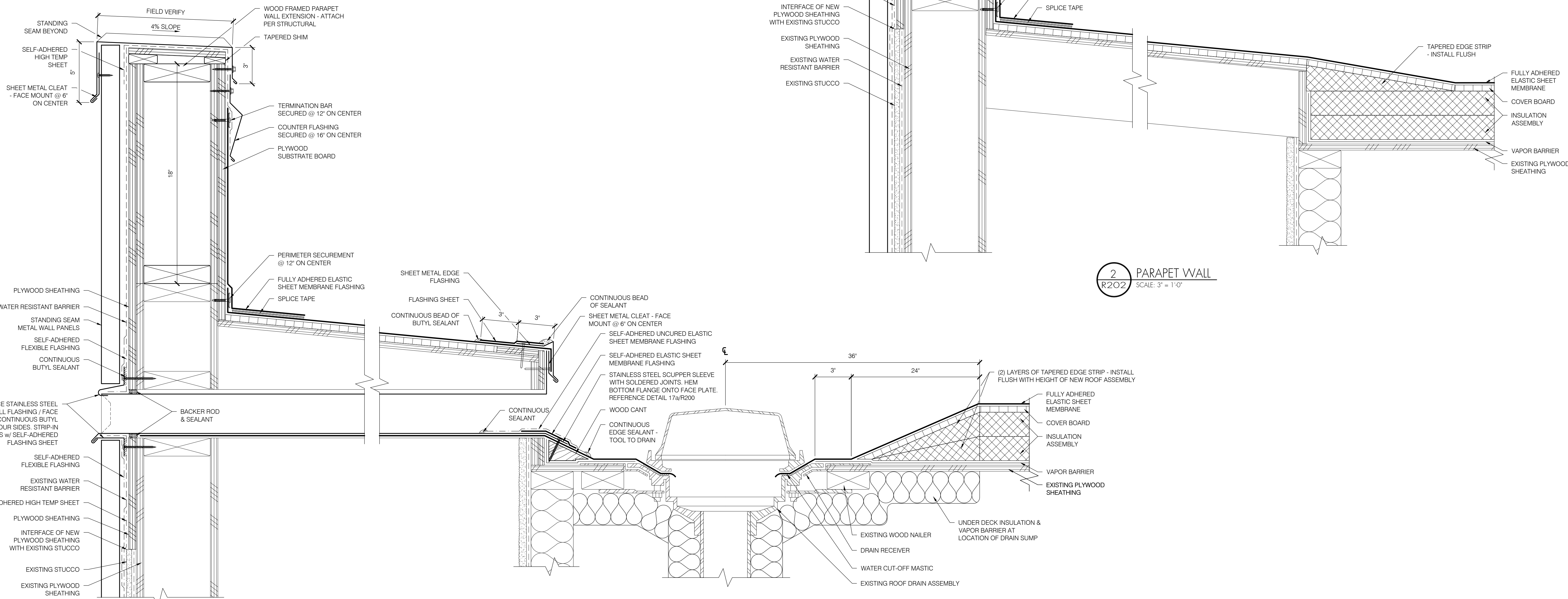
6 HIGH WALL BASE FLASHING
SCALE: 3" = 1'-0"



1
R202 ROOF DRAIN & OVERFLOW SCUPPER
SCALE: 3" = 1'-0"



1a
R202 SCUPPER ISOMETRIC VIEW
SCALE: NOT TO SCALE



2
R202 PARAPET WALL
SCALE: 3" = 1'-0"

3
R202 ROOF DRAIN & OVERFLOW SCUPPER
SCALE: 3" = 1'-0"



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0 3/32" 3/16"

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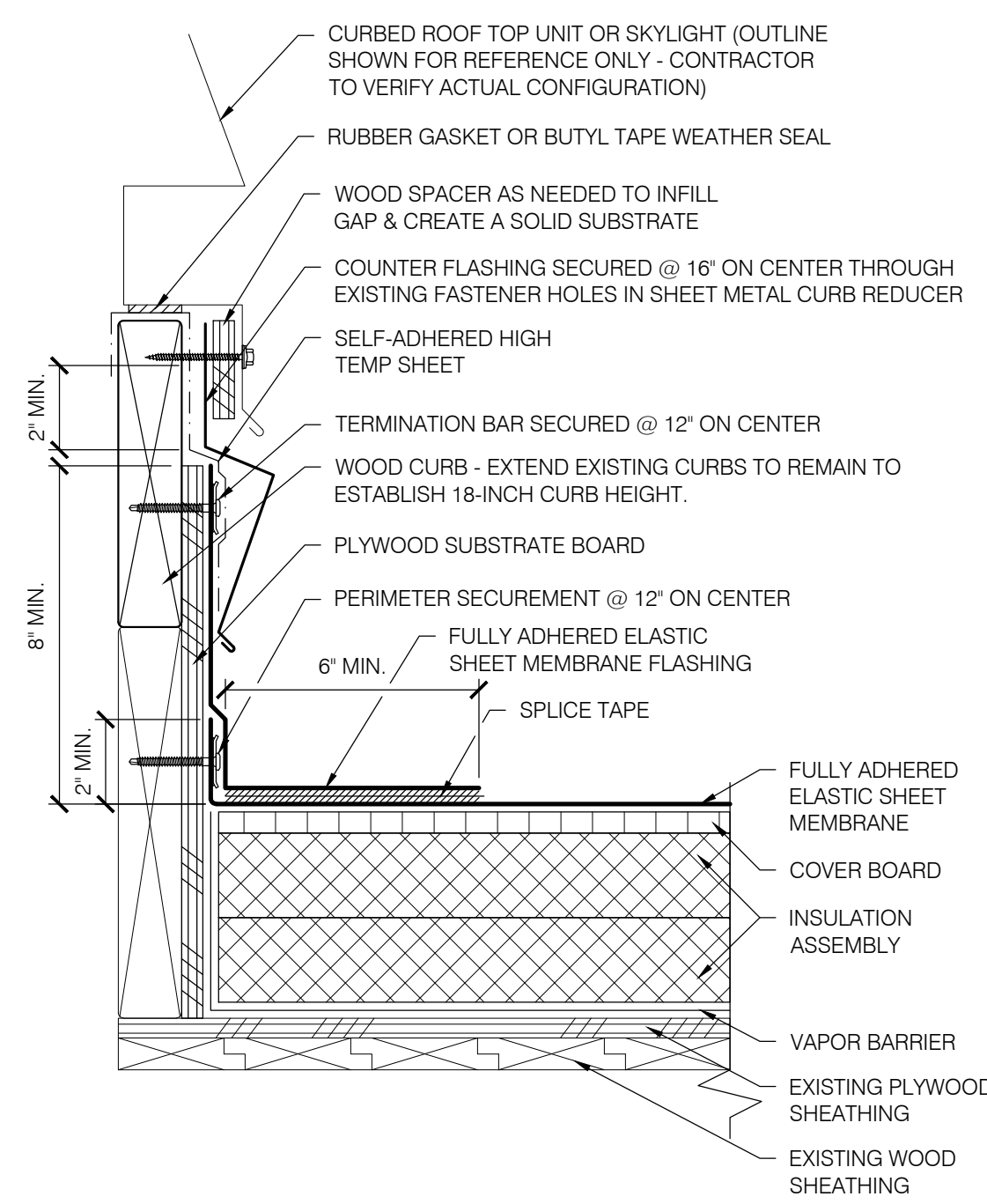
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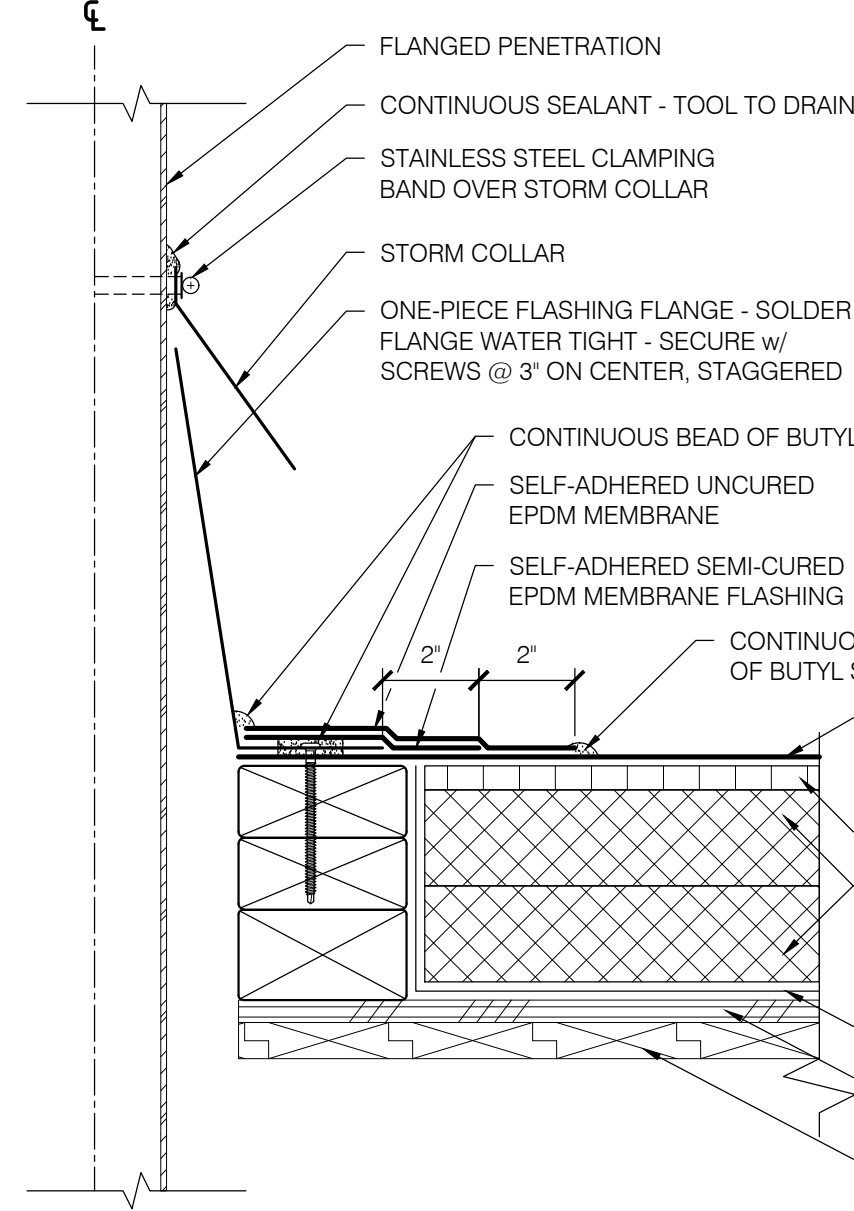
project # | 119190

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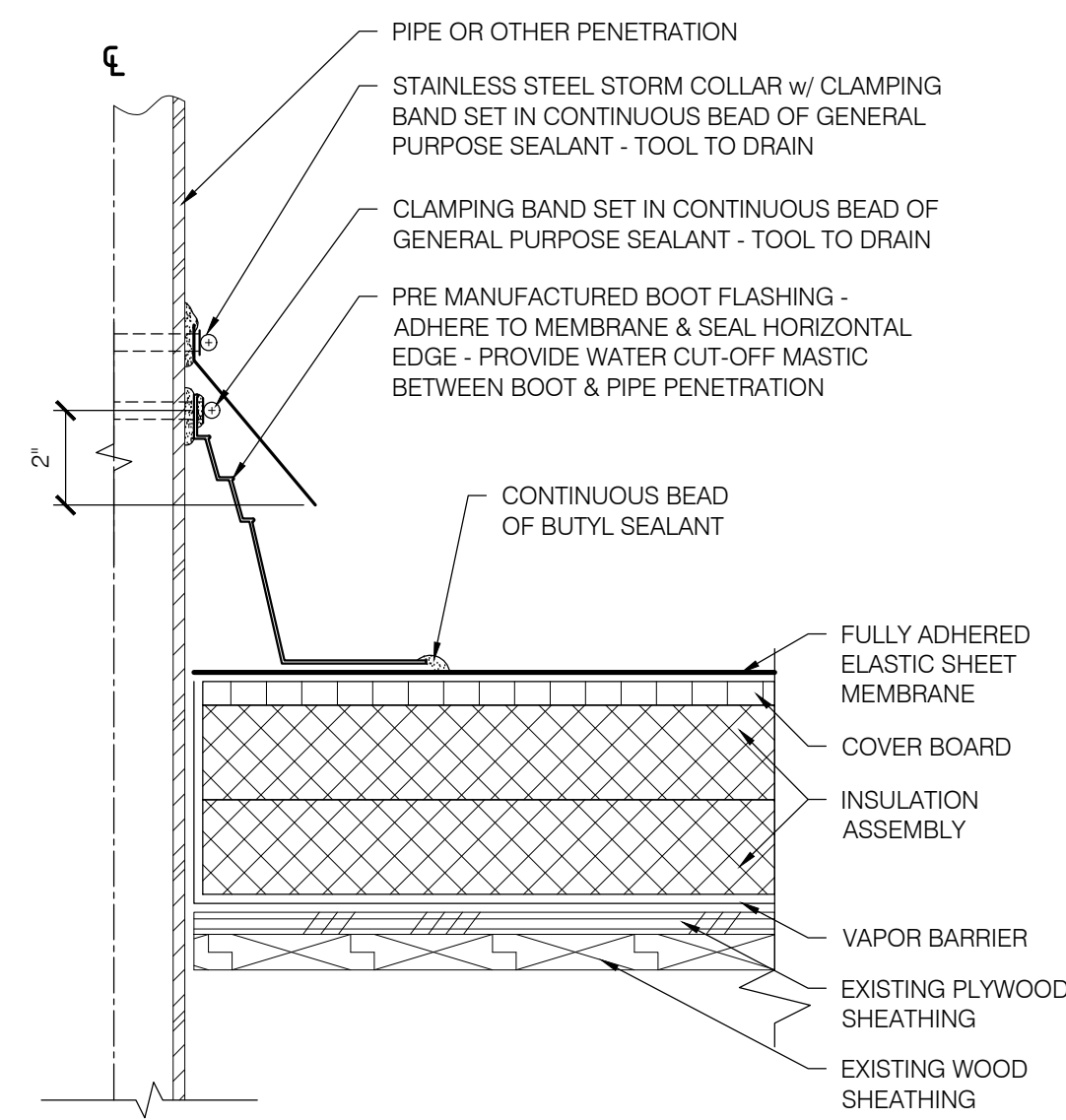
R202



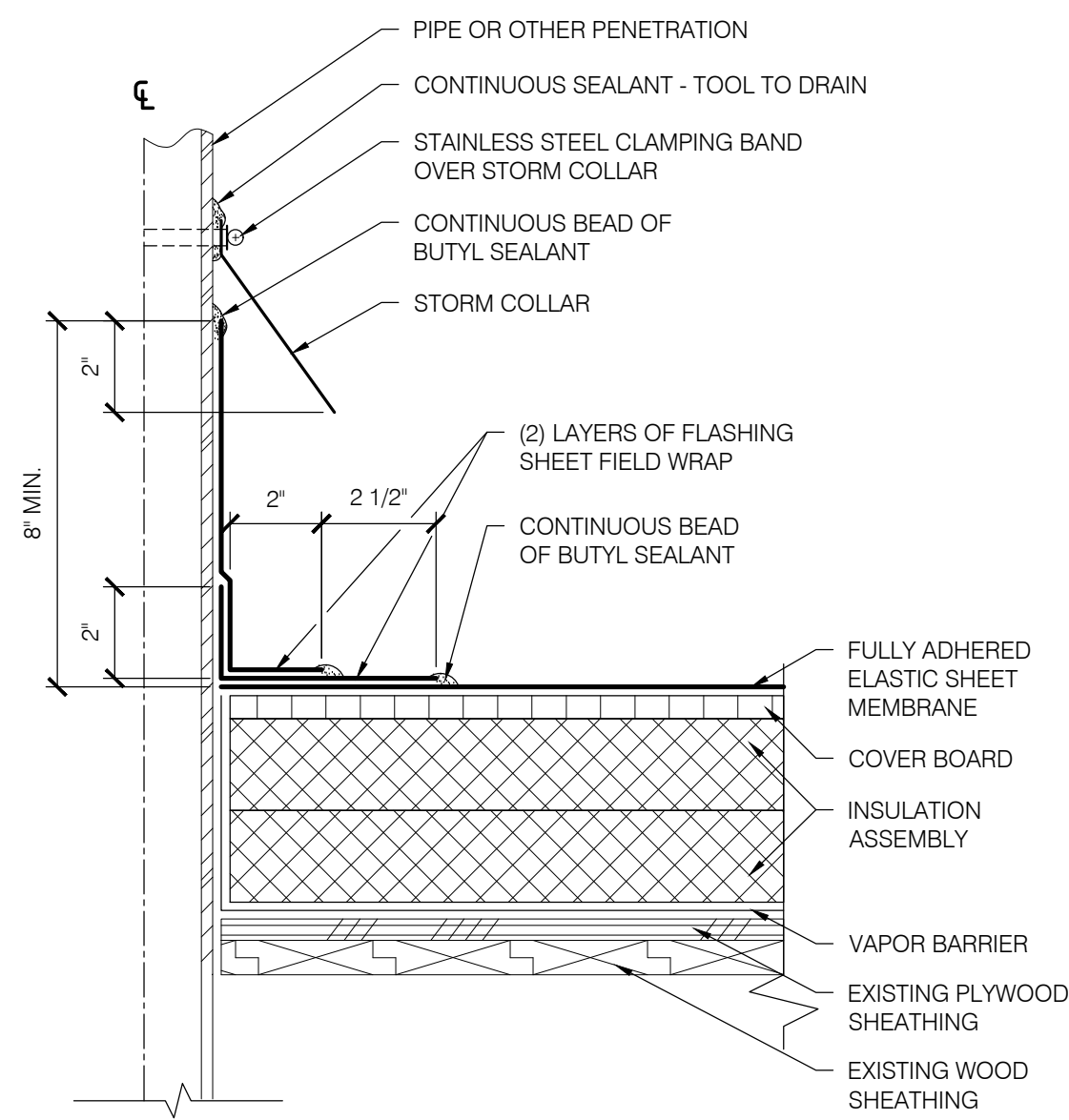
1 CURB MOUNTED ROOF TOP UNIT
R203 SCALE: 3" = 1'-0"



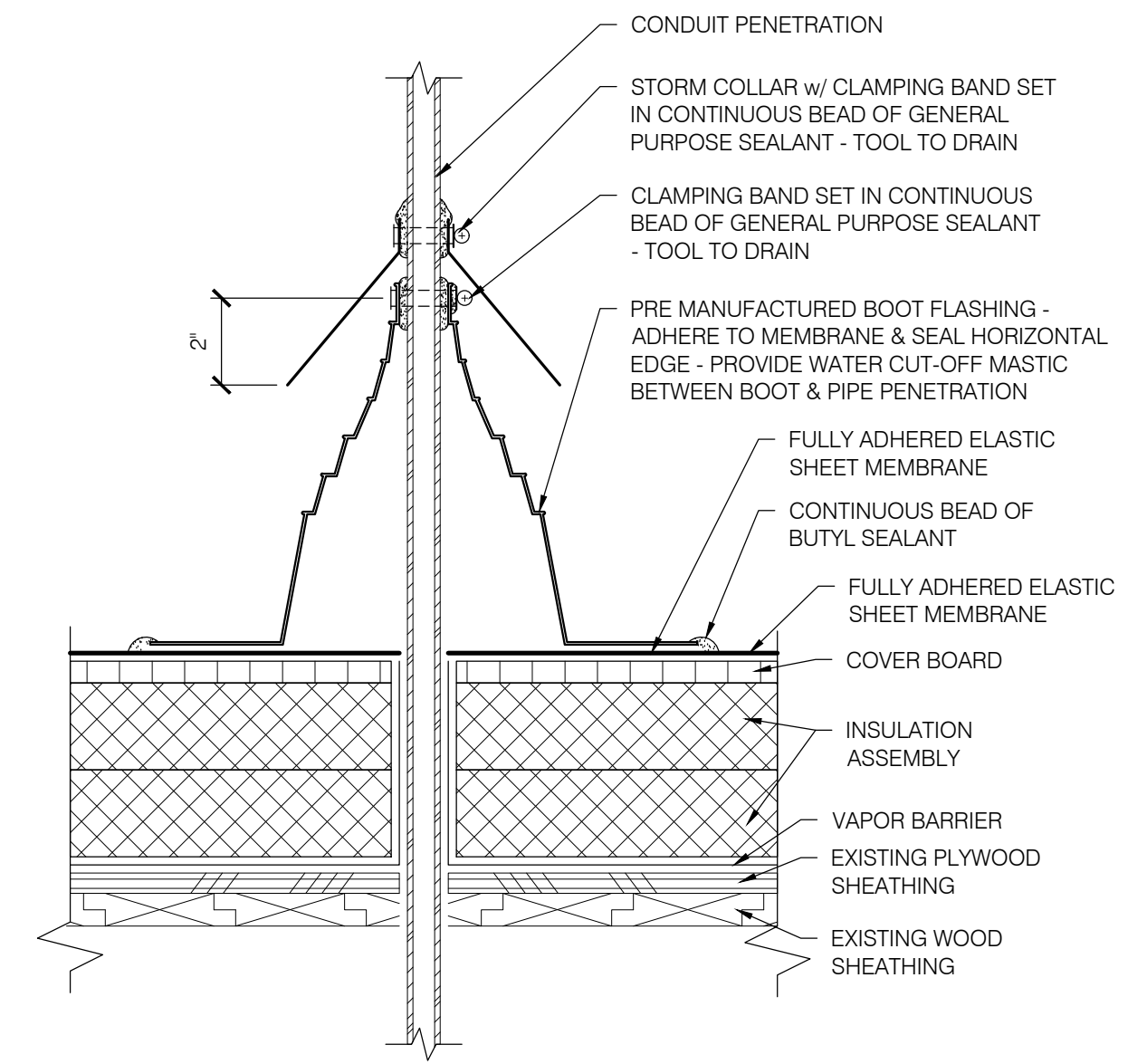
2 HOT PIPE PENETRATION FLASHING
R203 SCALE: 3" = 1'-0"



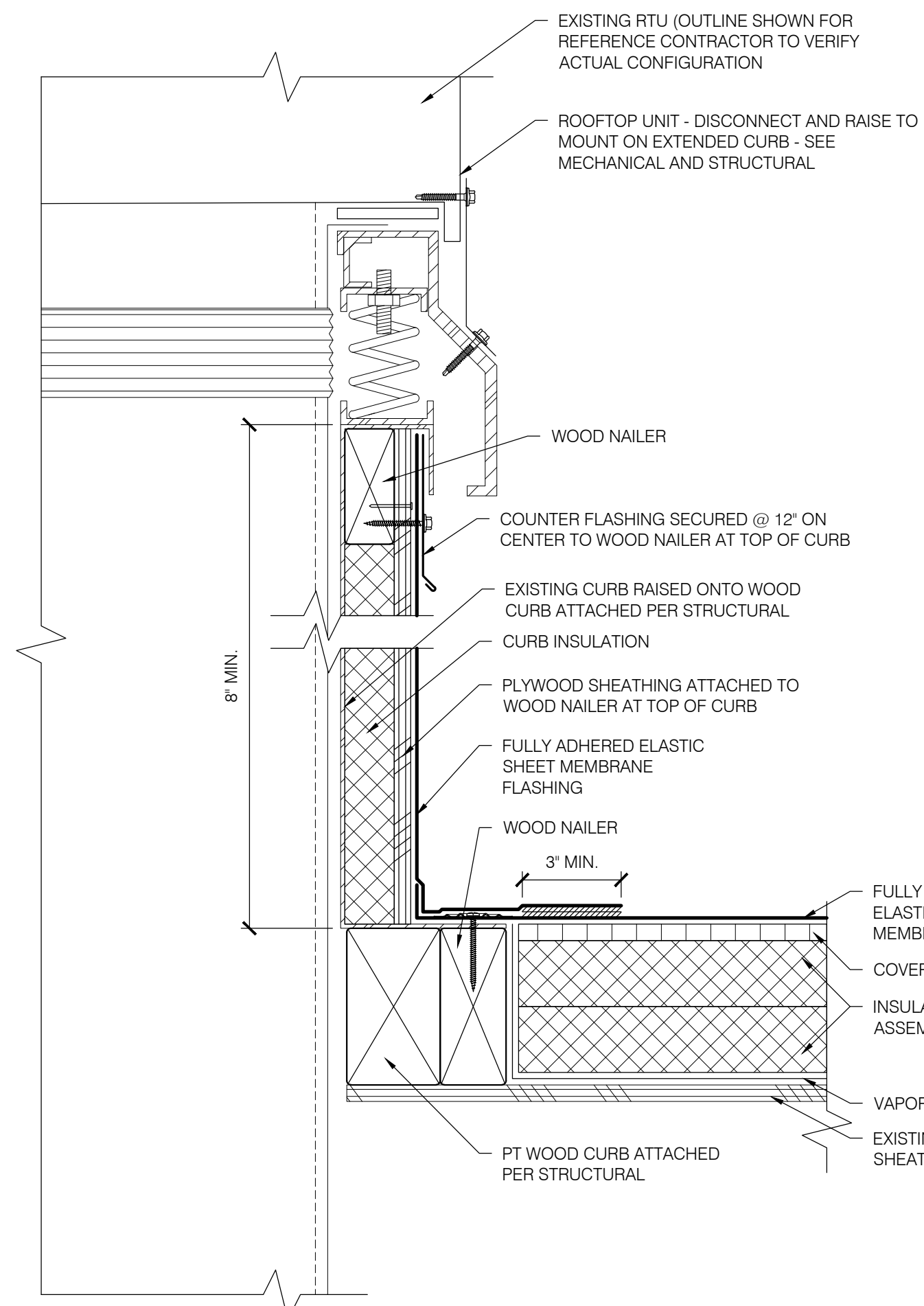
3 PRE-FORMED PENETRATION FLASHING
R203 SCALE: 3" = 1'-0"



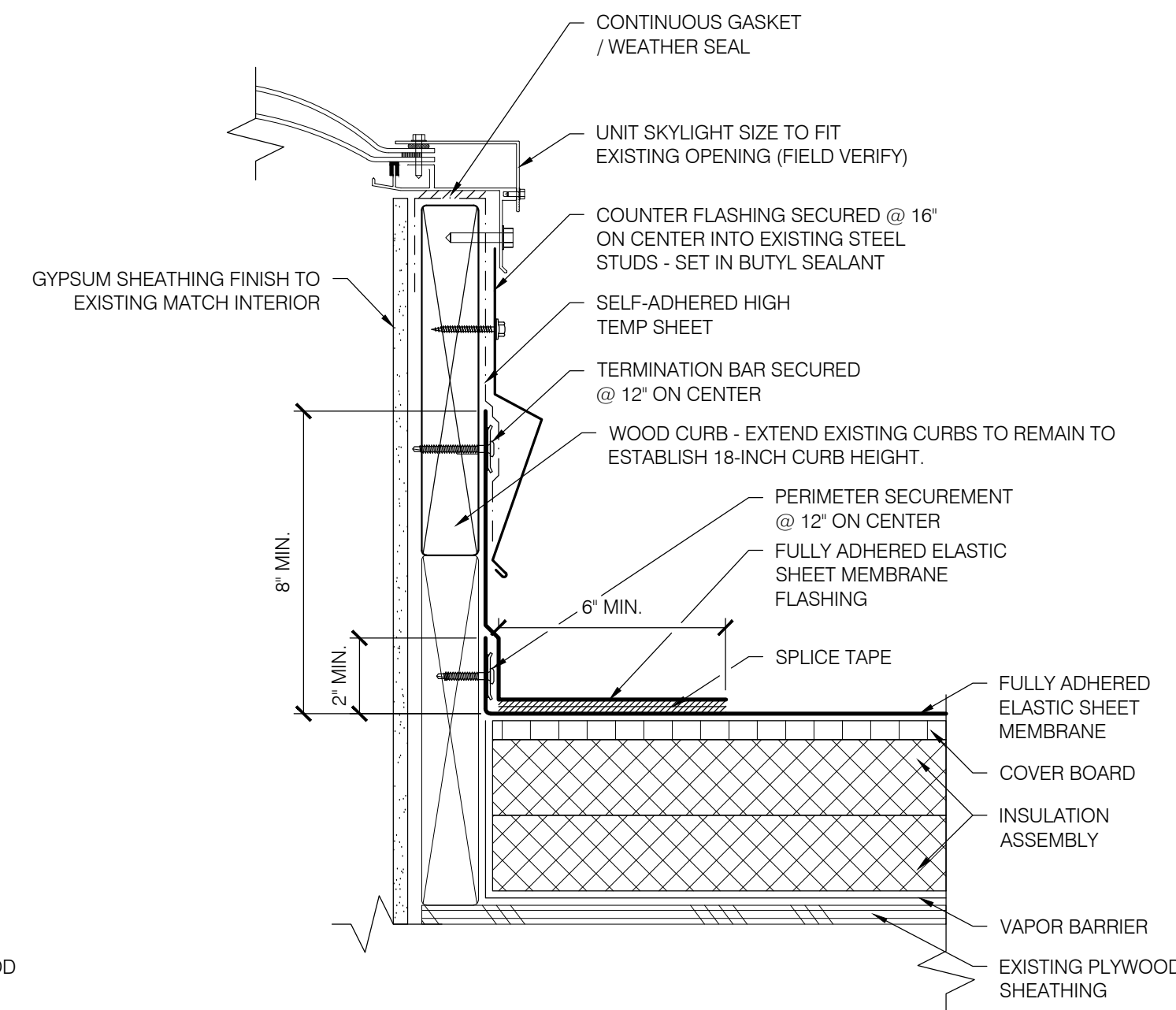
4 FIELD WRAP PENETRATION FLASHING
R203 SCALE: 3" = 1'-0"



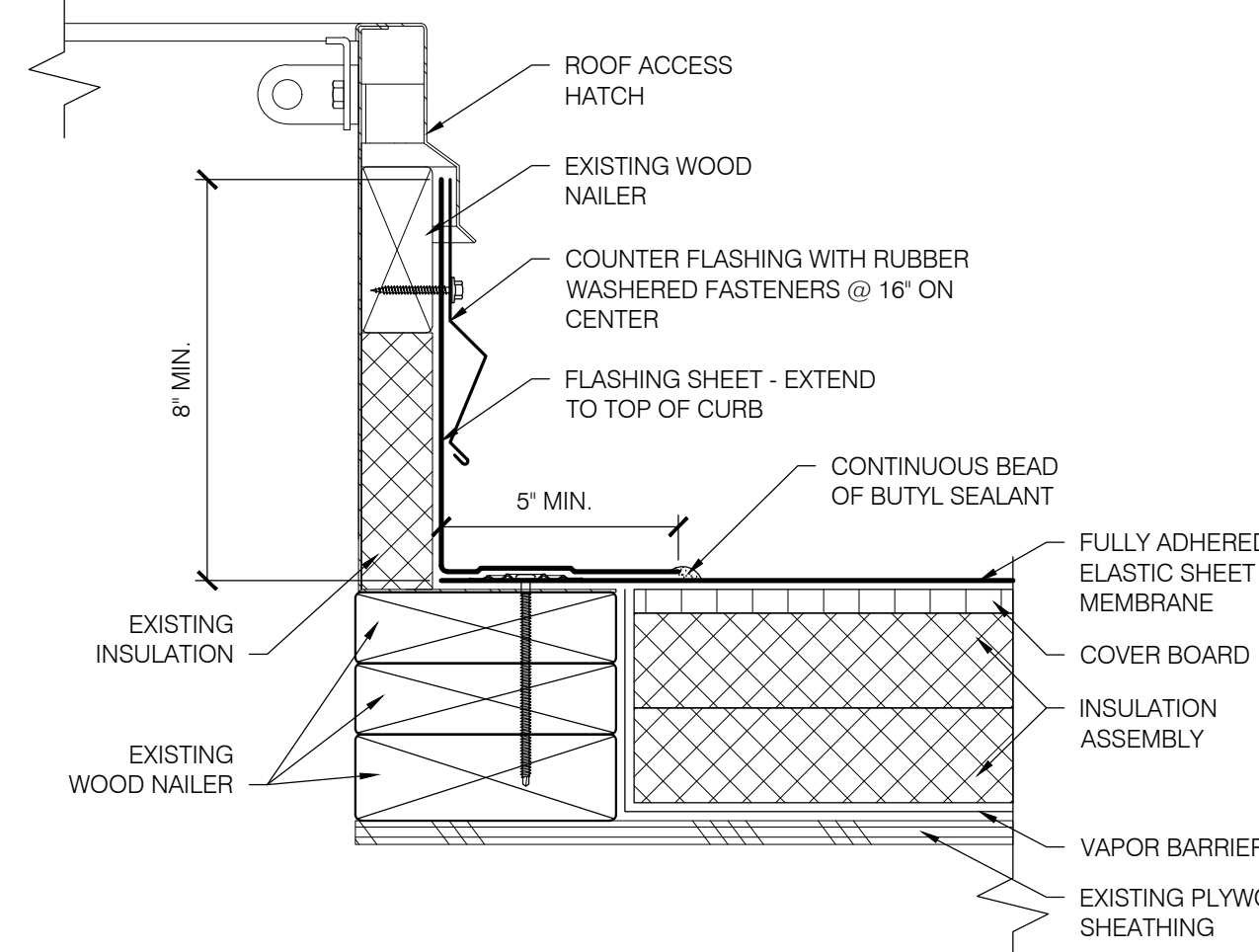
5 ELECTRICAL PENETRATION
R203 SCALE: 3" = 1'-0"



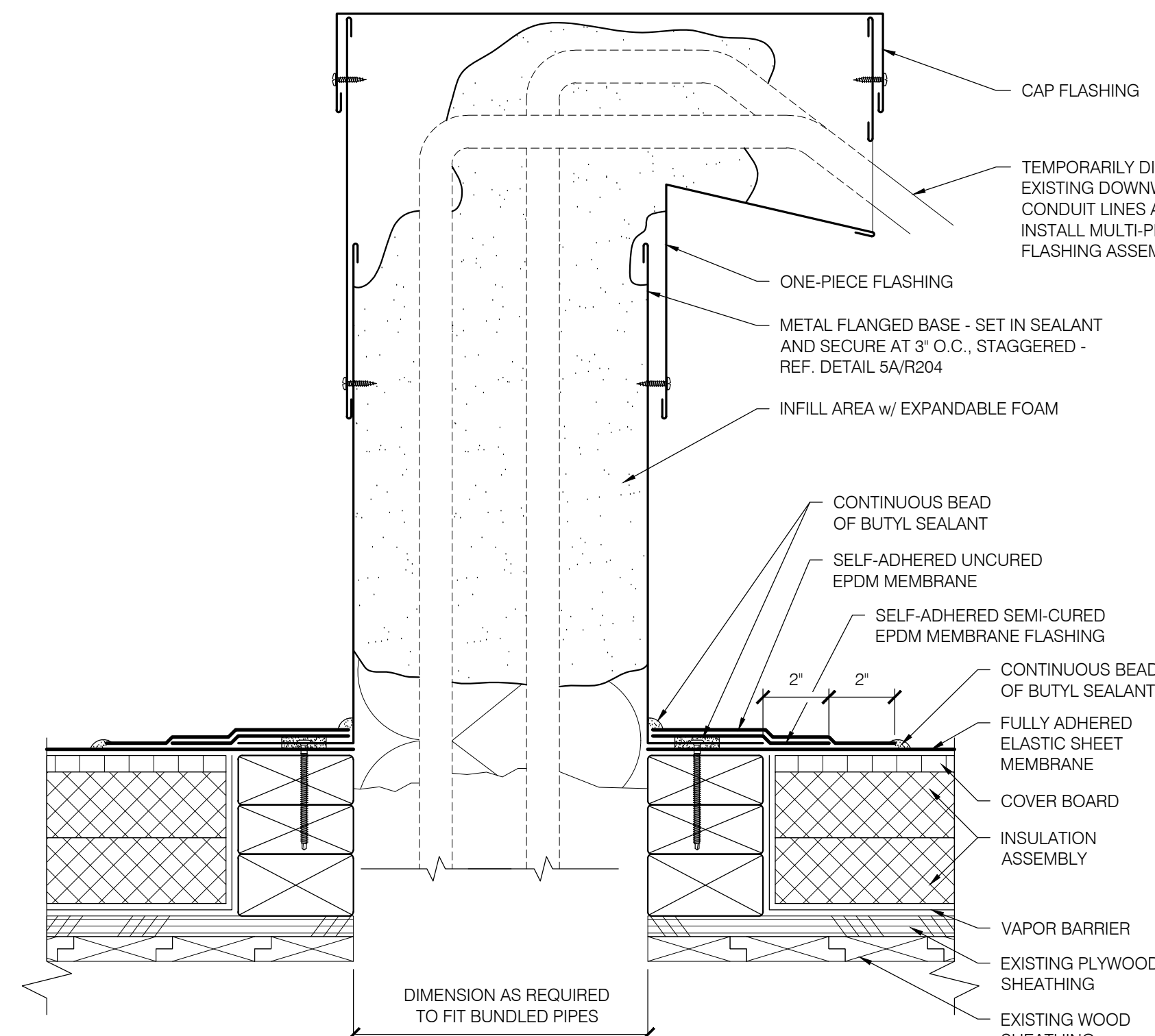
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R203 SCALE: 3" = 1'-0"



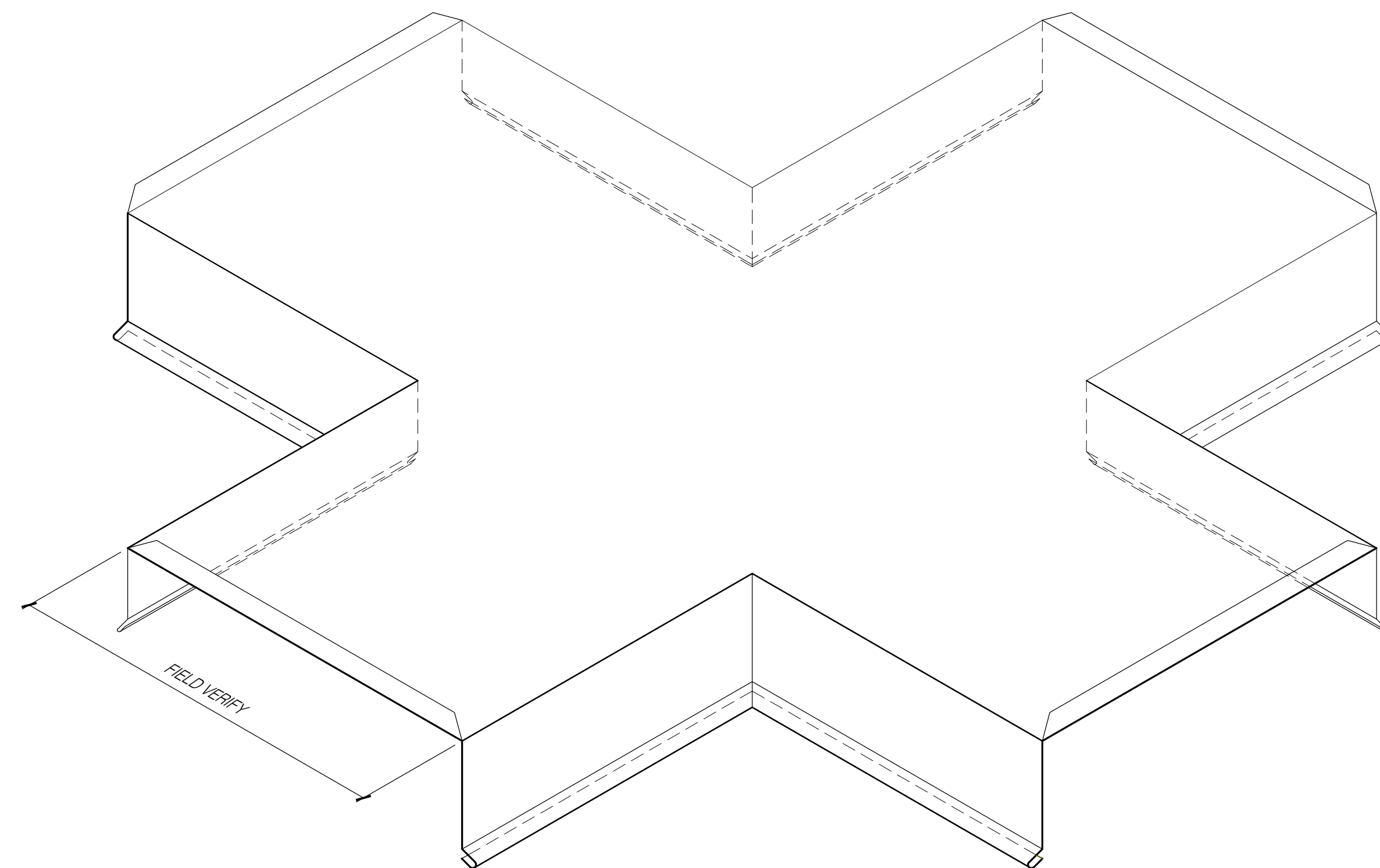
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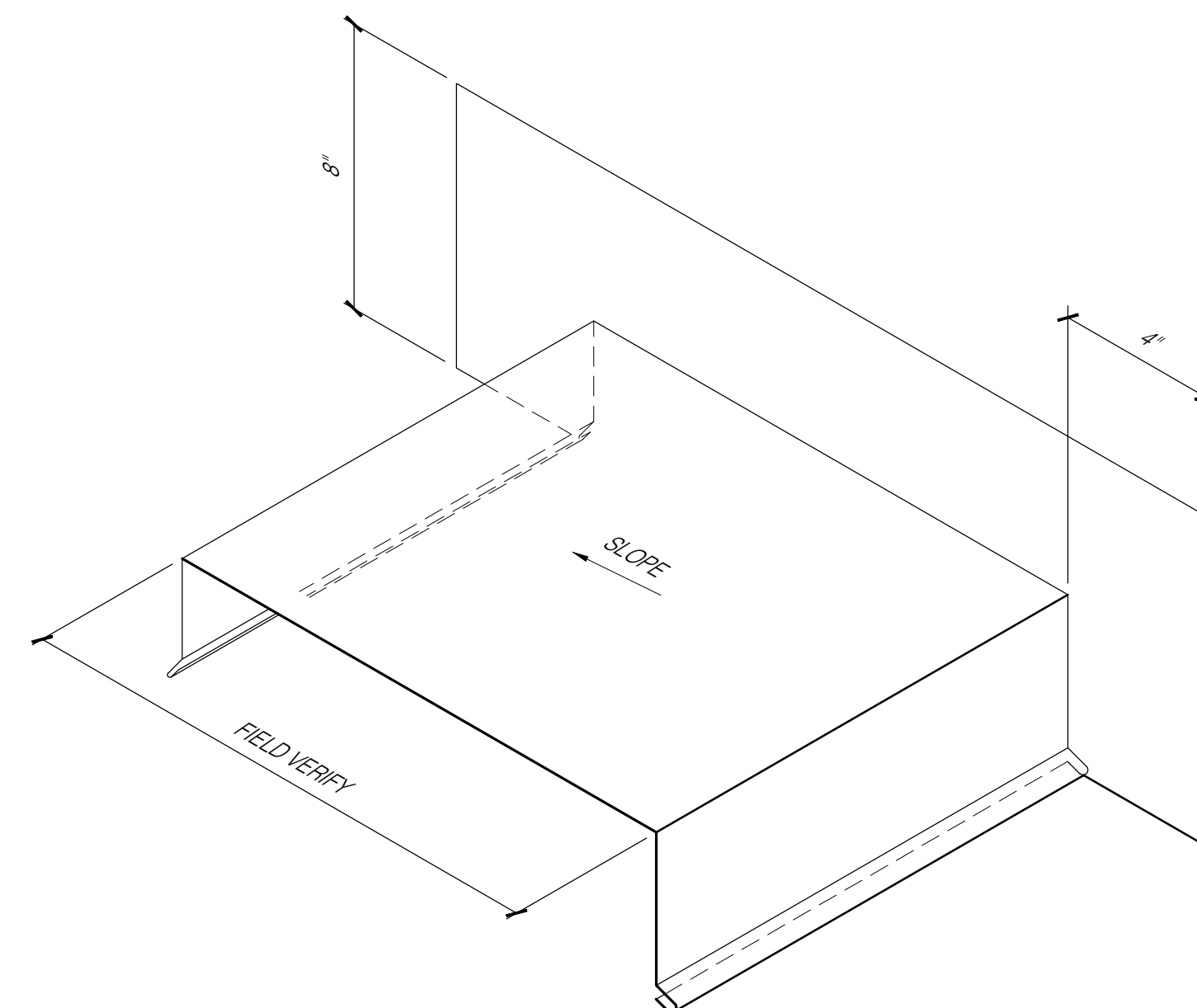
8 ROOF HATCH
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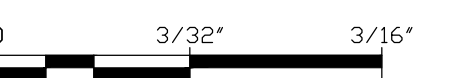
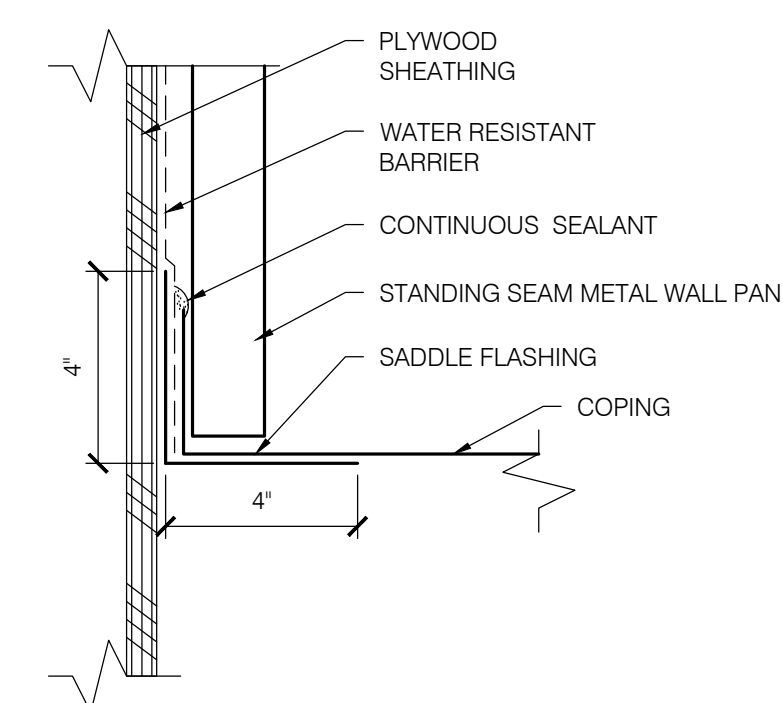
9 MULTILINE PENETRATION
R203 SCALE: 3" = 1'-0"



10 4-WAY COPING INTERFACE
R203 SCALE: N.T.S.



11 SADDLE FLASHING
R203 SCALE: N.T.S.



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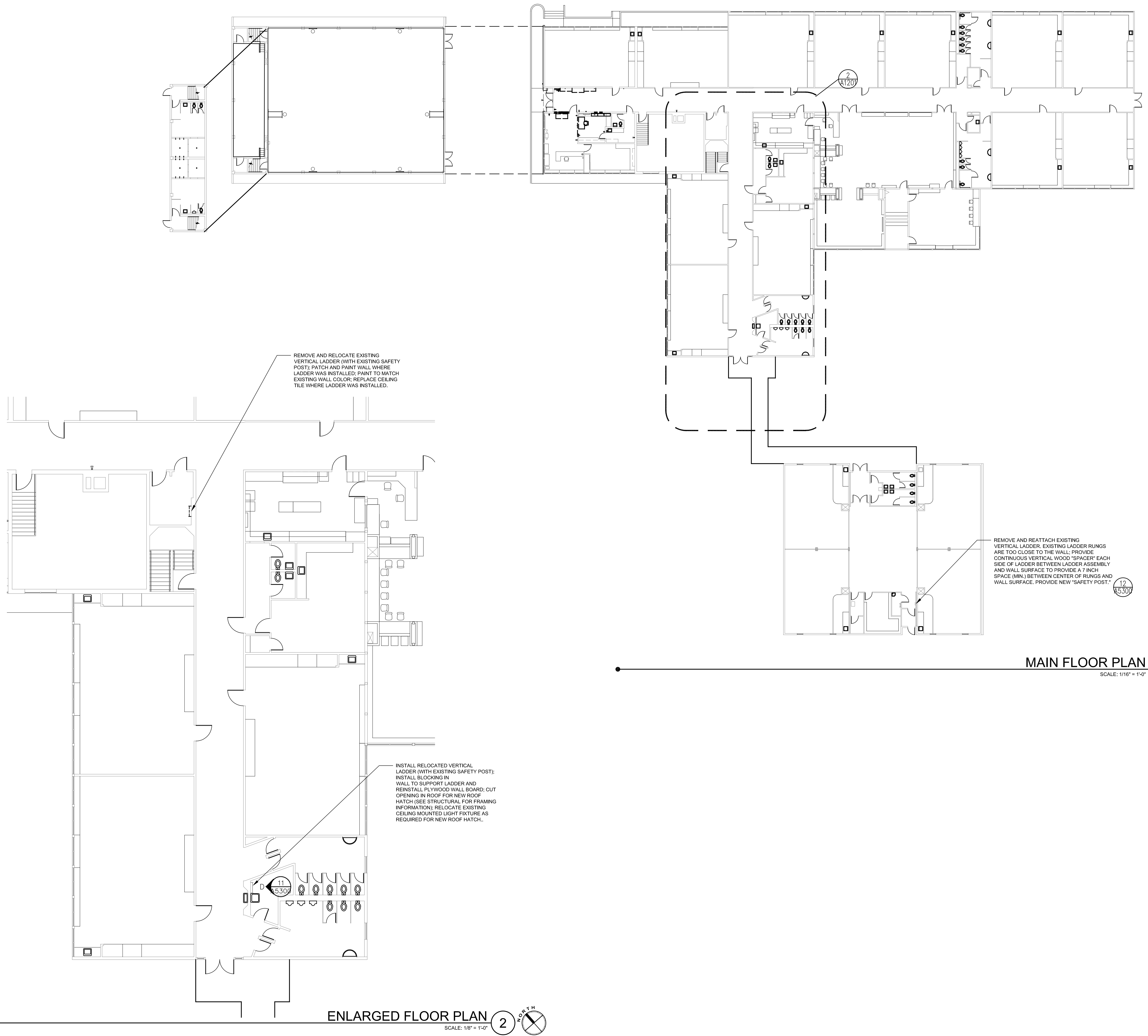
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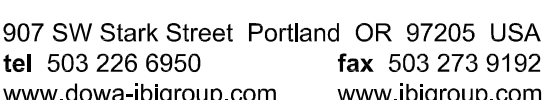
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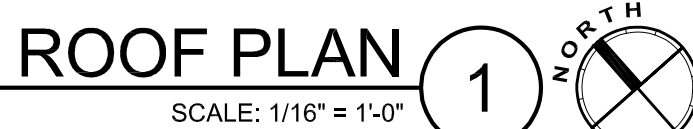
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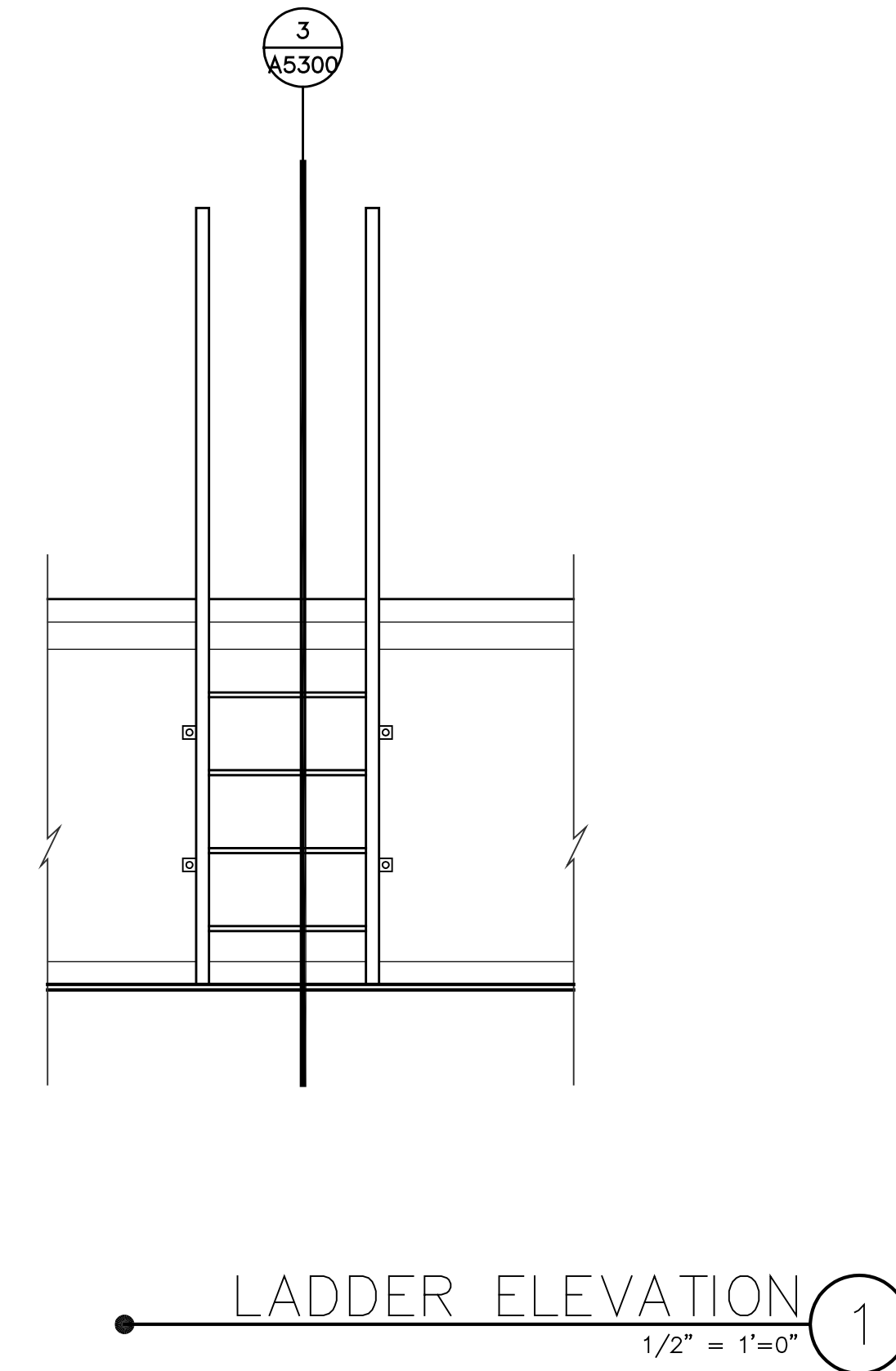
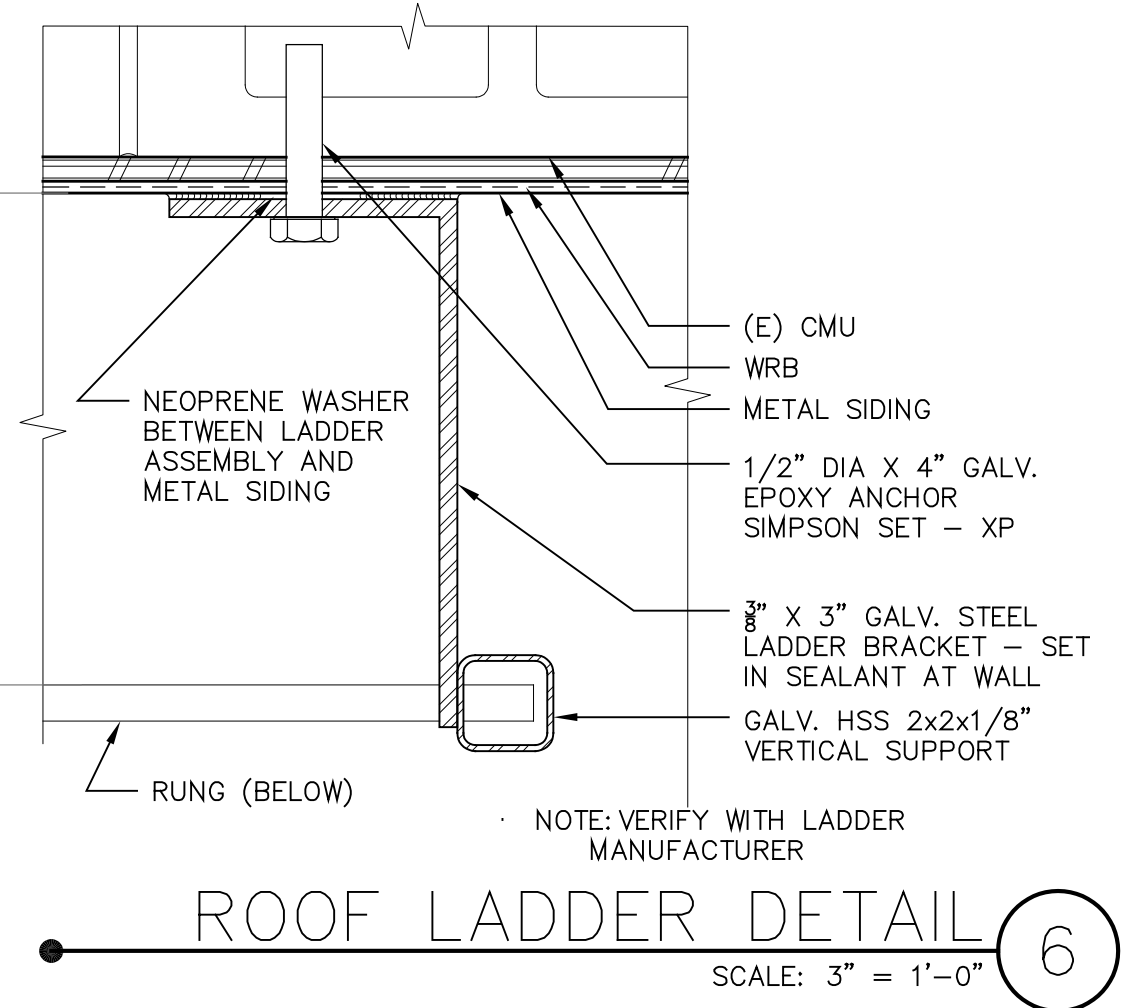
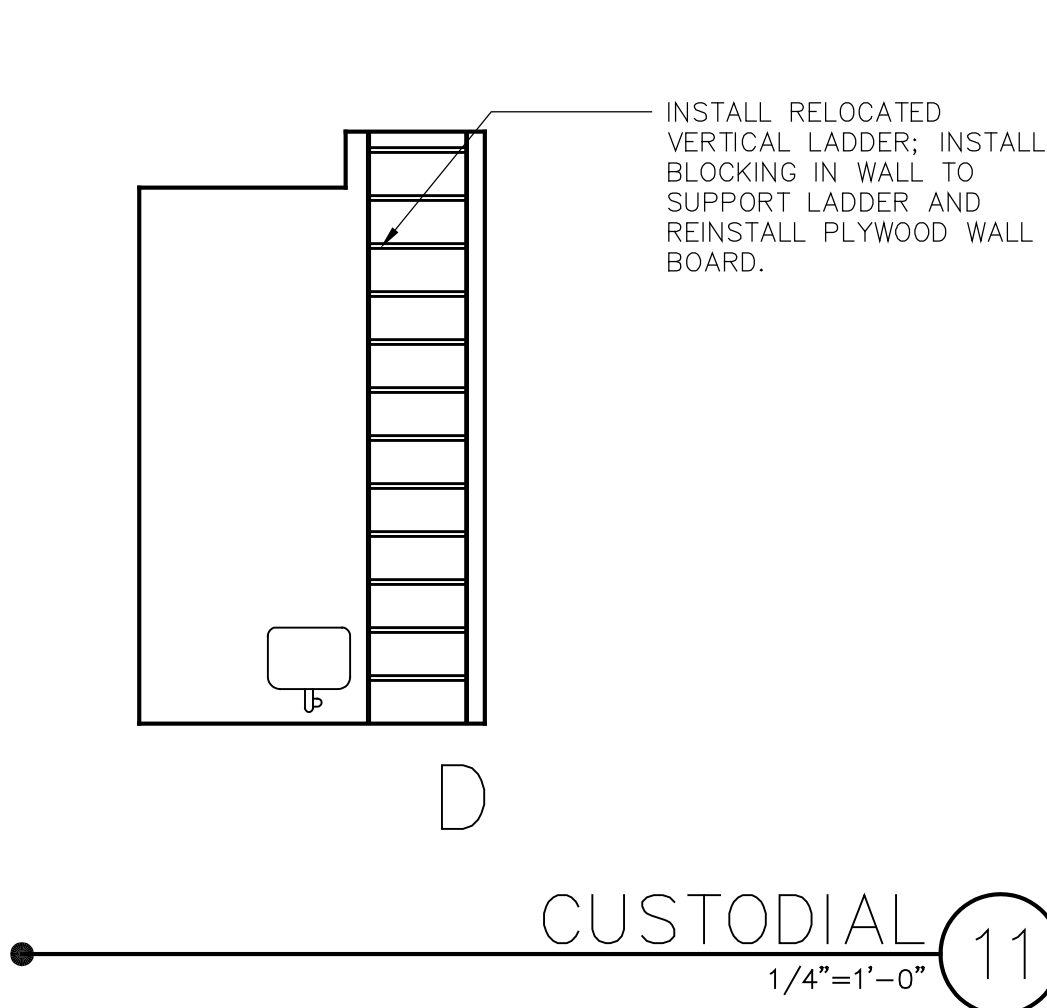
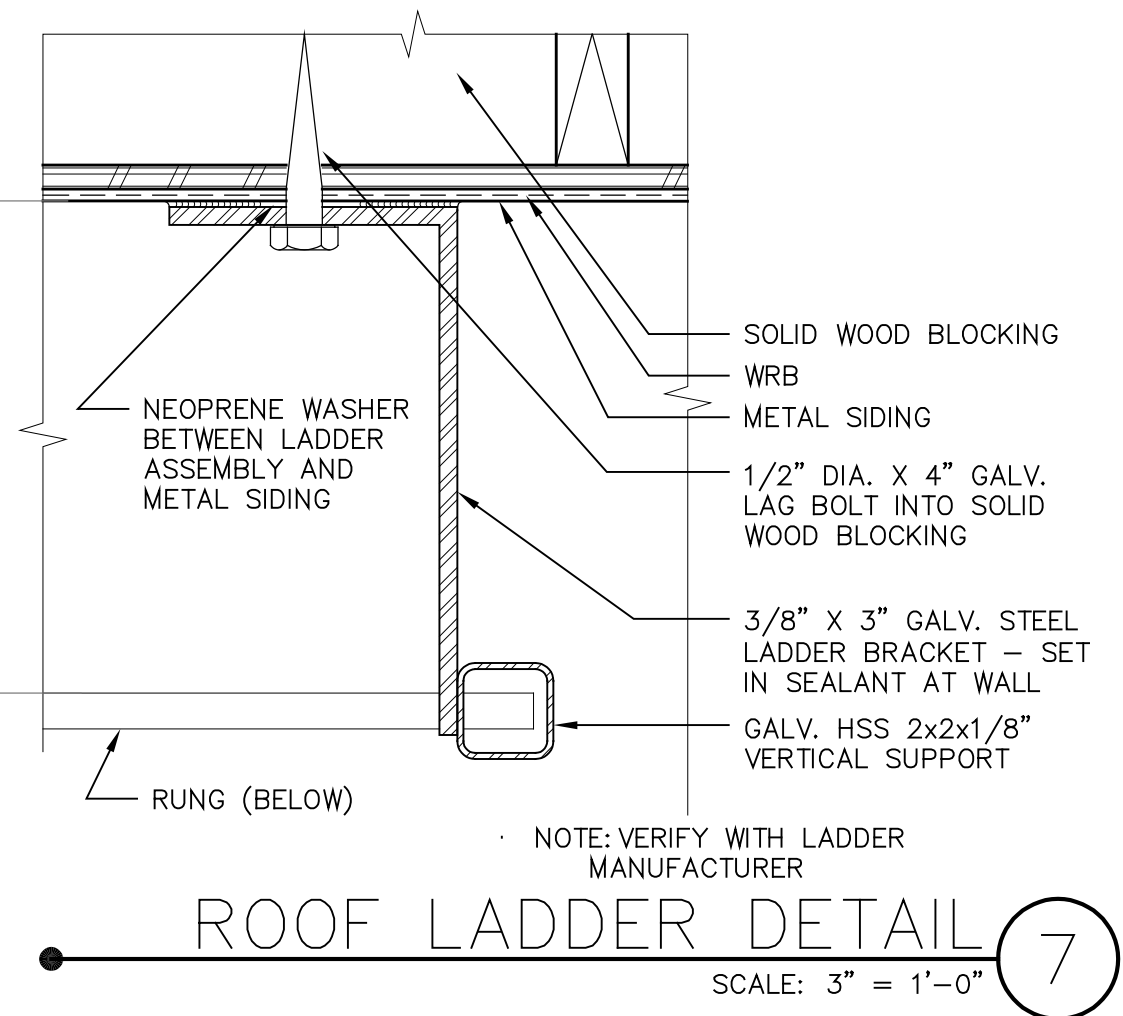
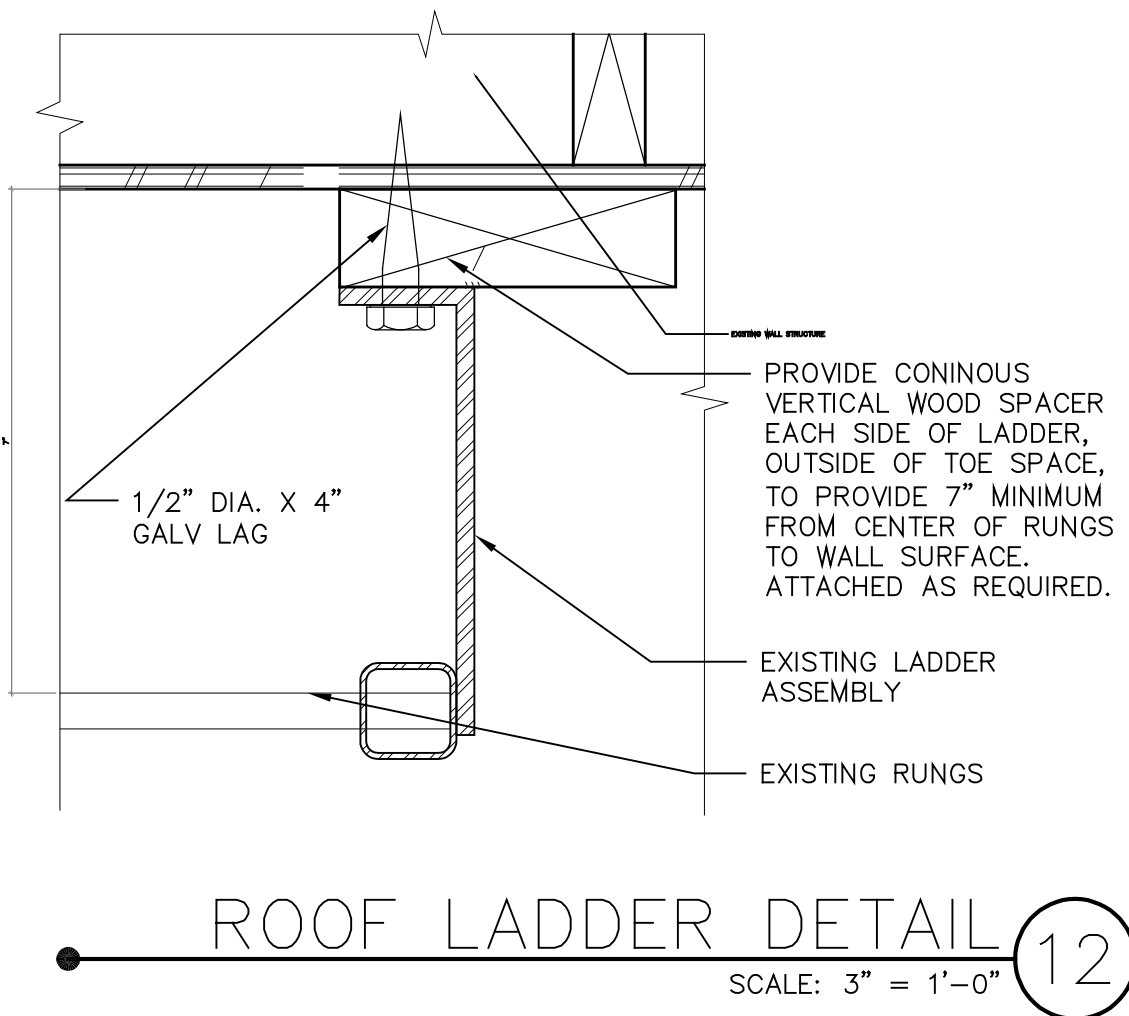
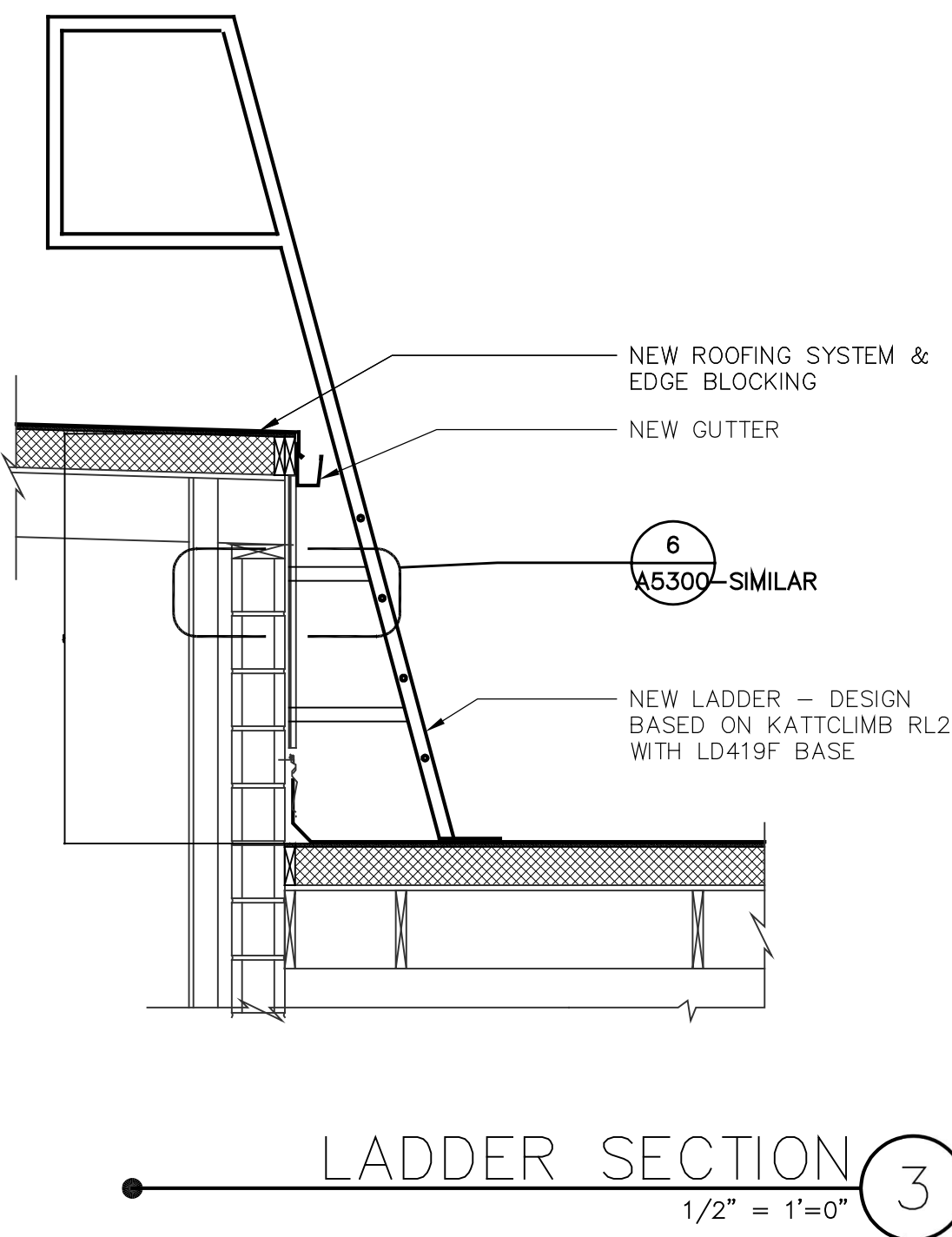
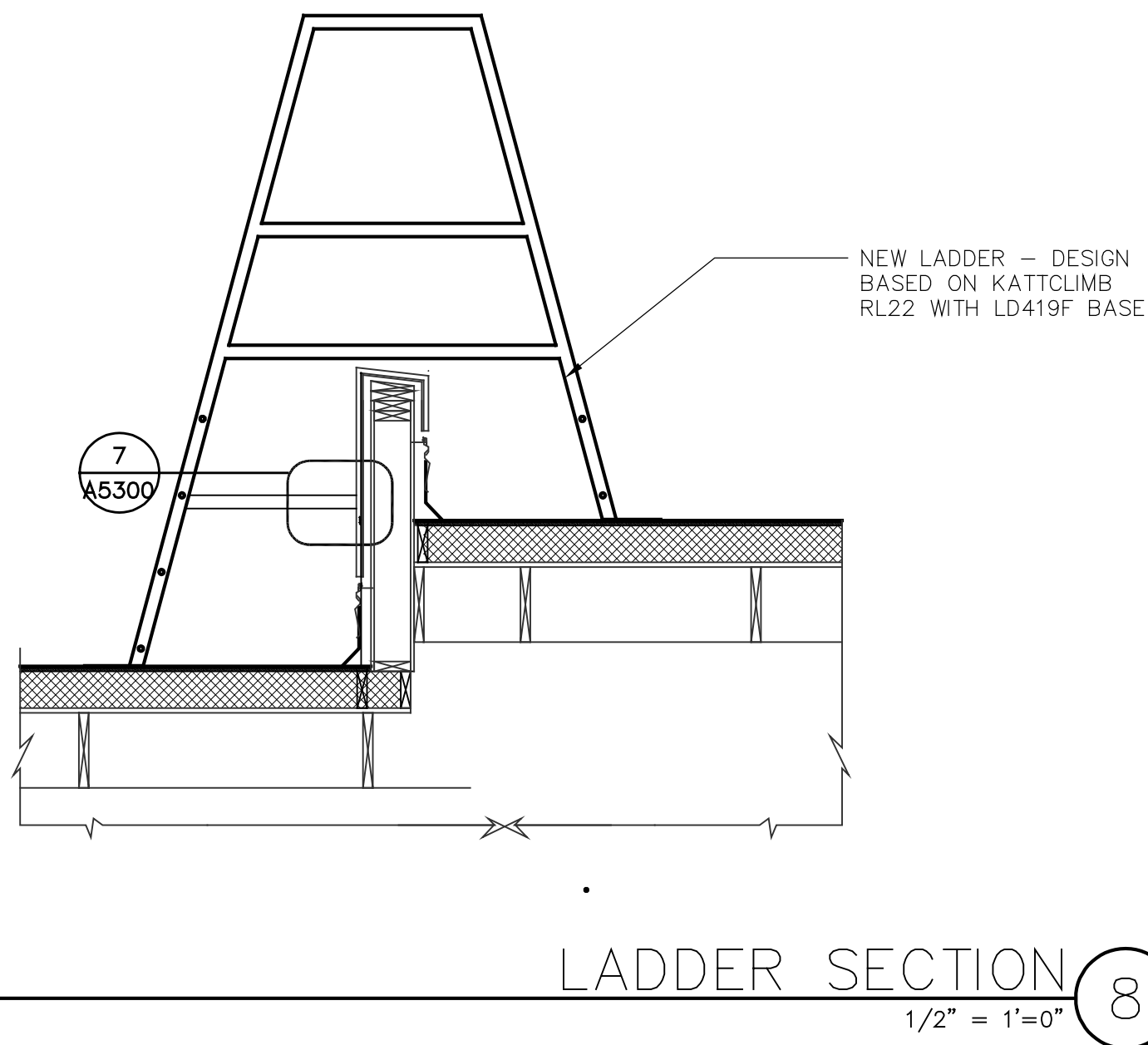
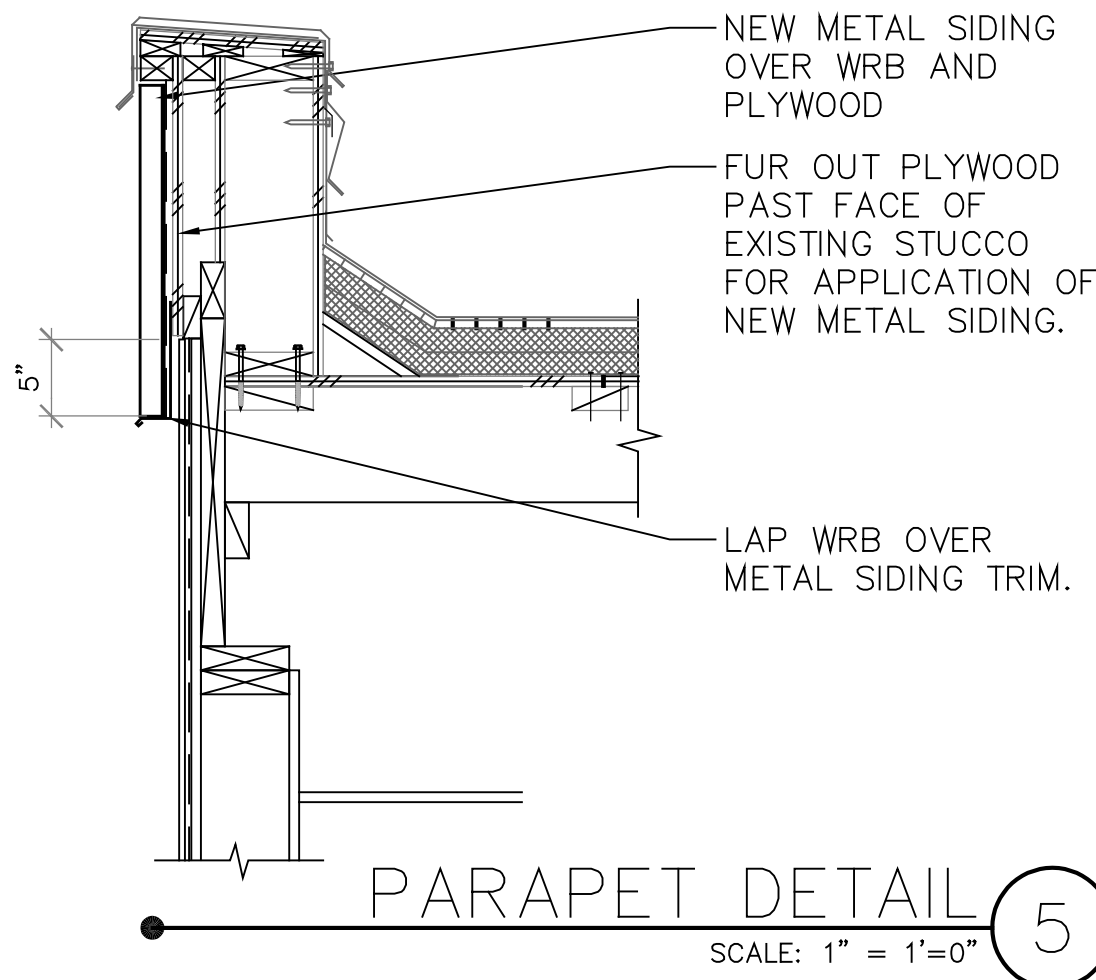
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Roof Plan	
A1401	

TIME: 09:25:31 DATE: 01/15/19 FILENAME: \\F:\03\projects\Madisonville School District\6687 Memorial ES Add & Rem\1-Project File\Drawings\A410.dwg DWG

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GENERAL STRUCTURAL NOTES

THESE NOTES SHALL STIPULATE THE MINIMUM STANDARDS OF CONSTRUCTION, AND THE DRAWINGS SHALL GOVERN OVER THE NOTES IN ALL MATTERS SPECIFICALLY STATED. VERIFY DIMENSIONS AND EXISTING CONDITIONS AND NOTIFY ARCHITECT ORS ENGINEER OF DISCREPANCIES BEFORE PROCEEDING. THE CONTRACTOR IS RESPONSIBLE FOR SAFE CONDITIONS AT THE JOBSITE, AND FOR TEMPORARY SUPPORT OF THE BUILDING PRIOR TO THE COMPLETION OF THE VERTICAL AND LATERAL LOAD SYSTEMS. ALL WORK SHALL CONFORM TO THE 2010 EDITION OF THE OREGON STRUCTURAL SPECIALTY CODE (OSSC).

DESIGN LOADS:

CLASSROOM AND RESTROOM AREAS FLOOR LIVE LOAD = 40 PSF
CORRIDORS, STAIRS & EXITS LIVE LOAD = 100 PSF
MINIMUM ROOF SNOW LOAD = 25 PSF UNIFORM
BASIC WIND SPEED, Vult = 130 MPH 3-SECOND GUST AND EXPOSURE B

SEISMIC DESIGN CATEGORY D AND SITE CLASS D
SEISMIC IMPORTANCE FACTOR, Ie = 1.25
OCCUPANCY CATEGORY III
MAPPED SPECTRAL RESPONSE ACCELERATIONS Sa = 1.009g AND S1 = .436g
SPECTRAL RESPONSE COEFFICIENTS SDs= 0.131g AND SD1= 0.485g
BSE-1N: Sa = 0.131 AND Sd1 = 0.485
BSE-2N: Sa = 1.006 AND Sd1 = 0.687
BASIC SEISMIC FORCE RESISTING SYSTEMS:
WOOD ROOF DIAPHRAGMS
REINFORCED CONCRETE WALLS
CONCRETE MASONRY BLOCK WALLS WITH MINIMAL REINFORCING

CONTRACTOR SHALL PREVENT OVERLOADING THE EXISTING ROOF SYSTEM BY EVENLY DISTRIBUTING NEW AND REMOVED MATERIALS. AVOID EXCESSIVE PILING OR STACKING OF MATERIALS BY OFF-LOADING FROM ONE ROOF LEVEL TO ANOTHER. WHERE MATERIALS MUST BE STACKED, CHOOSE AREAS OVER BEARING WALLS TO AVOID OVERLOADING FRAMING MEMBERS.

SPECIAL INSPECTION REQUIRED:

SPECIAL INSPECTION ACCORDING TO THE REQUIREMENTS OF SECTION 1704 OF THE INTERNATIONAL BUILDING CODE SHALL BE REQUIRED AS SPECIFIED IN THE "REQUIRED SPECIAL INSPECTIONS" TABLE ON THIS SHEET.

STRUCTURAL OBSERVATION:

- STRUCTURAL OBSERVATIONS BY THE ENGINEER OF RECORD (EOR) OR THEIR REPRESENTATIVE SHALL BE REQUIRED AT THE FOLLOWING STAGES DURING CONSTRUCTION:
-INSTALLATION OF THE PLYWOOD ROOF DIAPHRAGM.
-AFTER INSTALLATION OF BLOCKING, HARDWARE/CLIPS, PRIOR TO COVERING.
-INSTALLATION OF ANCHOR BOLTS TO CONCRETE, ANGLES, AND STRAPS.
- THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD (EOR) AT LEAST FOUR (4) CALENDAR DAYS IN ADVANCE OF COMPLETION REQUIRING SITE OBSERVATION.
- IF ADDITIONAL SITE VISITS OR DESIGN WORK IS REQUIRED BY THE ENGINEER BECAUSE OF INCOMPLETE OR UNACCEPTABLE WORK, THE ENGINEER SHALL BE REIMBURSED FOR ALL TIME AND EXPENSES INVOLVED.

WOOD:

LUMBER GRADES SHALL BE AS FOLLOWS, EXCEPT AS NOTED ON DRAWINGS:
2x FRAMING & BLOCKING #2 GRADE DOUGLAS FIR
4x FRAMING & BLOCKING #2 GRADE DOUGLAS FIR
PLATES & SILL ON CONCRETE FR, TR, DOUGLAS FIR

SHEATHING SHALL BE APA RATED SHEATHING EXPOSURE 1 OR CDX. SEE DRAWINGS FOR PANEL INDEX, INSTALLATION, AND NAILING REQUIREMENTS. NAILING INDICATED ON DRAWINGS TO BE WITH COMMON NAILS.

ALL CONNECTORS IN CONTACT WITH PRESERVATIVE TREATED WOOD MUST BE CORROSION PROTECTED.

FASTENERS AND HANGERS NOTED ON THE DRAWINGS ARE MODEL NUMBERS OF "SIMPSON STRONG-TIE COMPANY, INC." AND MAY BE REPLACED WITH EQUIVALENT MODELS BY OTHER COMPANIES HAVING EQUIVALENT PROPERTIES AND STRENGTHS. INSTALL ALL CONNECTORS IN ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS WITH NAILING IN ALL AVAILABLE HOLES. SIMPSON OR EQUIVALENT STEEL FASTENERS ATTACHED TO ACO-TREATED WOOD SHALL HAVE GALVANIZING CONFORMING TO ASTM 688.
- SIMPSON PRODUCTS WITH THIS GALVANIZING ARE NOTED AS "ZMAX".

EXISTING WOOD FRAMING MAY BE VERY DRY, HARD, AND EASY TO SPLIT. CONTRACTOR SHALL TAKE CARE NOT TO SPLIT THE EXISTING FRAMING WHEN ADDING FASTENERS AND CONNECTORS. PREDRILLING HOLES MAY BE REQUIRED.

DRILLED ANCHOR BOLTS AND DOUELS:

MECHANICAL ANCHORS IN CONCRETE: THREADED PORTION OF ANCHOR SHALL CONFORM TO ASTM A307 OR GREATER CAPACITY. INSTALL IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS. MINIMUM DEPTH OF EMBEDMENT SHALL CONFORM TO MANUFACTURER'S REQUIREMENTS BUT SHALL NOT BE LESS THAN 45 BOLT DIAMETERS WITHOUT PRIOR APPROVAL. SEE DRAWINGS FOR DEEPER EMBEDMENT IF REQUIRED. APPROVED PRODUCTS INCLUDE:
HILTI HIT-KE HUS-EZ SCREW ANCHOR (ICC-ES EVALUATION REPORT ESR-3027)
SIMPSON TITEN HD SCREW ANCHOR (ICC-ES EVALUATION REPORT ESR-2113)

ADHESIVE ANCHORS IN CONCRETE: THREADED ROD PORTION OF ANCHOR SHALL CONFORM TO ASTM A307 OR GREATER CAPACITY. INSTALL IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS. MINIMUM DEPTH OF EMBEDMENT SHALL CONFORM TO MANUFACTURER'S REQUIREMENTS BUT SHALL NOT BE LESS THAN 8 BOLT DIAMETERS WITHOUT PRIOR APPROVAL. SEE DRAWINGS FOR DEEPER EMBEDMENT IF REQUIRED. APPROVED PRODUCTS INCLUDE:
HILTI HIT-RE 500 SD ADHESIVE SYSTEM (ICC-ES EVALUATION REPORT ESR-2322)
SIMPSON SET-XP ADHESIVE ANCHOR (ICC-ES EVALUATION REPORT ESR-2508)

ADHESIVE ANCHORS IN GROUTED MASONRY: THREADED ROD PORTION OF ANCHOR SHALL CONFORM TO ASTM A307 OR GREATER CAPACITY. INSTALL IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS. MINIMUM DEPTH OF EMBEDMENT SHALL CONFORM TO MANUFACTURER'S REQUIREMENTS BUT SHALL NOT BE LESS THAN 8 BOLT DIAMETERS WITHOUT PRIOR APPROVAL. SEE DRAWINGS FOR DEEPER EMBEDMENT IF REQUIRED. ANCHORS SHALL BE INSTALLED ONLY IN FULLY GROUTED HOLLOW MASONRY CELLS. OBSERVE MINIMUM EDGE REQUIREMENTS OF ANCHORS FROM EDGE OF GROUTED ELEMENTS. APPROVED PRODUCTS INCLUDE:
HILTI HIT-HY TO ADHESIVE ANCHOR (ICC-ES ESR-2682)
SIMPSON SET-XP ADHESIVE ANCHOR (APMO USE ESR-265)

STRUCTURAL STEEL:

STRUCTURAL BEAMS SHALL CONFORM TO ASTM A992 GRADE 50 (BEAMS 21" AND DEEPER CAN BE ASTM A36). MISCELLANEOUS SHAPES AND PLATES SHALL CONFORM TO ASTM A36. PIPE COLUMNS SHALL CONFORM TO ASTM A53 GRADE B (35 KSI). STEEL TUBES SHALL CONFORM TO ASTM A500 GRADE B (44 KSI). BOLTS SHALL CONFORM TO ASTM A307 AND SHALL HAVE STANDARD CUT WASHERS WHERE BEARING ON WOOD (INCLUDING FOUNDATION ANCHOR BOLTS). DETAIL AND FABRICATE ALL STEEL MEMBERS ACCORDING TO AISC STANDARDS. ALL WELDING SHALL CONFORM TO AISC STANDARDS. PROVIDE ONE SHOP COAT OF PRIMER ON ALL STEEL MEMBERS AFTER FABRICATION. STEEL STUDS SHALL BE 50 KSI YIELD POINT STEEL CONFORMING TO REQUIREMENTS OF AISC SPECIFICATION FOR COLD-FORMED STEEL STRUCTURAL MEMBERS.

STEEL ERECTOR SHALL BE RESPONSIBLE TO CONFIRM THAT THE CONNECTIONS AND ERECTION METHODS COMPLY WITH OSMA STEEL ERECTION REQUIREMENTS.

GALVANIZED STEEL:

ALL STEEL MEMBERS NOTED AS GALVANIZED, OR WHERE EXPOSED (LOCATED OUTSIDE OF BUILDING SKIN) SHALL BE SHOP GALVANIZED AFTER FABRICATION WITH 2.0 MIL ZINC COATING IN ACCORDANCE WITH ASTM A123/A123M.

REQUIRED STRUCTURAL SPECIAL INSPECTIONS					
SYSTEM OR MATERIAL	INSPECTION			REMARKS	
	IBC CODE REFERENCE	CODE or STANDARD REFERENCE	FREQUENCY		
			Continuous		
FABRICATORS					
			X	SPECIAL INSPECTIONS APPLY TO VERIFICATION OF DETAILED FABRICATION AND QUALITY CONTROL PROCEDURES INCLUDING REVIEW FOR COMPLETENESS AND ADEQUACY RELATIVE TO THE CODE REQUIREMENTS.	
STEEL					
FABRICATION OF STRUCTURAL ELEMENTS	1704.2		X	REFER TO INSPECTION OF FABRICATOR REQUIREMENTS	
MATERIAL VERIFICATION OF STRUCTURAL STEEL	1704.3 2203.1	ASTM A6 AISC ASD A3.1a AISC LRFD A3.1a	X	GENERAL VERIFICATION OF STEEL TYPE USED	
MATERIAL VERIFICATION OF ANCHOR BOLTS AND THREADED RODS	1704.3	AISC ASD A3.5 AISC LRFD A3.4	X	MANUFACTURER'S CERTIFIED TEST REPORTS	
WELDING					
VERIFICATION OF WELD FILLER	1704.3	AISC 360 A3.5		MANUFACTURER'S CERTIFICATE OF COMPLIANCE REQUIRED	
MATERIAL VERIFICATION OF STRUCTURAL STEEL	1704.3	AWS D1.1	X	SINGLE-PASS FILLET WELDS <= 5/16"	
POST INSTALLED CONCRETE ANCHORS					
INSTALLATION	1703.4.2 1704.13.3	ICC EVALUATION REPORT	X	SPECIAL INSPECTIONS APPLY TO ANCHOR PRODUCT NAME, TYPE, AND DIMENSIONS, HOLE DIMENSIONS, COMPLIANCE WITH DRILL BIT REQUIREMENTS, CLEANLINESS OF THE HOLE AND ANCHOR/ADHESIVE INSTALLATION, ANCHOR EMBEDMENT, AND TIGHTENING TORQUE	
WOOD					
MATERIAL VERIFICATION OF STRUCTURAL PANELS AND NAILS FOR DIAPHRAGMS AND SHEAR WALLS	1704.6.1		X	PRIOR TO COVER	
VERIFICATION OF FRAMING SIZE AT DIAPHRAGM AND SHEAR WALL PANEL EDGES			X	PRIOR TO COVER	

LEGEND

⬡ — BEARING WALL TYPE - SEE BEARING WALL SCHEDULE

⬡ — SHEARWALL TYPE - SEE SHEARWALL SCHEDULE

⬡ — FOOTING SIZE - SEE FOOTING SCHEDULE

⬡ — COLUMN SIZE - SEE COLUMN SCHEDULE

☁ ⬡ — REVISION NUMBER

⬡ — ELEVATION — WORK POINT

⬡ — SECTION MARK
SECTION NUMBER
SHEET NUMBER

⬡ — ELEVATION MARK
ELEVATION NUMBER
SHEET NUMBER

⬡ — DETAIL MARK
DETAIL NUMBER
SHEET NUMBER

⬡ — FOOTING SIZE
COLUMN SIZE

ABBREVIATIONS

1 — NUMBER OR POUNDS

⬡ — AND

⬡ — AT

⬡ — CENTER LINE

⬡ — LINTEL

⬡ — PLATE

⬡ — DIAMETER OR ROUND

⬡ — SQUARE

⬡ — EXISTING

⬡ — NEW

⬡ — ANCHOR BOLT

⬡ — ADHESIVE

⬡ — ANCHOR

⬡ — ARCHITECT

⬡ — BOARD

⬡ — BUILDING

⬡ — BLOCKING

⬡ — BOTTOM

⬡ — CONTROL JOINT

⬡ — CEILING

⬡ — CLEAR

⬡ — COUNTERSINK

⬡ — COLUMN

⬡ — CONCRETE

⬡ — CONNECTION

⬡ — CONTINUOUS

⬡ — CLOSURE STRIP

⬡ — CONTROL

⬡ — CENTER TO CENTER

⬡ — DRILLED ANCHOR

⬡ — DOUBLE

⬡ — DIAMETER

⬡ — DOWN

⬡ — DETAIL

⬡ — DRAWING

⬡ — EACH

⬡ — EACH WAY

⬡ — ELEVATION

⬡ — ENGINEER

⬡ — EQUAL

⬡ — EXPANSION JOINT

⬡ — EXTERIOR

⬡ — FLAT BAR

⬡ — FLOOR

⬡ — FOUNDATION

⬡ — FACE OF CONCRETE

⬡ — FACE OF STUD

⬡ — FACE OF MASONRY

⬡ — FOOTING

⬡ — GAUGE

⬡ — GALVANIZED

⬡ — GLUE LAMINATED BEAM

⬡ — GYPSUM SHEATHING BOARD

⬡ — GYPSUM WALL BOARD

⬡ — GYPSUM

⬡ — HANGER

⬡ — HOLLOW STRUCTURAL SECTION

HORIZ. — HORIZONTAL

HT. — HEIGHT

HYD. — HYDROGEN

IS.F. — INSIDE FACE

JO. — JOIST

JO. — JOINT

⬡ — POUNDS

LDGR. — LEDGER

LSL. — LAMINATED STRAND LUMBER

LVL. — LAMINATED VENEER LUMBER

L.H. — LOW HYDROGEN

MB. — MACHINE BOLT

MEM. — MEMBER

MANUF. — MANUFACTURER

MAS. — MASONRY

MAX. — MAXIMUM

MIN. — MINIMUM

MISC. — MISCELLANEOUS

NTS. — NOT TO SCALE

NO. — NUMBER

O/C. — ON CENTER

OPP. — OPPOSITE

OPP. HD. — OPPOSITE HAND

OPNG. — OPENING

O.S.B. — ORIENTED STRAND BOARD

O.S.F. — OUTSIDE FACE

PSL. — PARALLEL STRAND LUMBER

PEN. — PENETRATION

PLCS. — PLACES

PLYD. — PLYWOOD

PR. — PRESSURE TREATED

REF. — REFERENCE

REINF. — REINFORCING

REQ'D. — REQUIRED

RF. — ROOF

S.J. — SAWCUT JOINT

SHTG. — SHEATHING

SIM. — SIMILAR

STD. — STANDARD

STL. — STEEL

T&B. — TOP AND BOTTOM

T&G. — TONGUE AND GROOVE

T&S. — TONGUE AND GROOVE

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DRAWING INDEX

- S1101 GENERAL STRUCTURAL NOTES
- S1401 OVERALL ROOF PLAN
- S5301 ROOF FRAMING DETAILS
- S5302 ROOF FRAMING DETAILS
- S5303 FALL PROTECTION AND GUARDRAIL DETAILS

REROOFING NARRATIVE

THIS IS A REROOFING PROJECT FOR BEAVERTON SCHOOLS THAT ENCOMPASSES VARIOUS ROOF AREAS OF THIS SCHOOL. MINOR ROOF LEVEL ONLY LATERAL UPGRADES WERE ELECTED TO BE PERFORMED DURING THIS PROJECT. COMPLETE LOAD PATH FROM ROOF DIAPHRAGMS THROUGH SHEAR WALLS TO FOUNDATION HAVE NOT BEEN UPDATED AT THIS TIME. PROJECT ALSO INCLUDED SEISMIC ATTACHMENT OF MECHANICAL UNITS THAT ARE MOVED DURING THE PROCESS, NEW FALL PROTECTION DEVICES, AND ROOF LADDER UPGRADES.



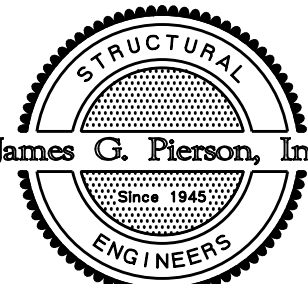
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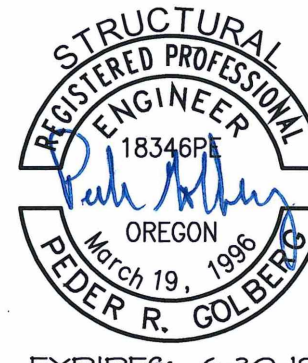
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



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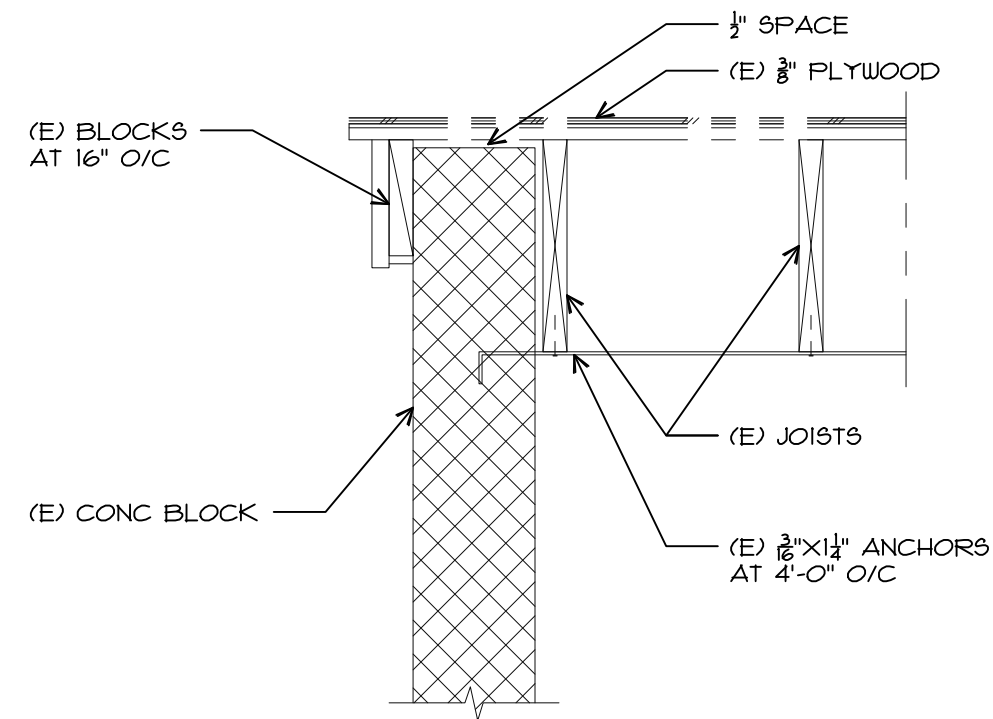
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S1101

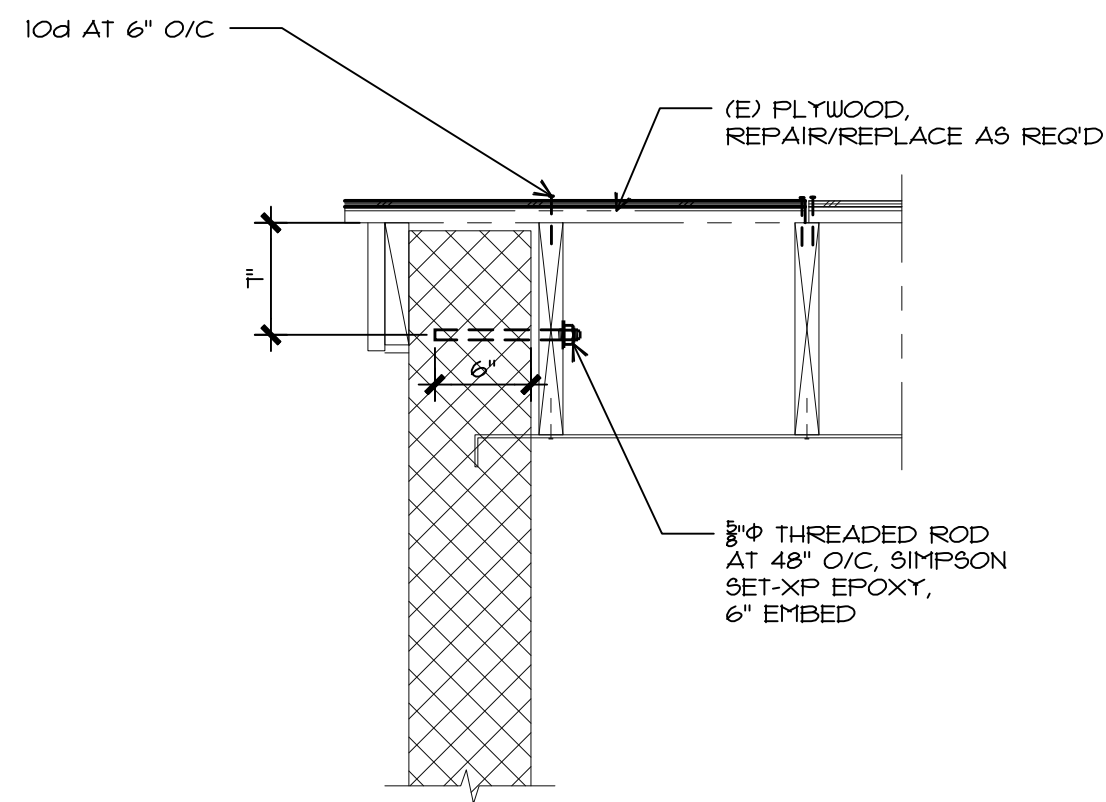


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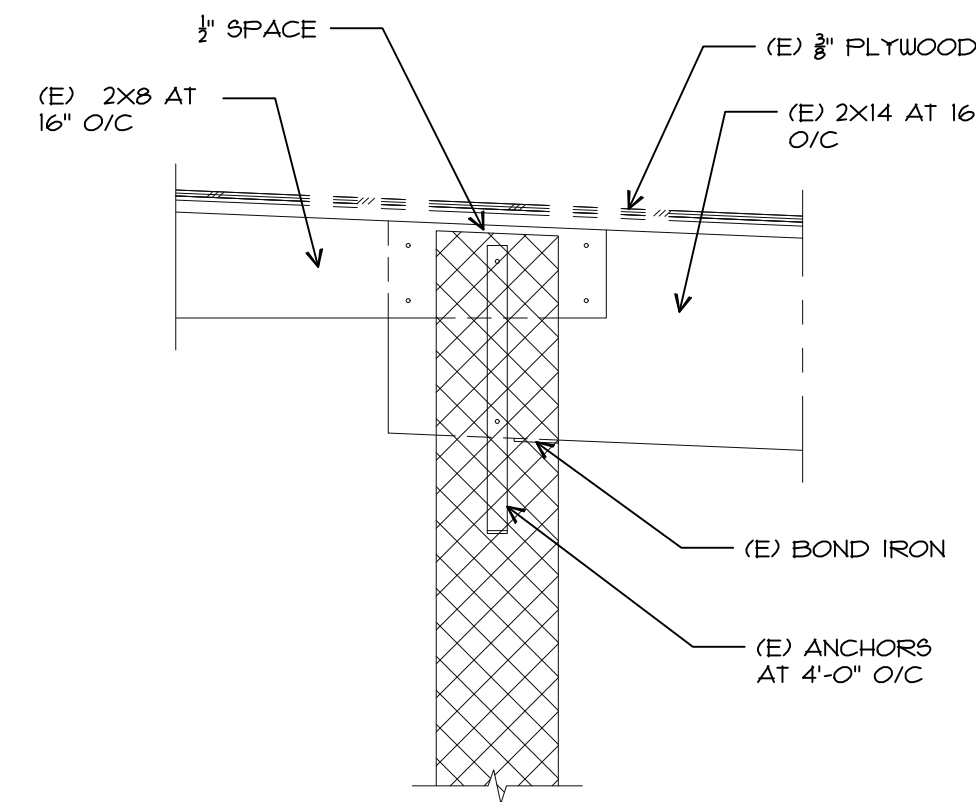
	SLEEPER CURBS W/ EQUIPMENT OVER ROOF
	CURBED MECHANICAL UNIT
	CURBED ROOF ACCESS HATCH
	CURBED SKYLIGHT
	ROOF ACCESS LADDER - SEE ARCH DWGS
	MASONRY CHIMNEY
	SCREEN WALL
	NEW FALL ARREST ANCHOR (TYPICAL OF 15') SEE 5/9503 FOR DETAIL



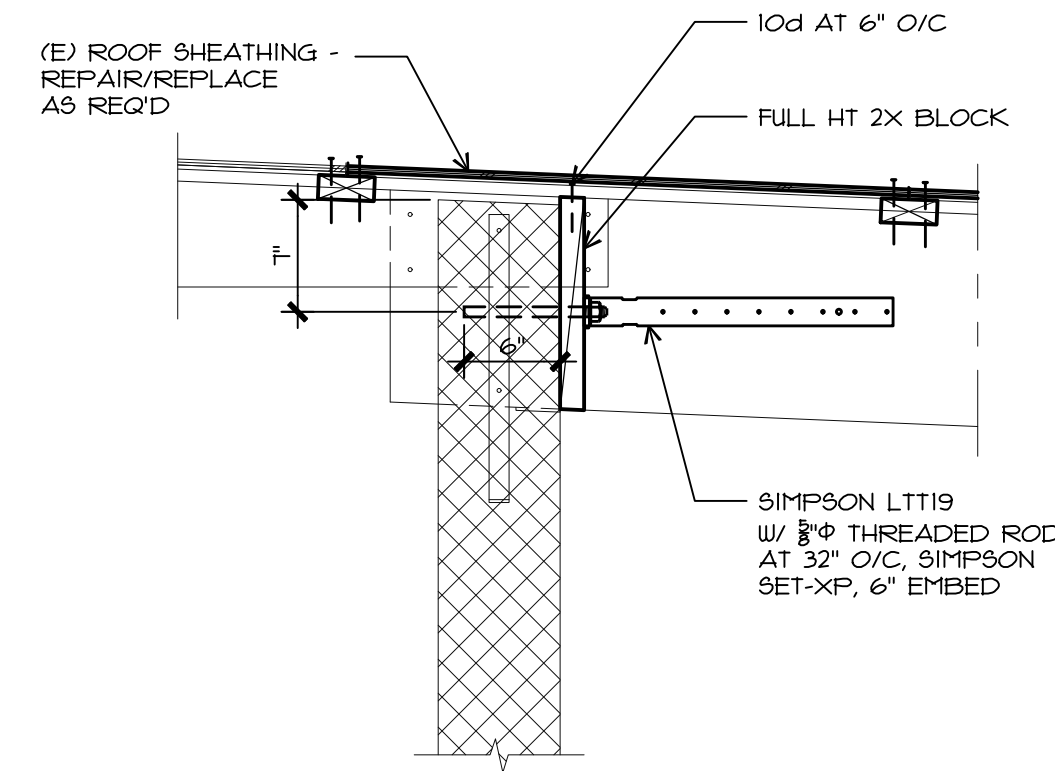
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S5301



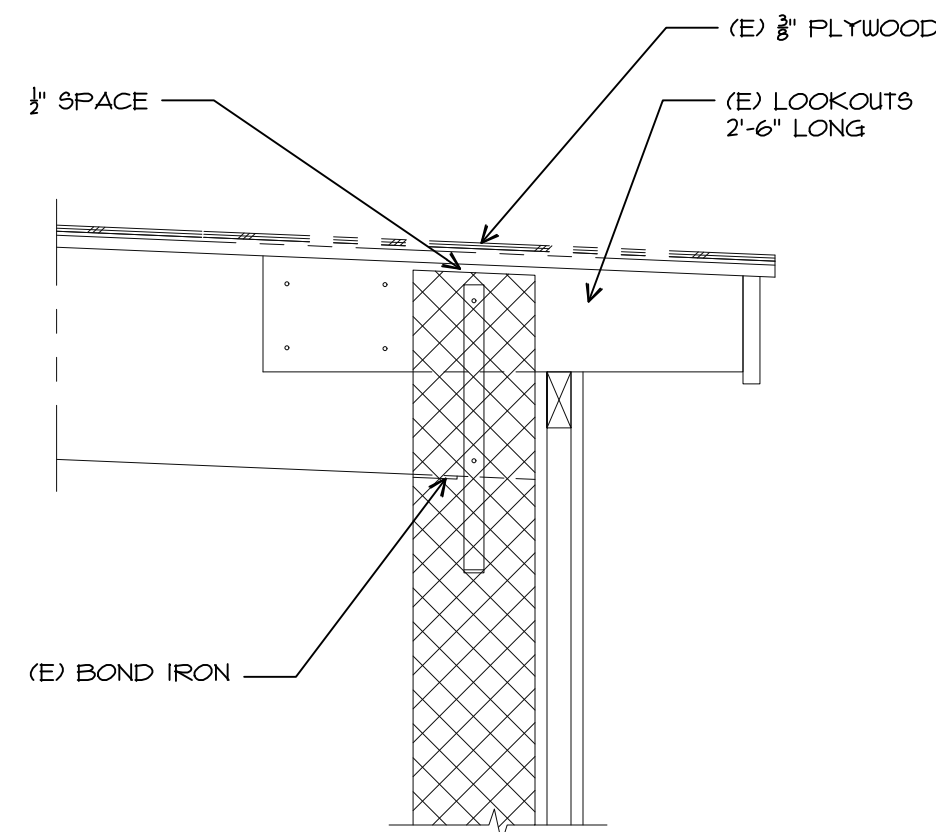
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S5301



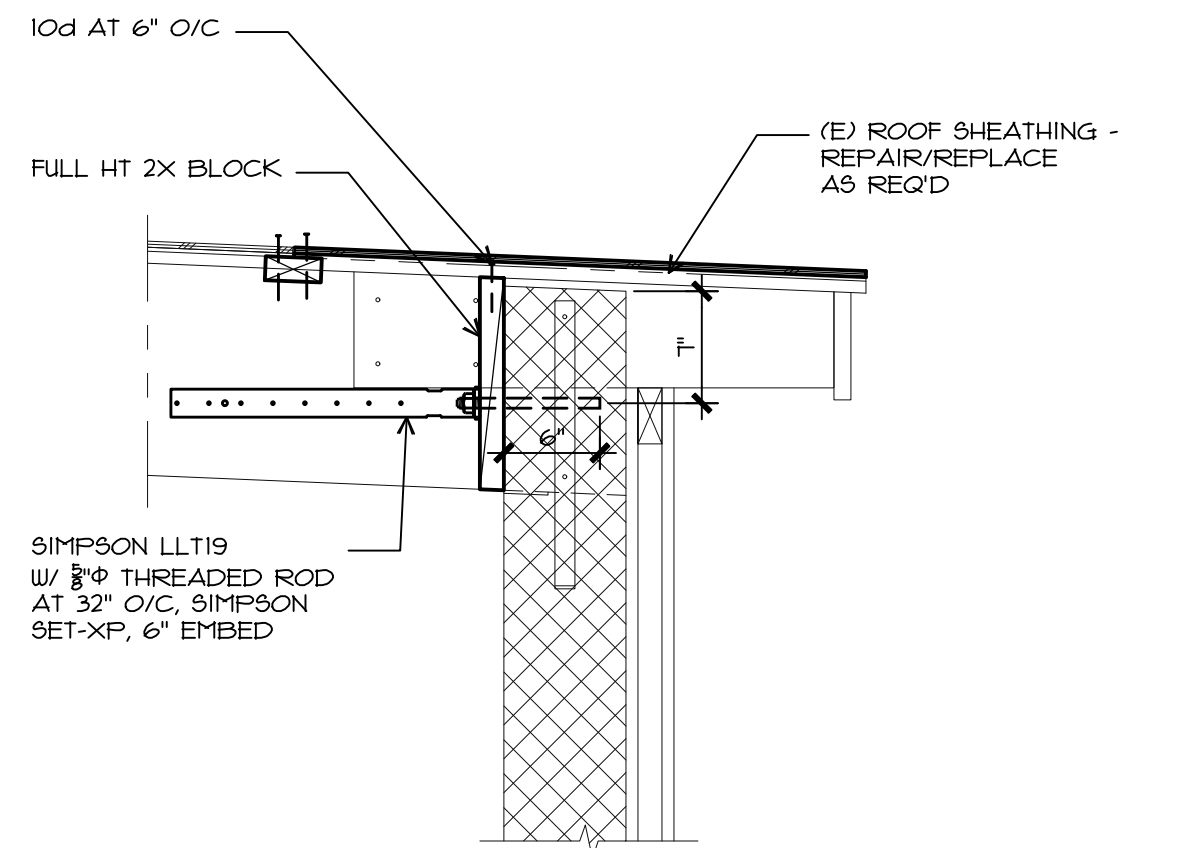
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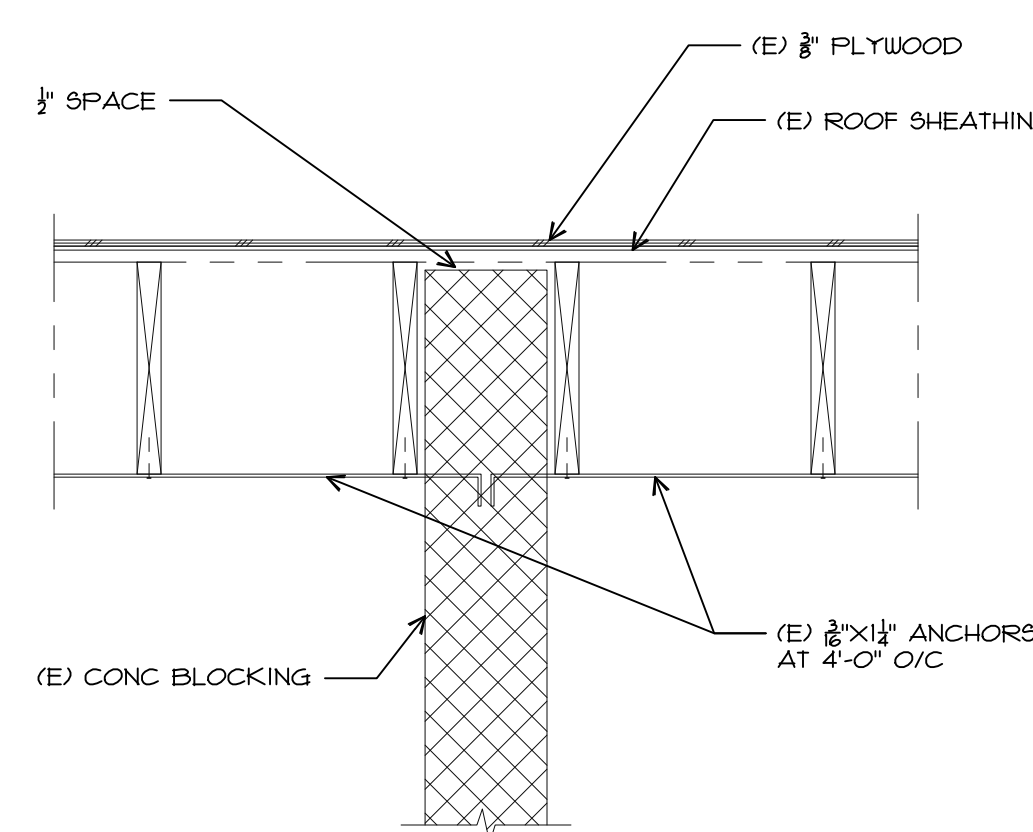
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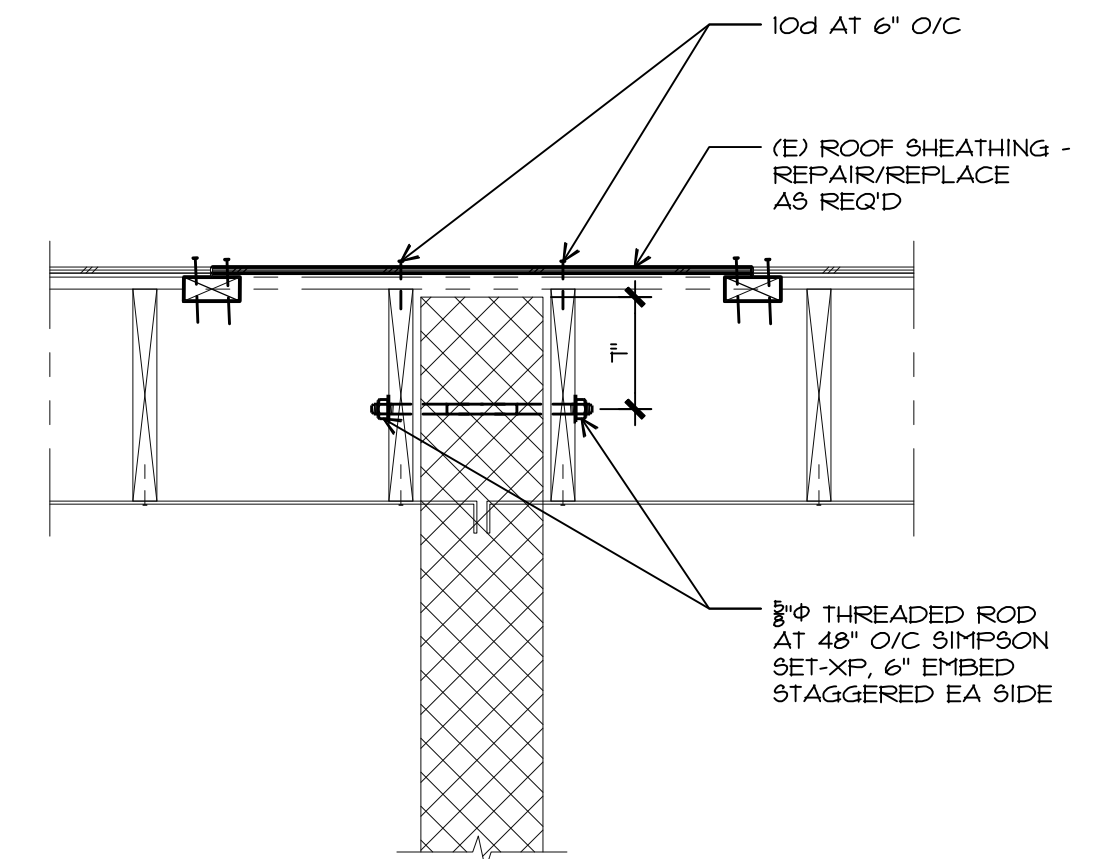
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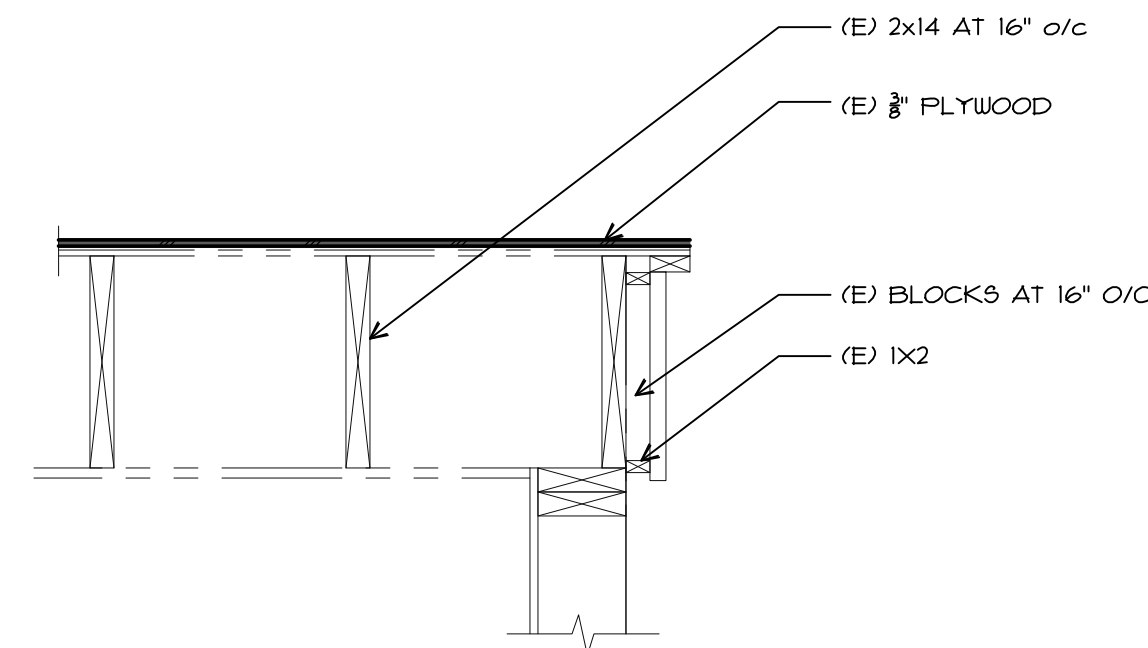
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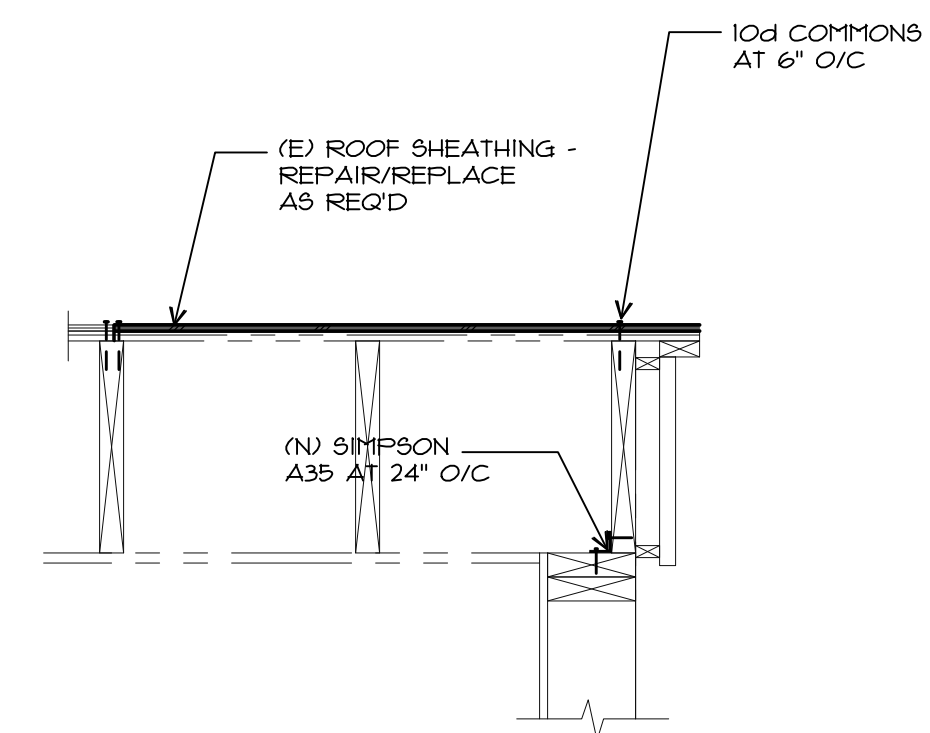
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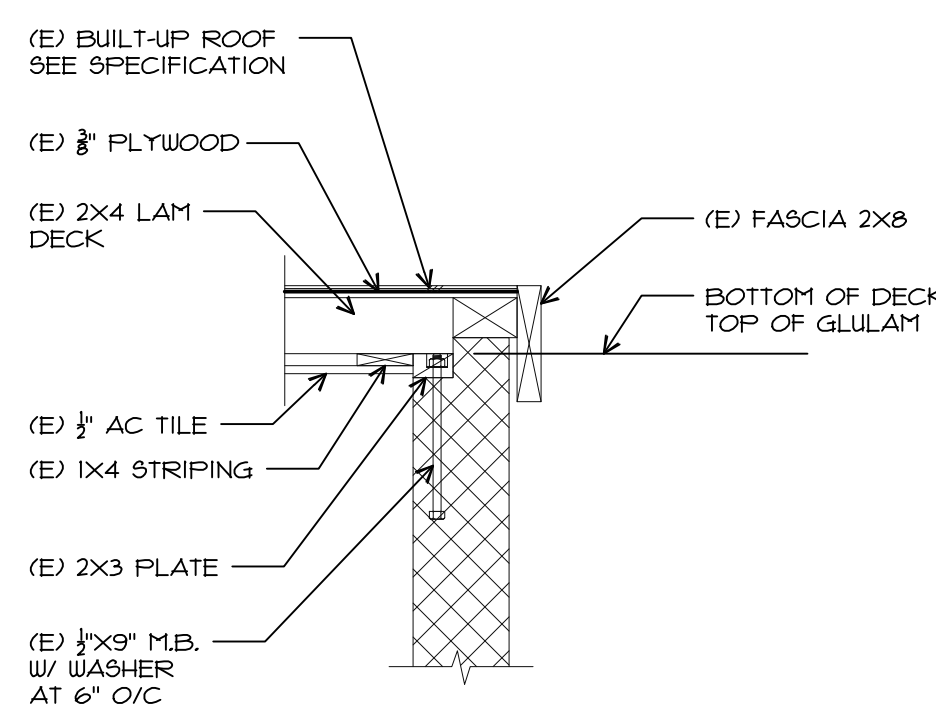
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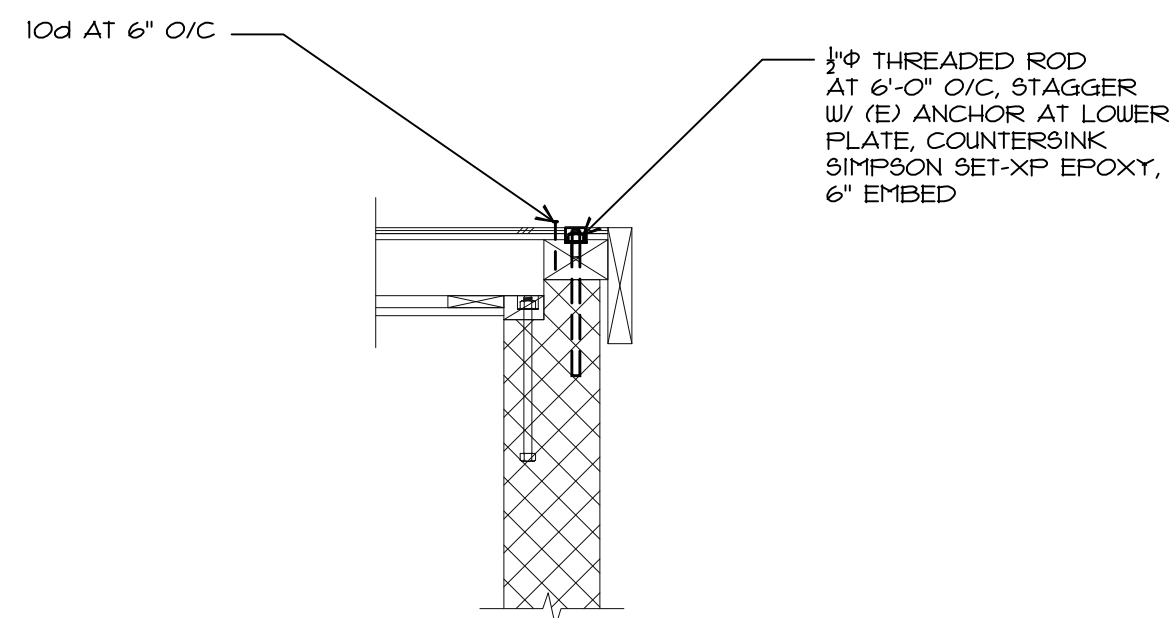
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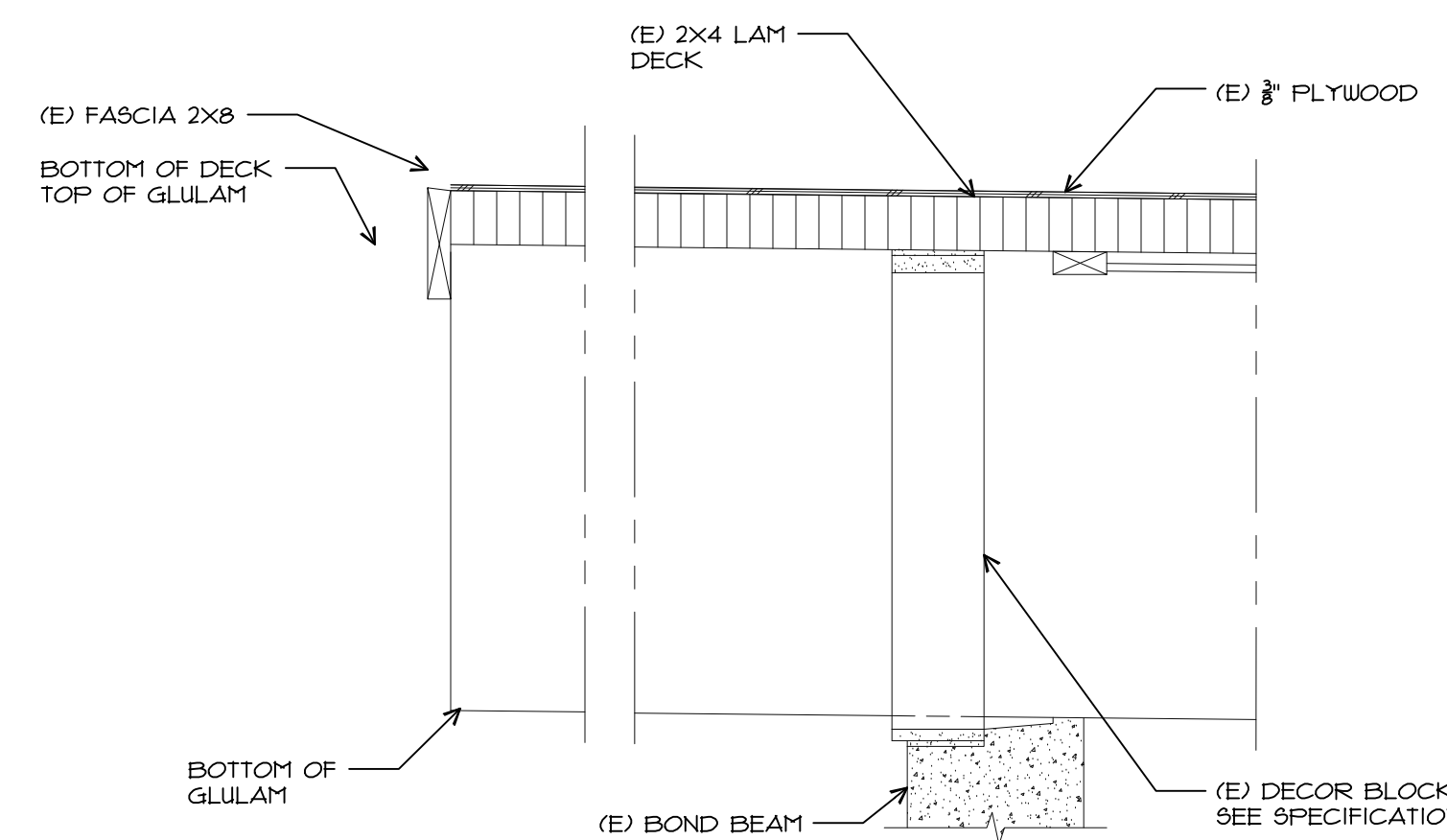
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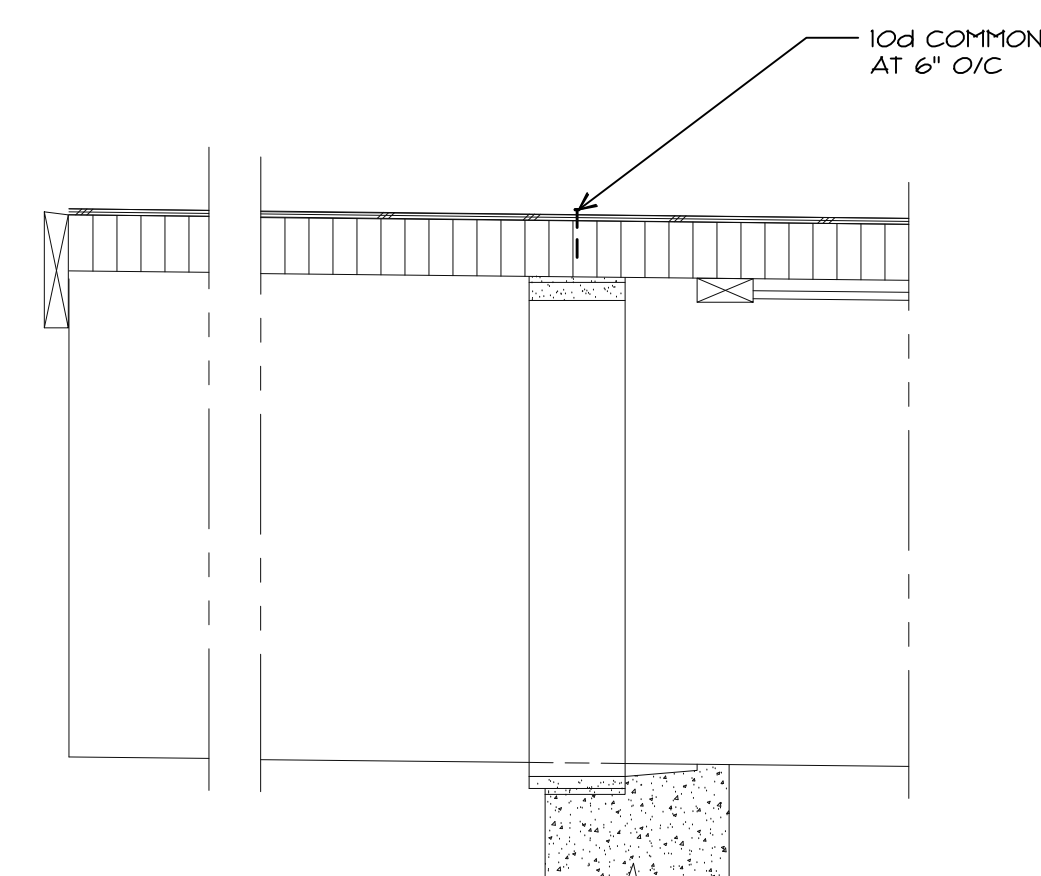
7E EAVE DETAIL
S5301



7 EAVE DETAIL
S5301



8E EAVE DETAIL
S5301



8 EAVE DETAIL
S5301



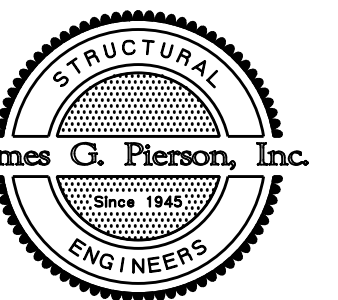
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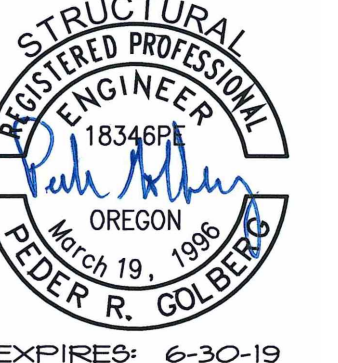
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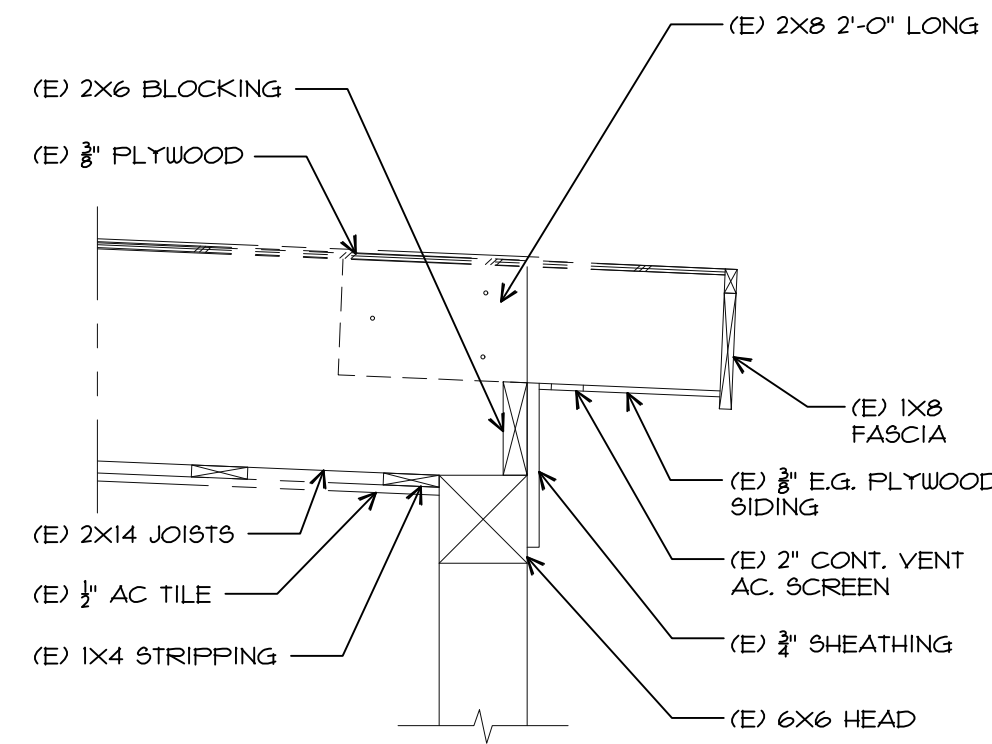
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project # 119190

STRUCTURAL DETAILS

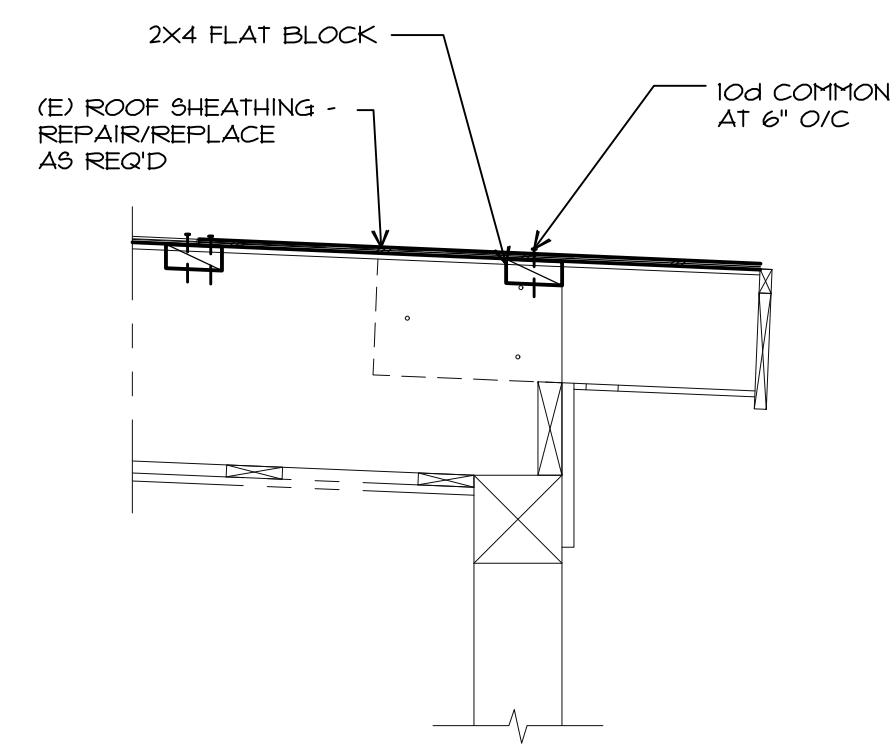
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9E
\$5302

EAVE DETAIL

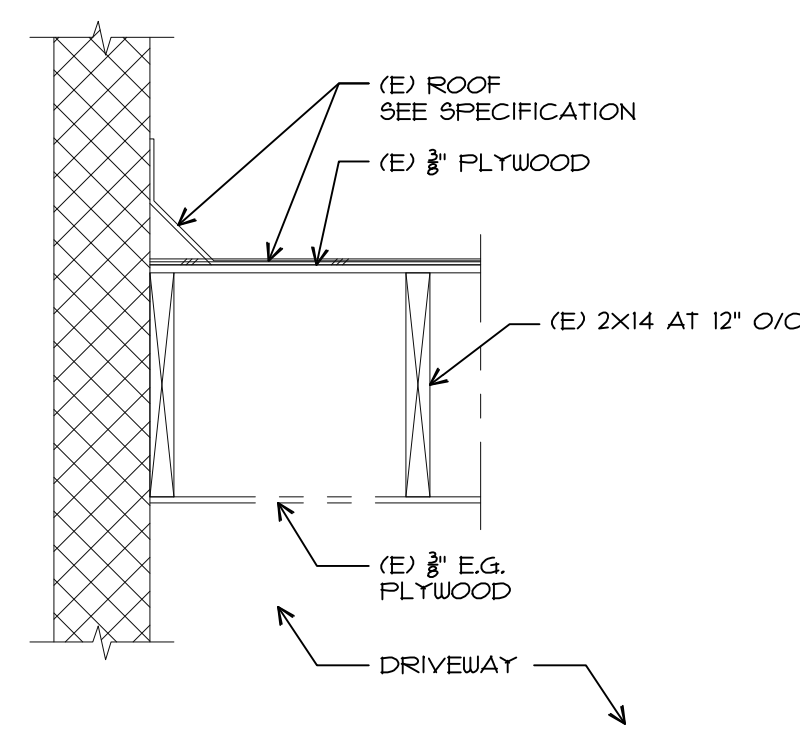
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9
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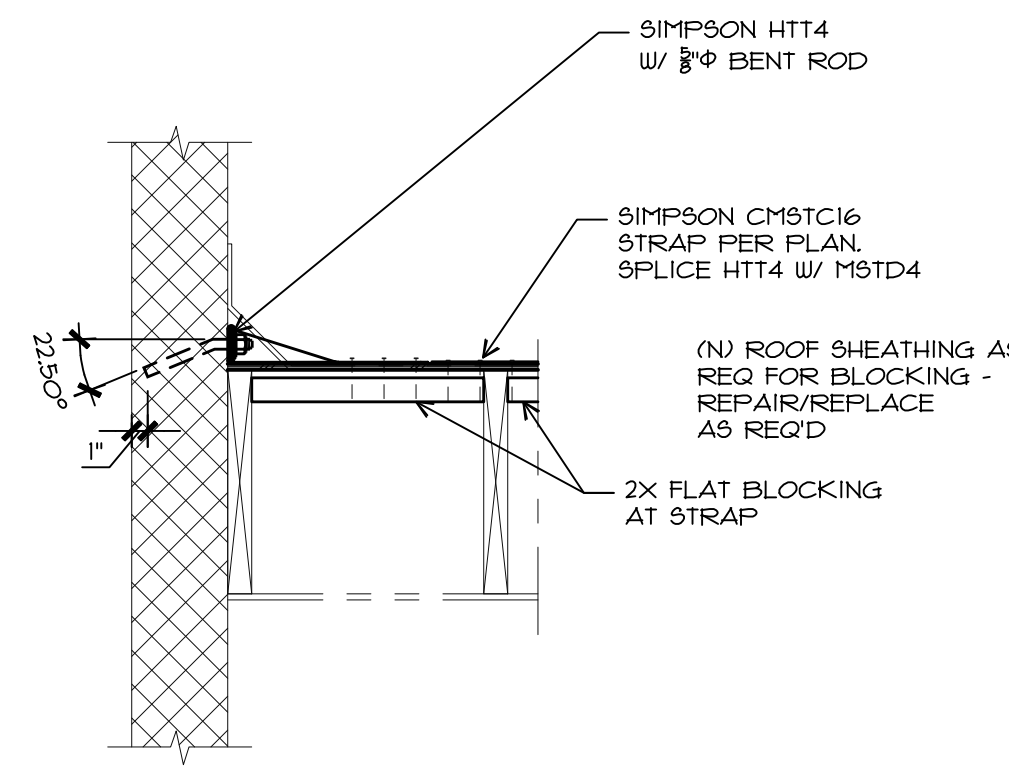
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10E
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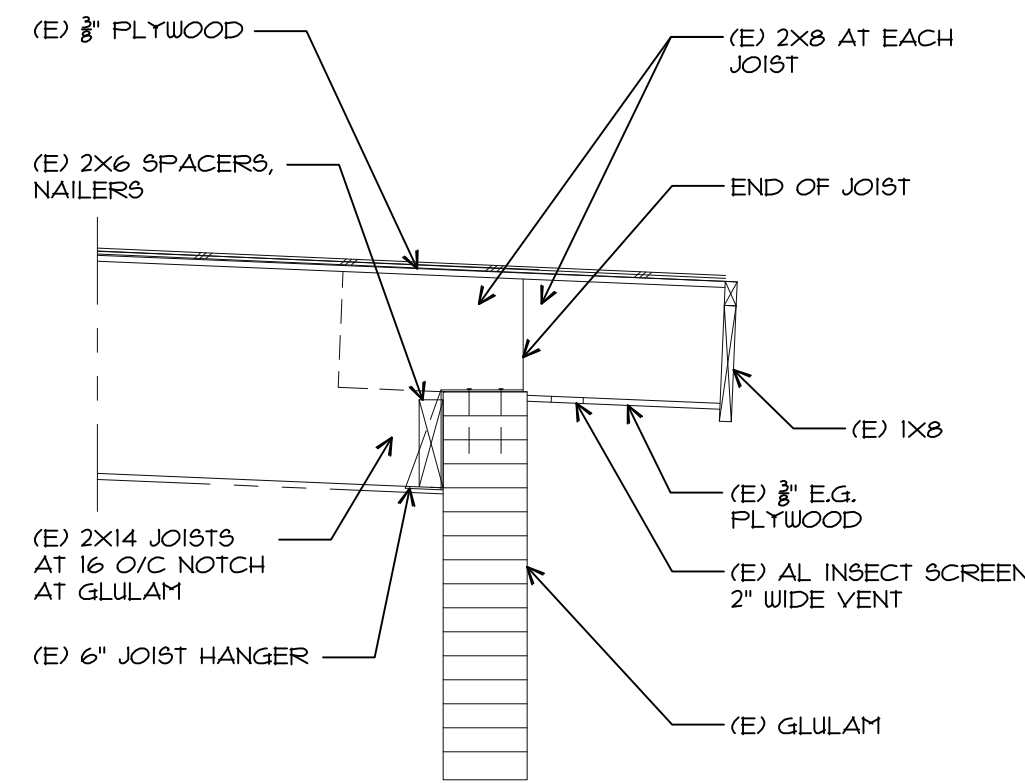
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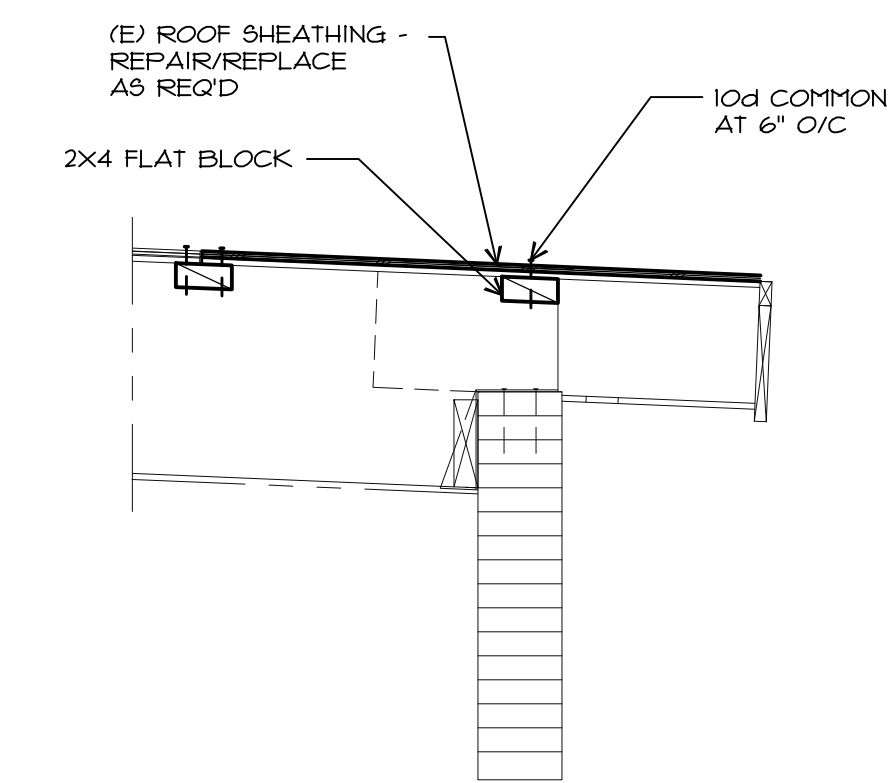
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11E
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EAVE DETAIL AT GLULAM

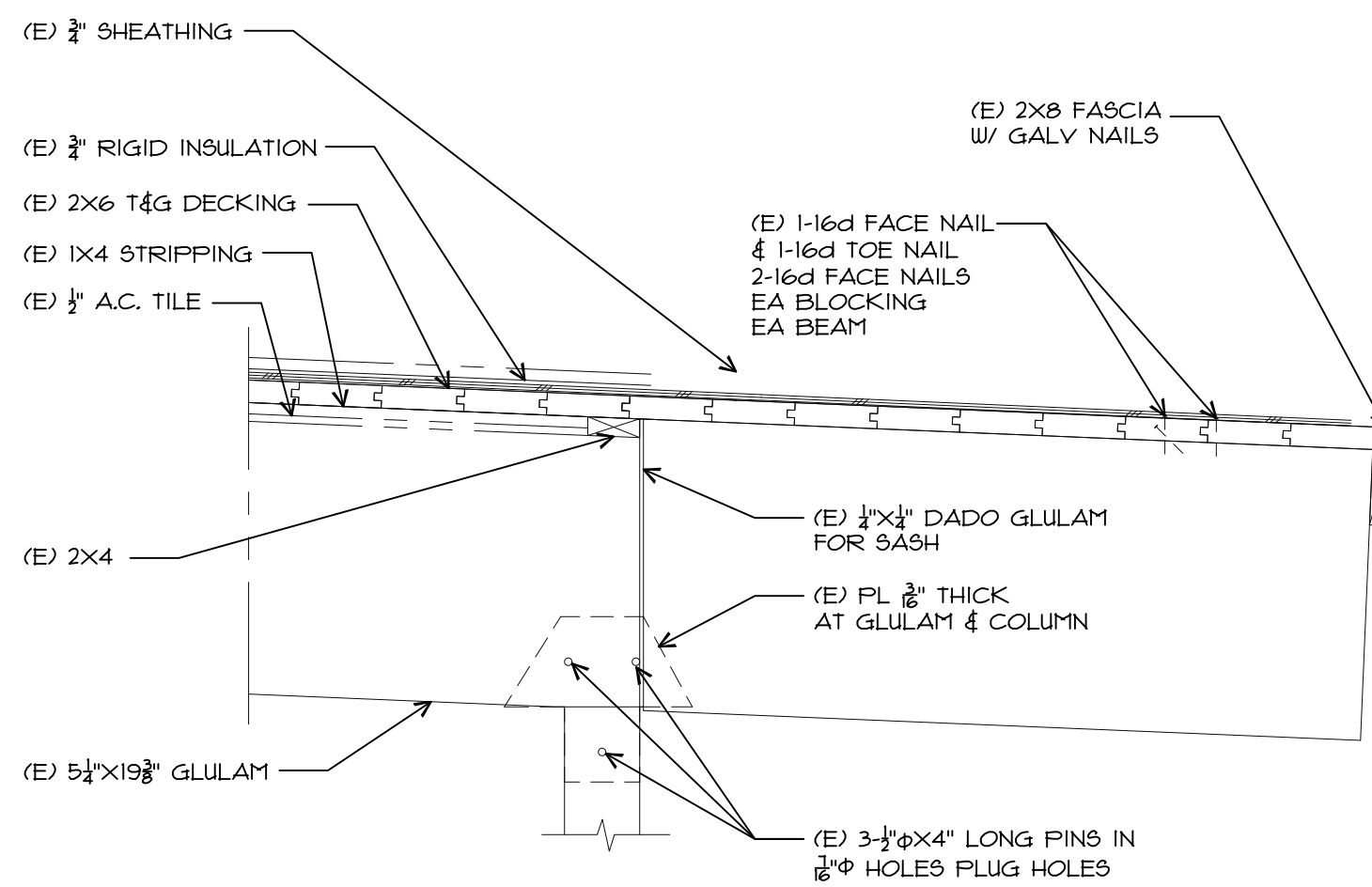
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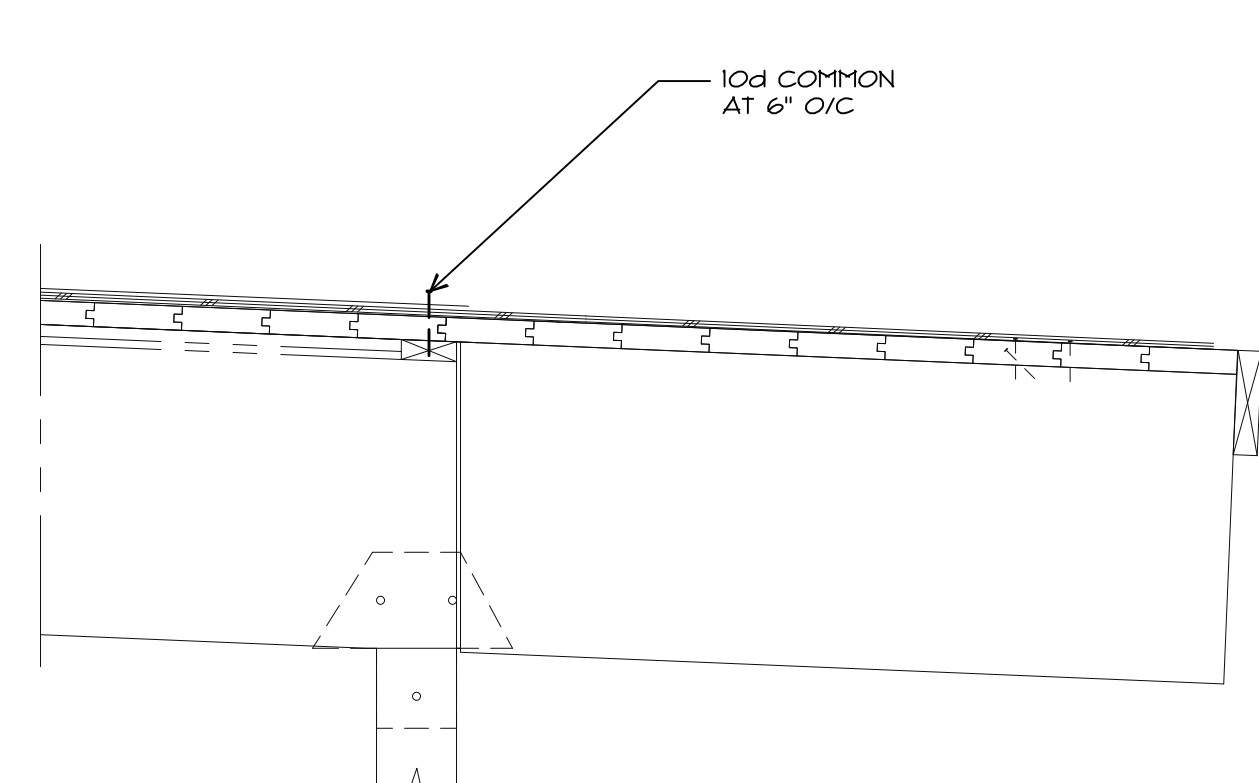
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12E
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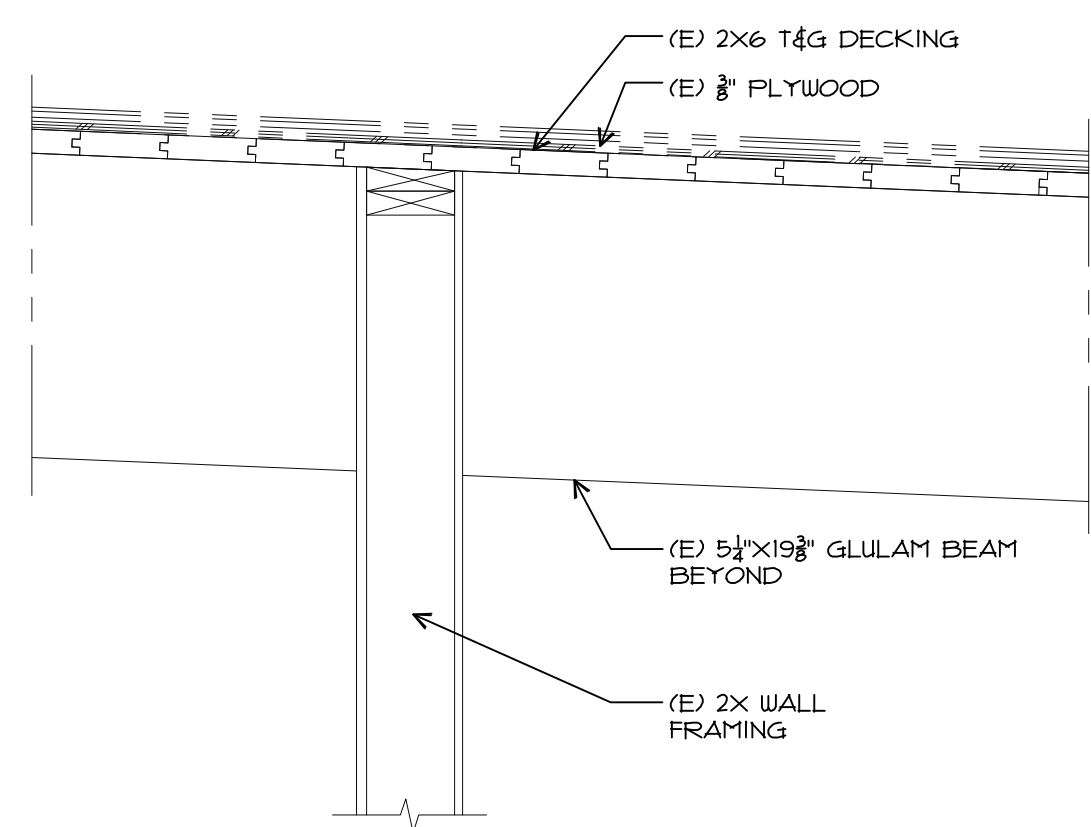
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12
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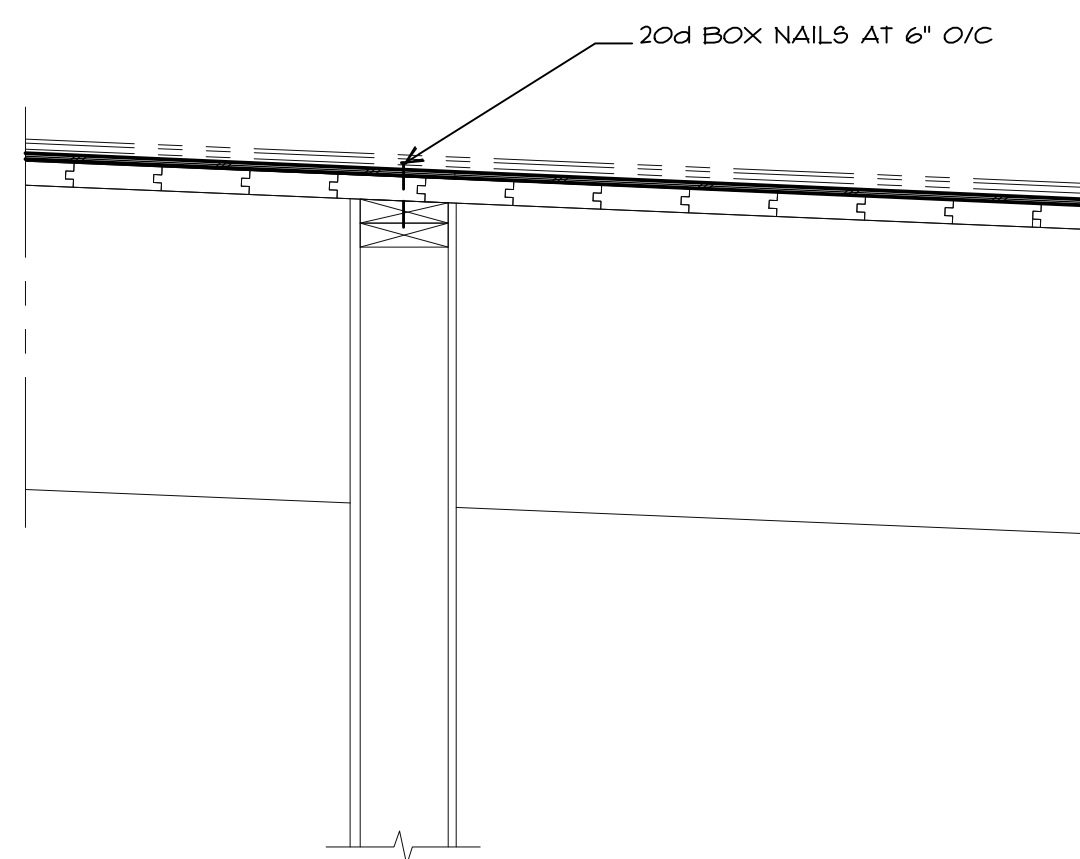
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13E
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EAVE & BEAM CONNECTION DETAIL

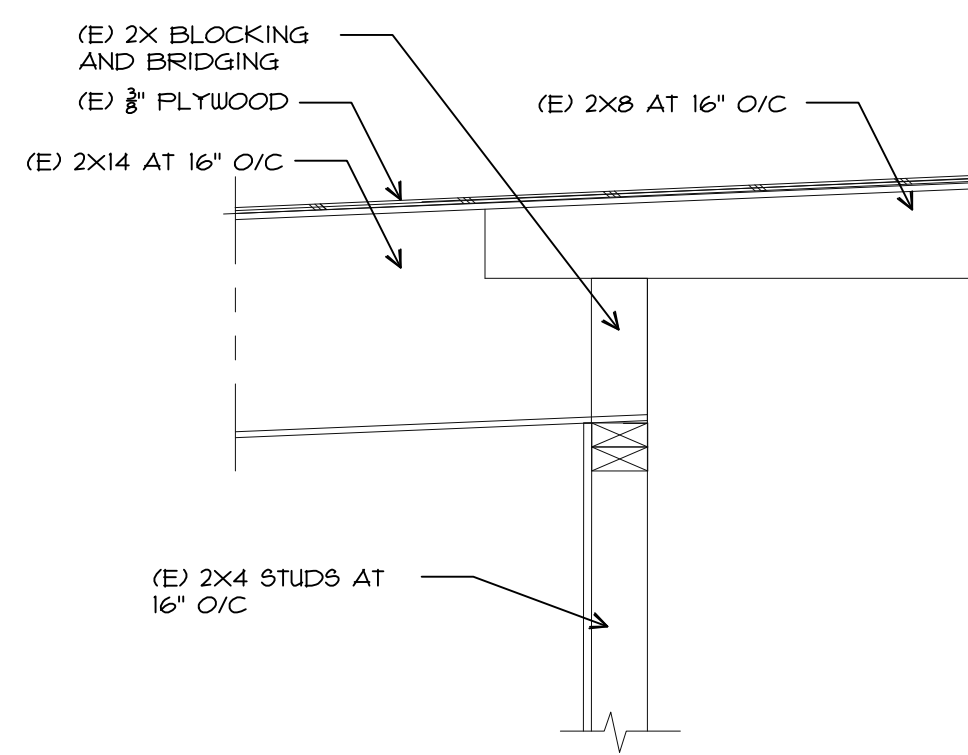
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13
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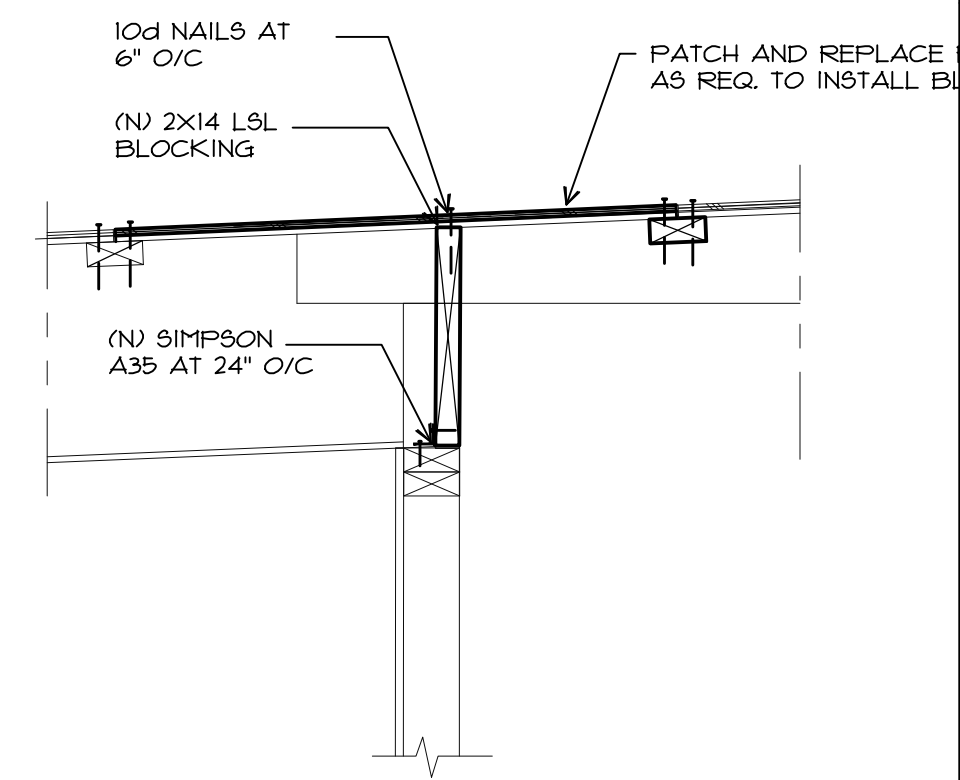
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14E
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CORRIDOR WALL

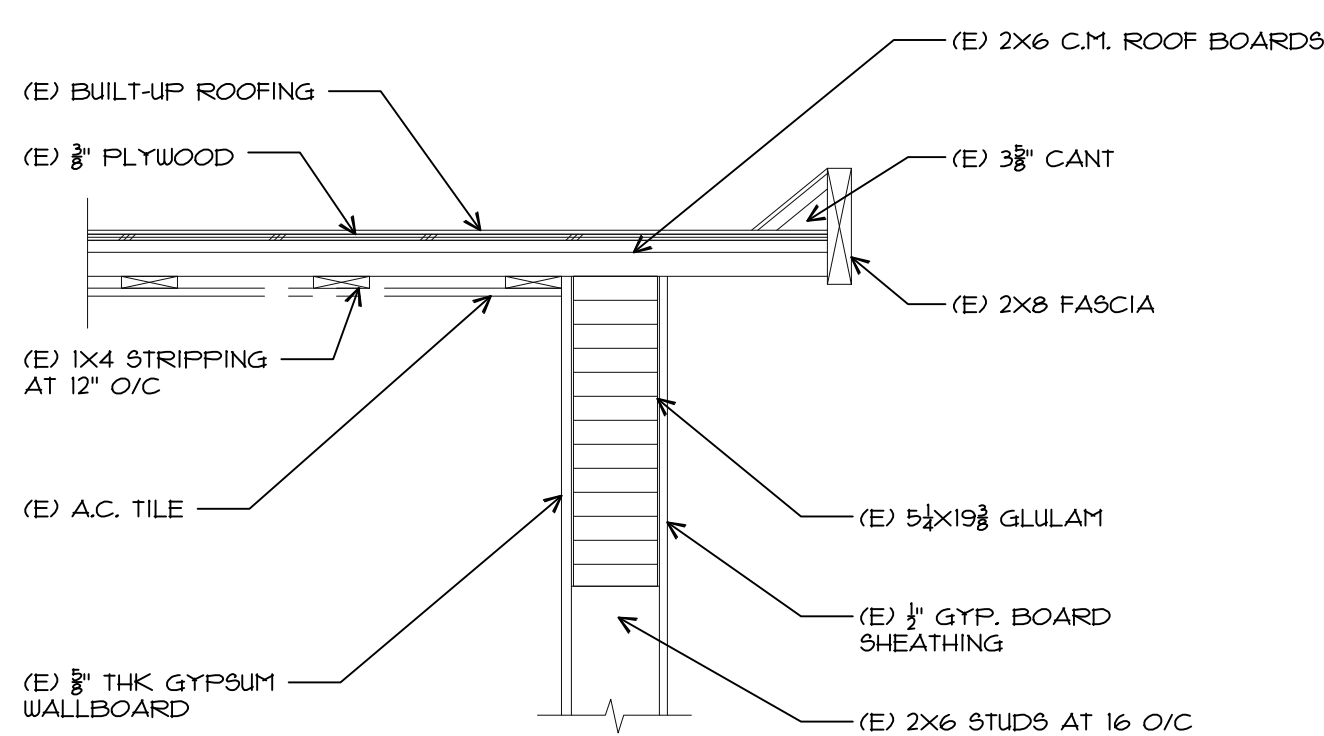
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CORRIDOR WALL

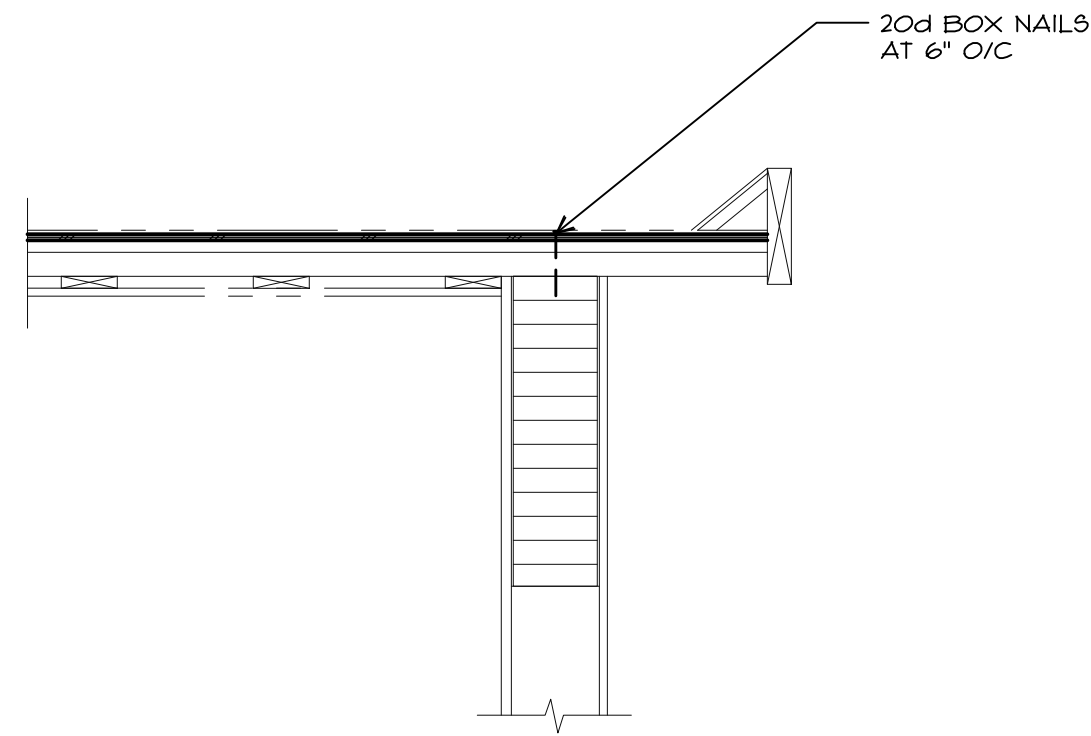
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15E
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ROOF-SIDE OVERHANG

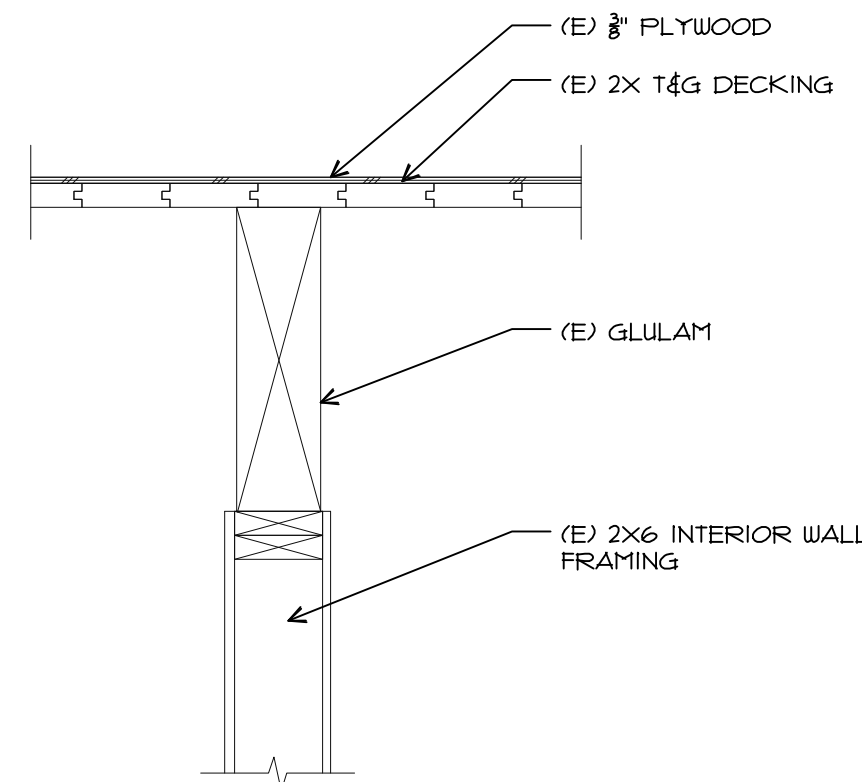
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15
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ROOF-SIDE OVERHANG

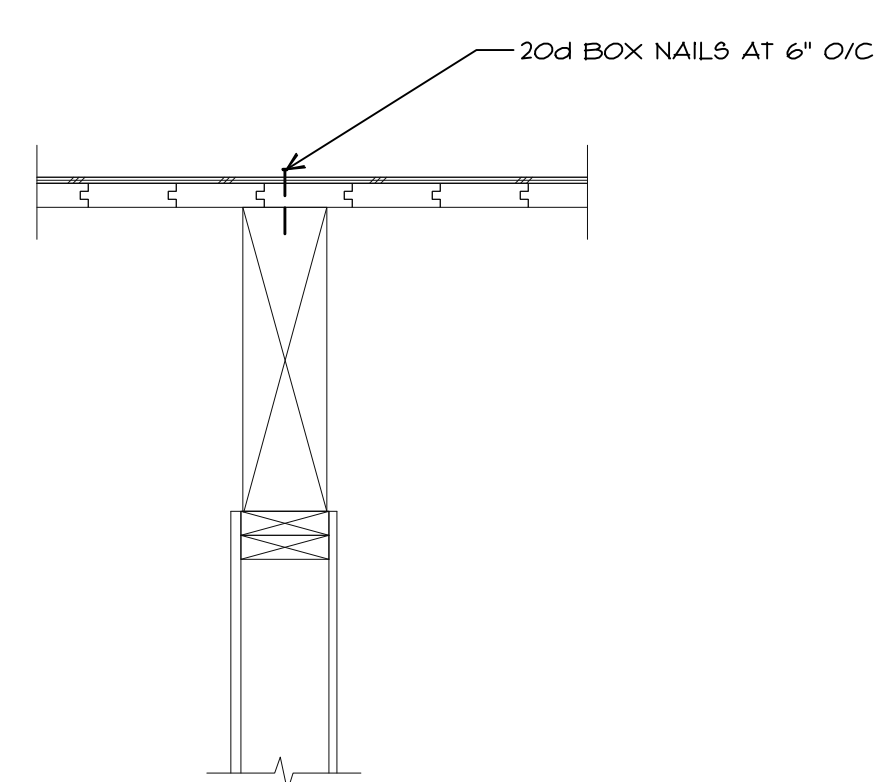
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16E
\$5302

DETAIL

1\"/>



16
\$5302

DETAIL

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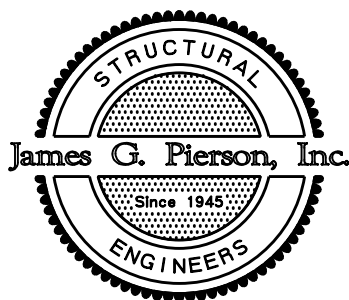
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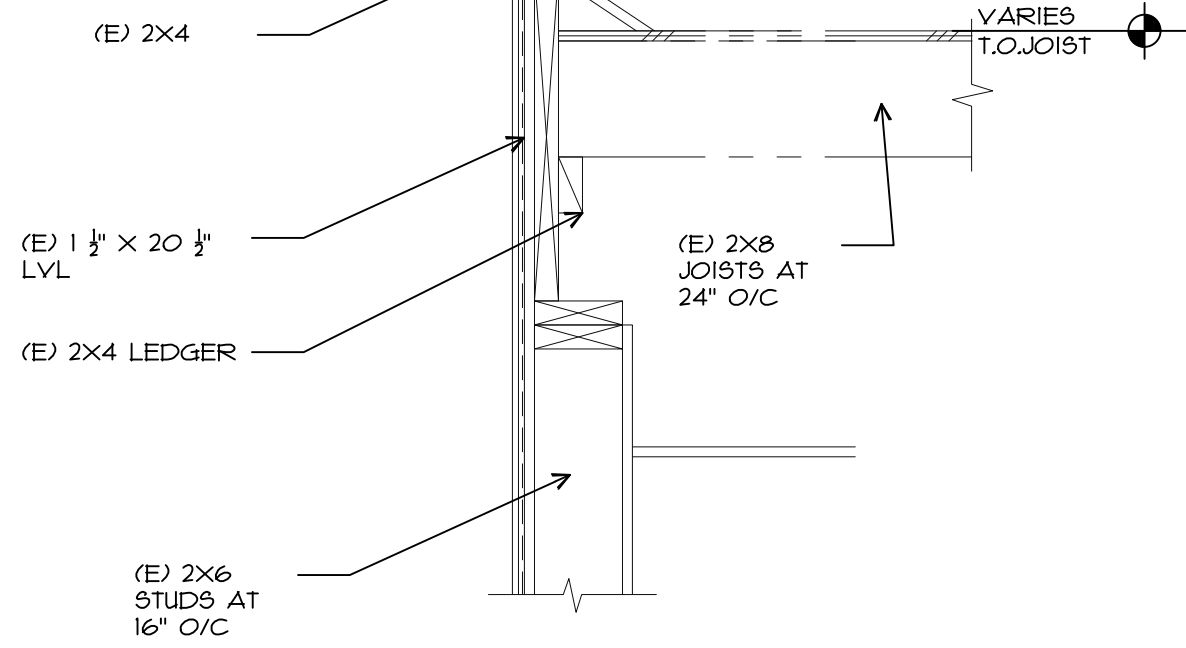
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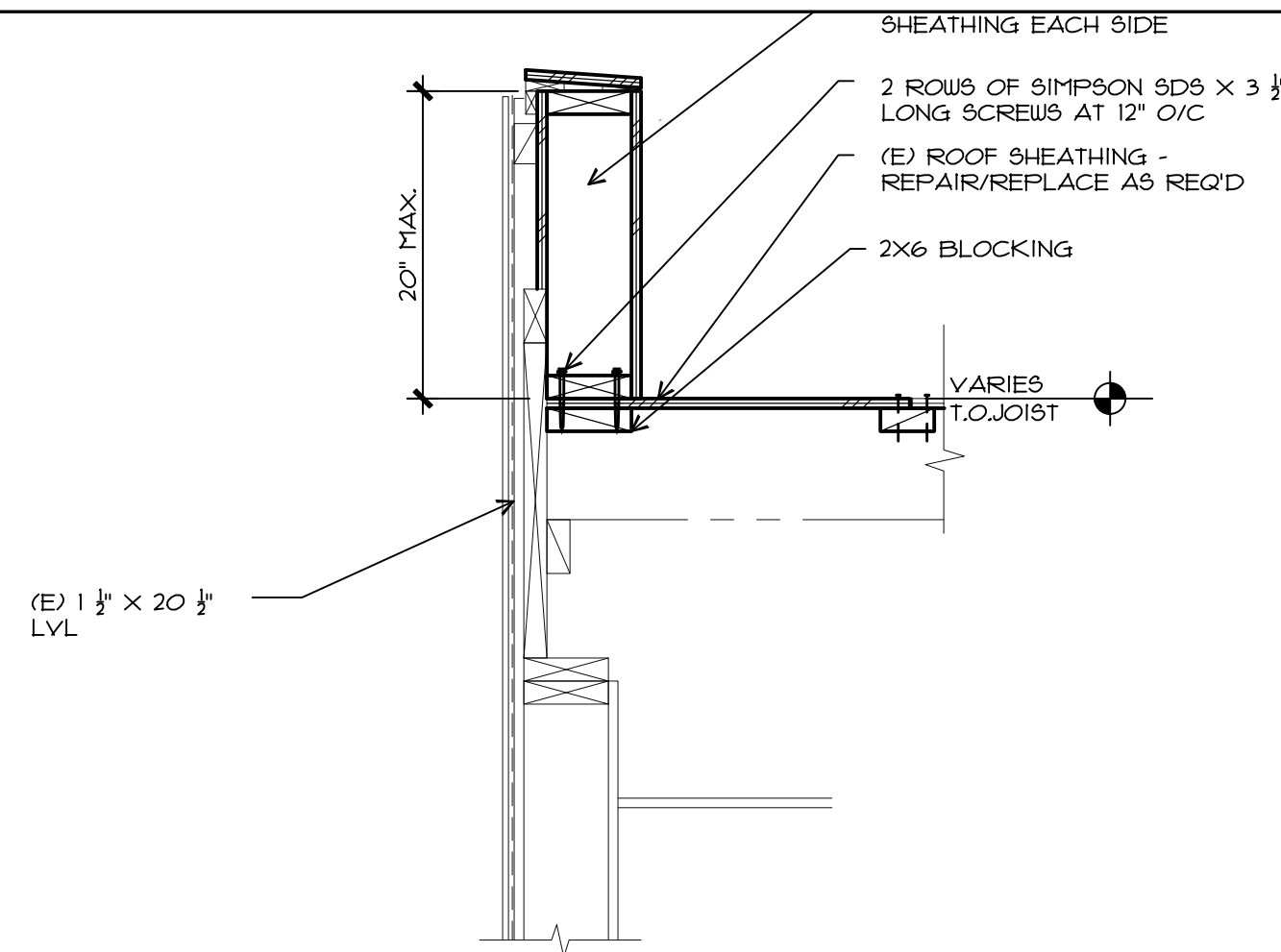
project # | 119190

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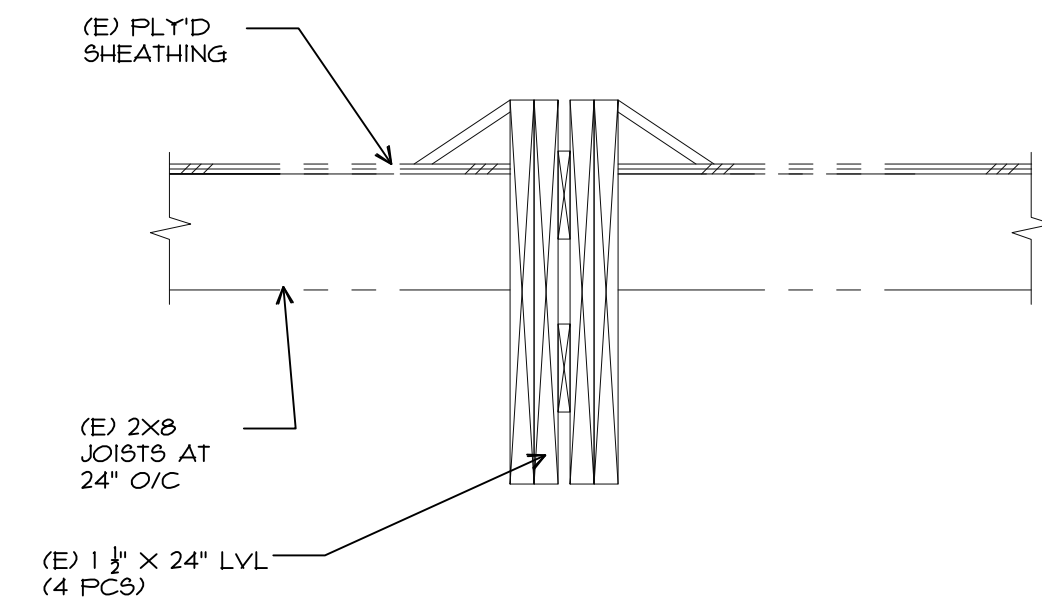
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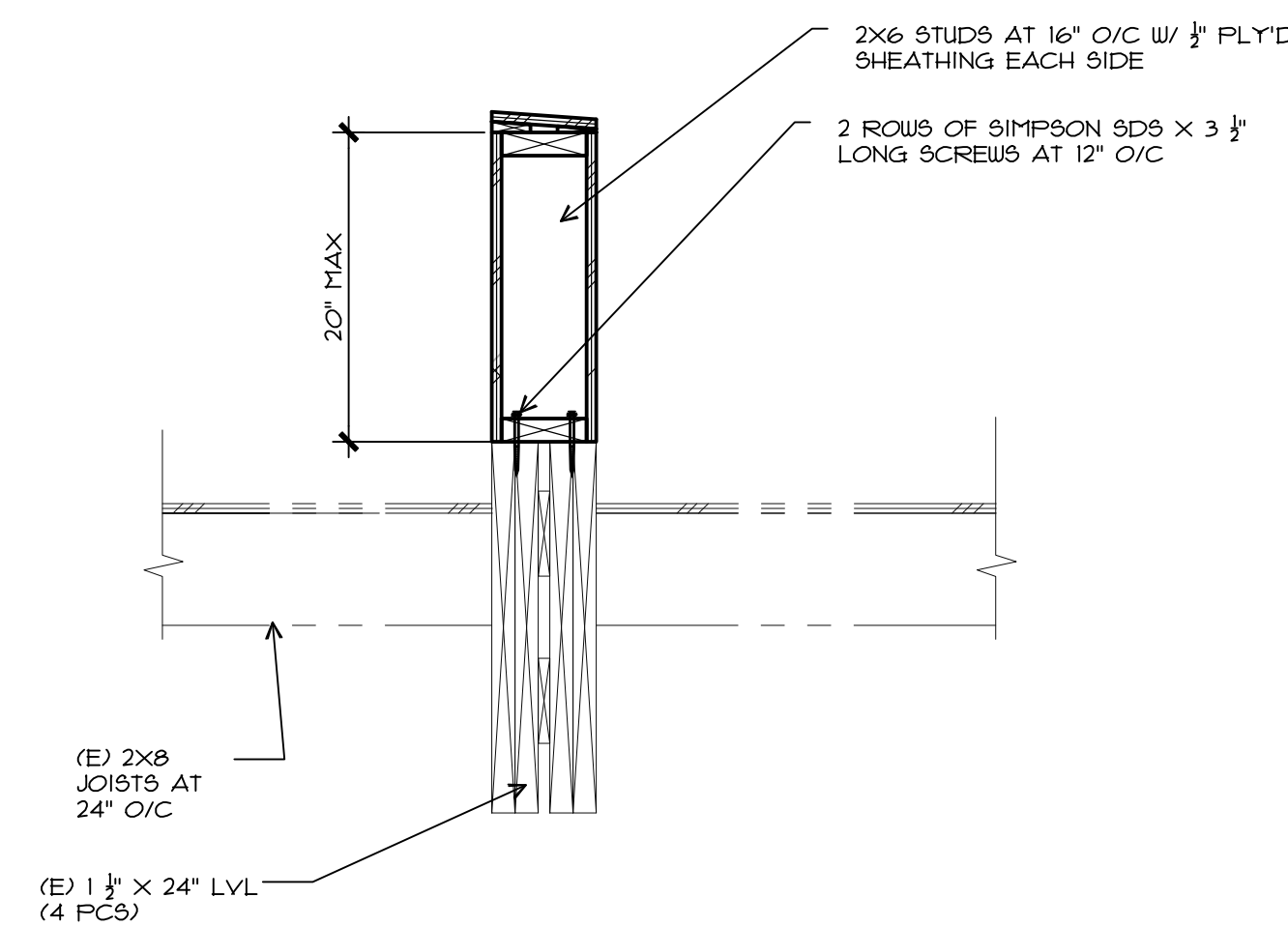
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S5303
PARAPET WALL
P = 1'-0"



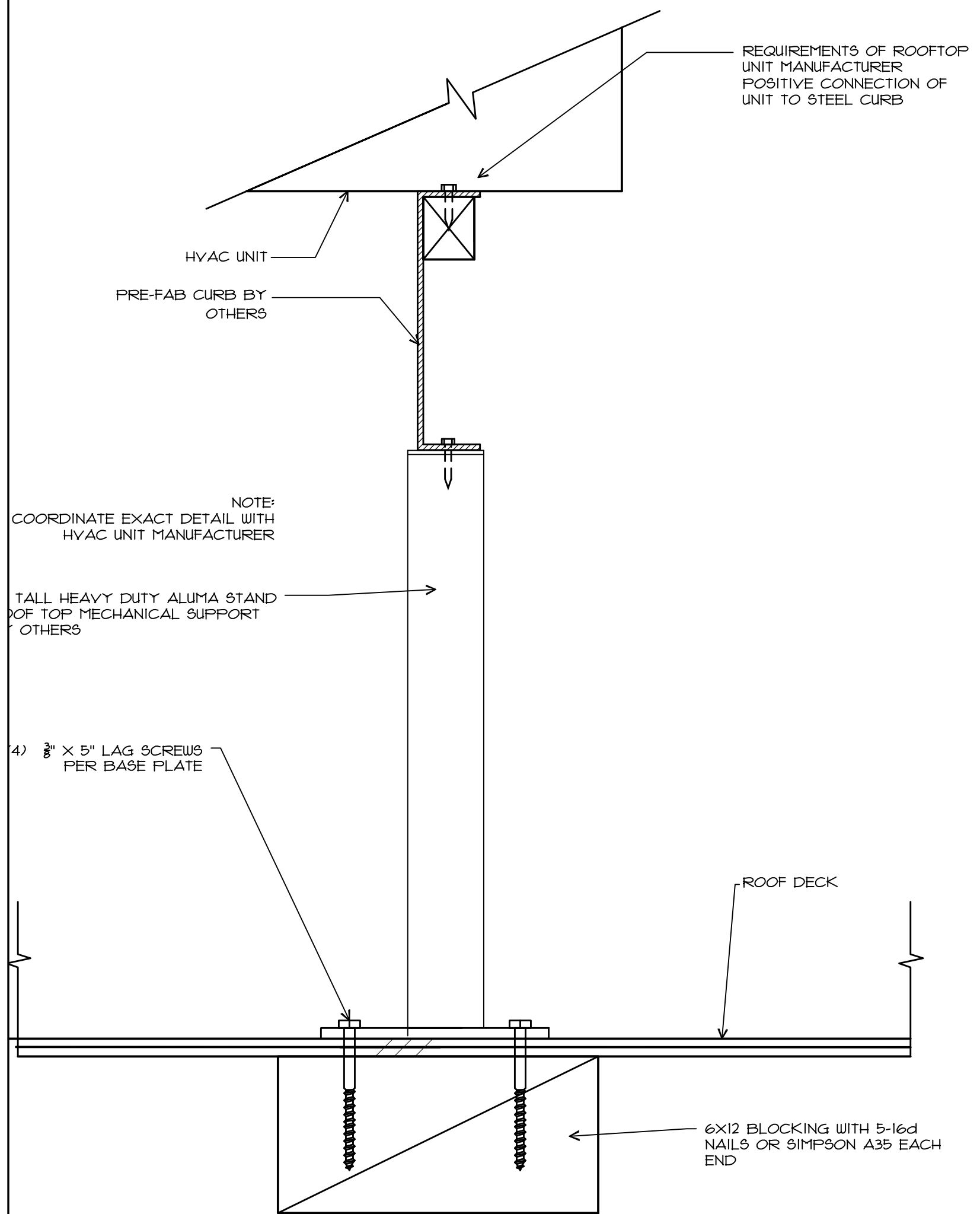
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S5303
PARAPET WALL
P = 1'-0"



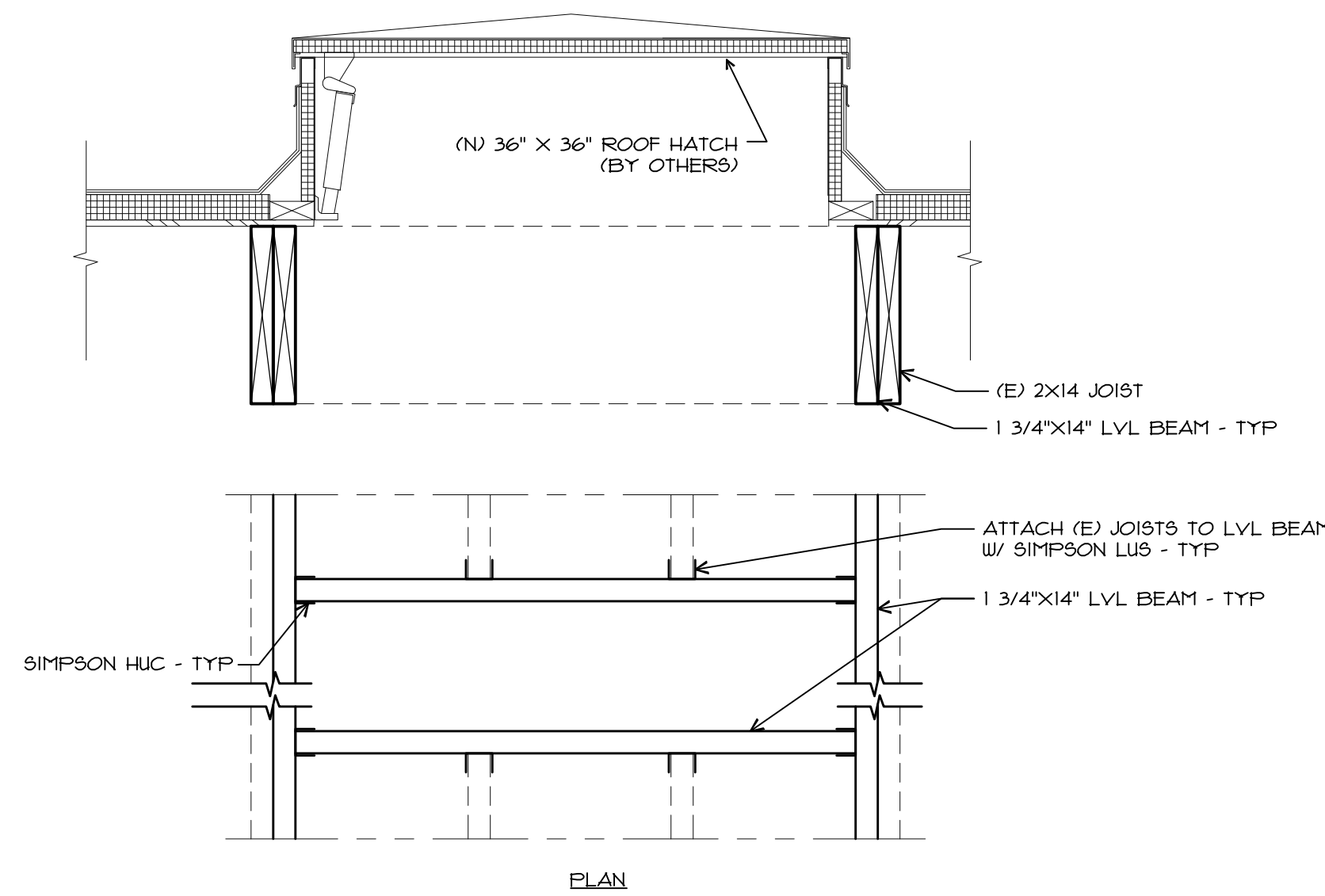
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S5303
DIVIDING WALL
P = 1'-0"



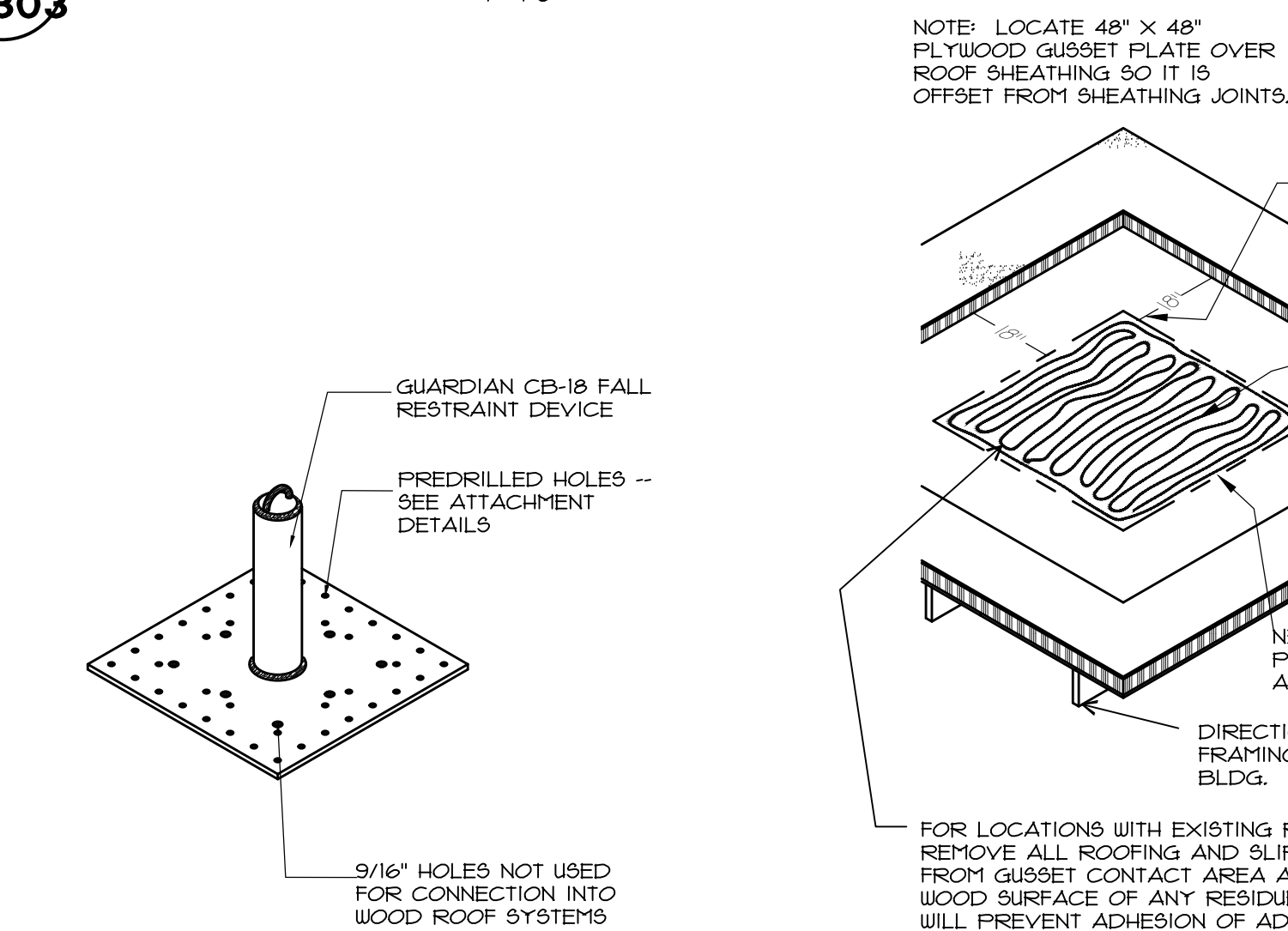
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S5303
DIVIDING WALL
P = 1'-0"



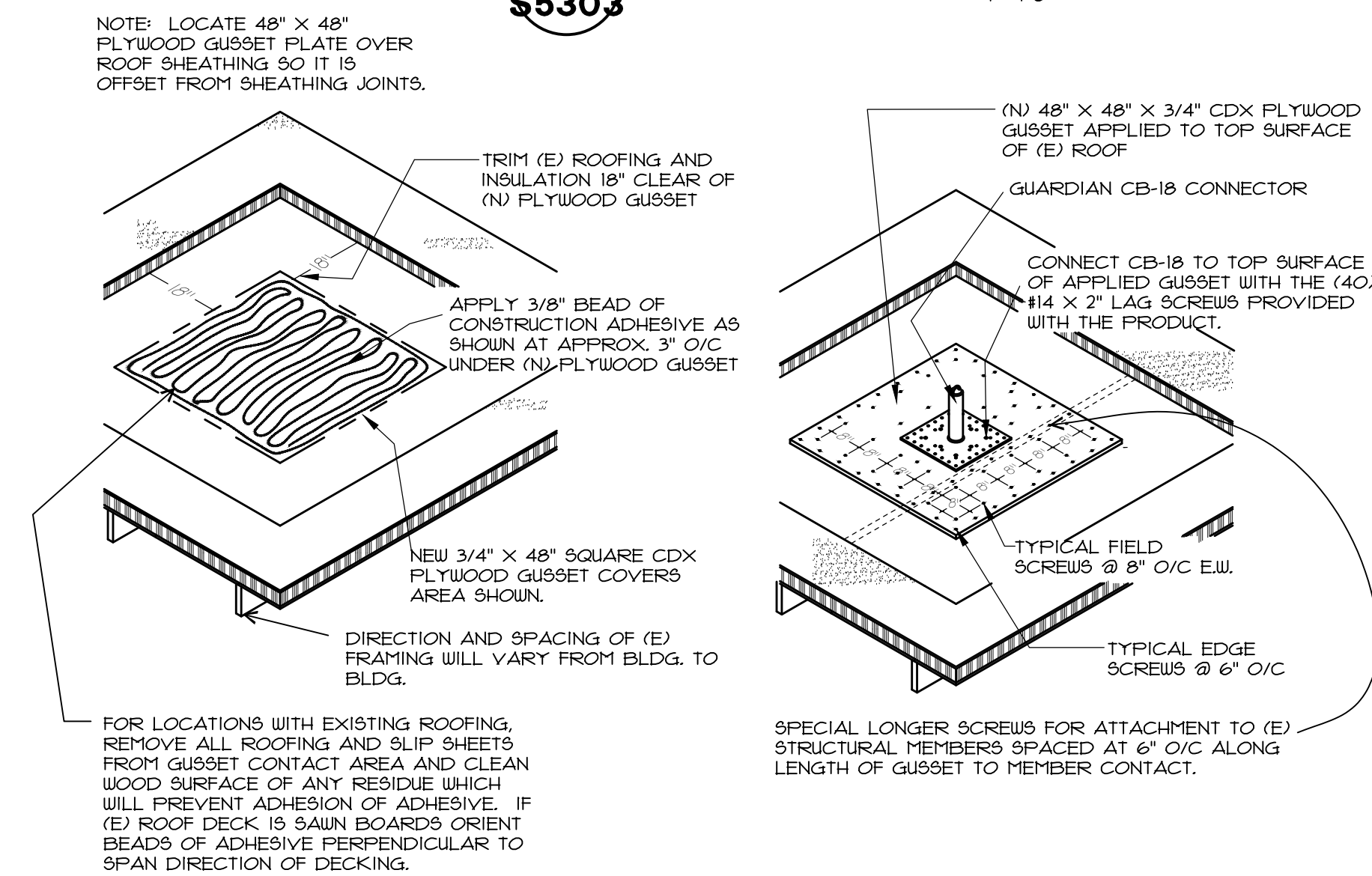
3
S5303
MECHANICAL UNIT
3' = 1'-0"



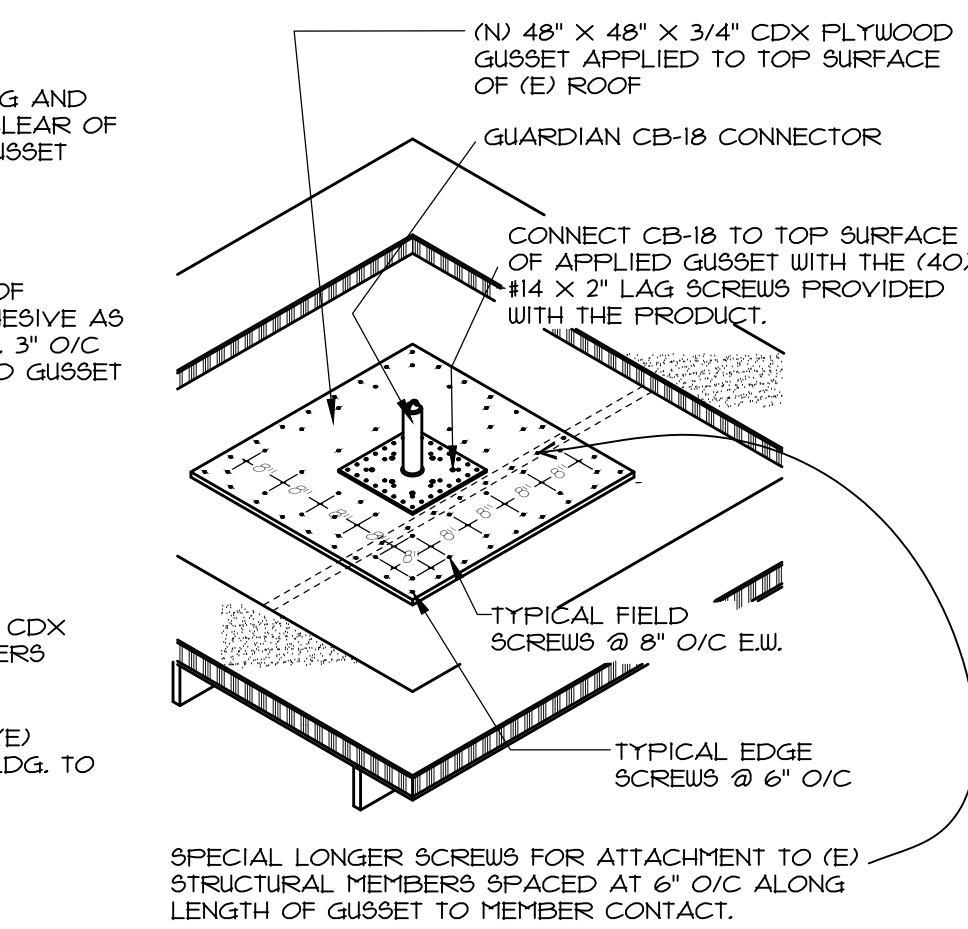
4
S5303
ROOF-SIDE OVERHANG
P = 1'-0"



A
TYPICAL FALL RESTRAINT ATTACHMENT DEVICE
N.T.S.



B
PLYWOOD GUSSET PREPARATION DETAIL
N.T.S.



C
ATTACHMENT OF PLYWOOD GUSSET TO ROOF
N.T.S.

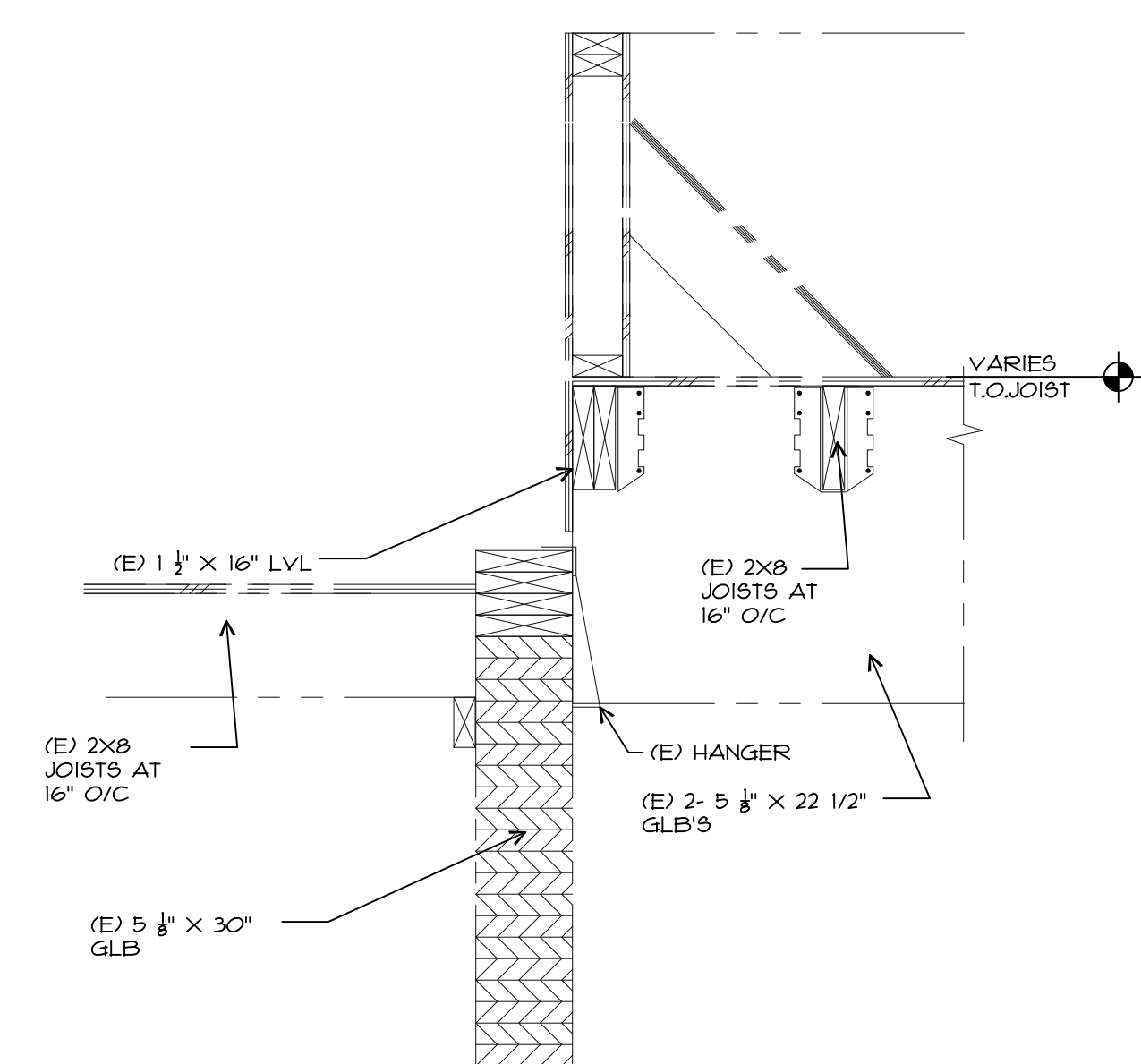
GENERAL CONDITIONS AND DESIGN REQUIREMENTS
THIS DRAWING AND METHOD IS INTENDED FOR THE INSTALLATION OF A GUARDIAN CB-12 FALL ARREST DEVICE ONTO WOOD ROOFS OF EXISTING BUILDINGS IN THE SCHOOL DISTRICT. SEE ROOF PLAN FOR THE LOCATION OF THESE ATTACHMENT POINTS. EACH ATTACHMENT POINT IS INTENDED TO PROVIDE A FALL RESTRAINT CONNECTION POINT OF 5000# CAPACITY IN ACCORDANCE WITH OSHA STANDARD 1926.502 FALL PROTECTION CRITERIA AND PRACTICES.
EACH ATTACHMENT POINT ON THE EXISTING BUILDING WOOD ROOF SYSTEM SHALL BE SUPPLEMENTED BY A 48" SQUARE GUSSET PLATE OF 3/4" CDX PLYWOOD GLUED AND SCREWED TO THE EXISTING ROOF SYSTEM IN ACCORD WITH THE DETAILS SHOWN ABOVE, WHICH ARE INTENDED TO PROVIDE A SECURE ATTACHMENT POINT WELL CONNECTED TO THE EXISTING BUILDING FRAMING AND DIAPHRAGM.
STRUCTURAL CALCULATIONS FURNISHED BY THE MANUFACTURER SHOWING THE SUITABILITY OF THE GUARDIAN CB-12 DEVICE WHEN ATTACHED WITH (40) #14 X 2" LAG SCREWS FURNISHED BY THE MANUFACTURER ARE AVAILABLE FOR REVIEW AND SHOW THE DEVICE IS CAPABLE OF RESISTING A REQUIRED 5000# IMPACT FORCE FOR PERSONAL FALL ARREST SYSTEM LOADS AS REQUIRED BY OSHA 1926.502. THIS SYSTEM IS NOT INTENDED TO PROVIDE FALL ARREST FOR ANY PERSON USING THE SYSTEM AND HAVING A COMBINED PERSON AND TOOL WEIGHT EXCEEDING 310 POUNDS.

SPECIFICATION FOR CONSTRUCTION ADHESIVE
APPLY CONSTRUCTION OR SUBFLOOR ADHESIVE IN ACCORDANCE WITH RECOMMENDATIONS OF MANUFACTURE. SELECTED PRODUCT SHALL CONFORM TO AMERICAN PLYWOOD ASSOCIATION STANDARD AFG-01 AND ASTM D-3498. APPROVED PRODUCTS INCLUDE THE FOLLOWING: GLUES BY OTHER MANUFACTURERS MAY BE APPROVED.
GRABBER PROFESSIONAL STRENGTH SUBFLOOR ADHESIVE
TITEBOND #5261 HEAVY DUTY CONSTRUCTION ADHESIVE
LIQUID NAILS BC-149 OR BC-490
SUBFLOOR/CONSTRUCTION ADHESIVE
DAP 4000 SUBFLOOR AND DECK ADHESIVE
H-E-B LVL SUBFLOOR ADHESIVE
OSI FL4000 HEAVY DUTY STRUCTURAL AND SUBFLOOR ADHESIVE

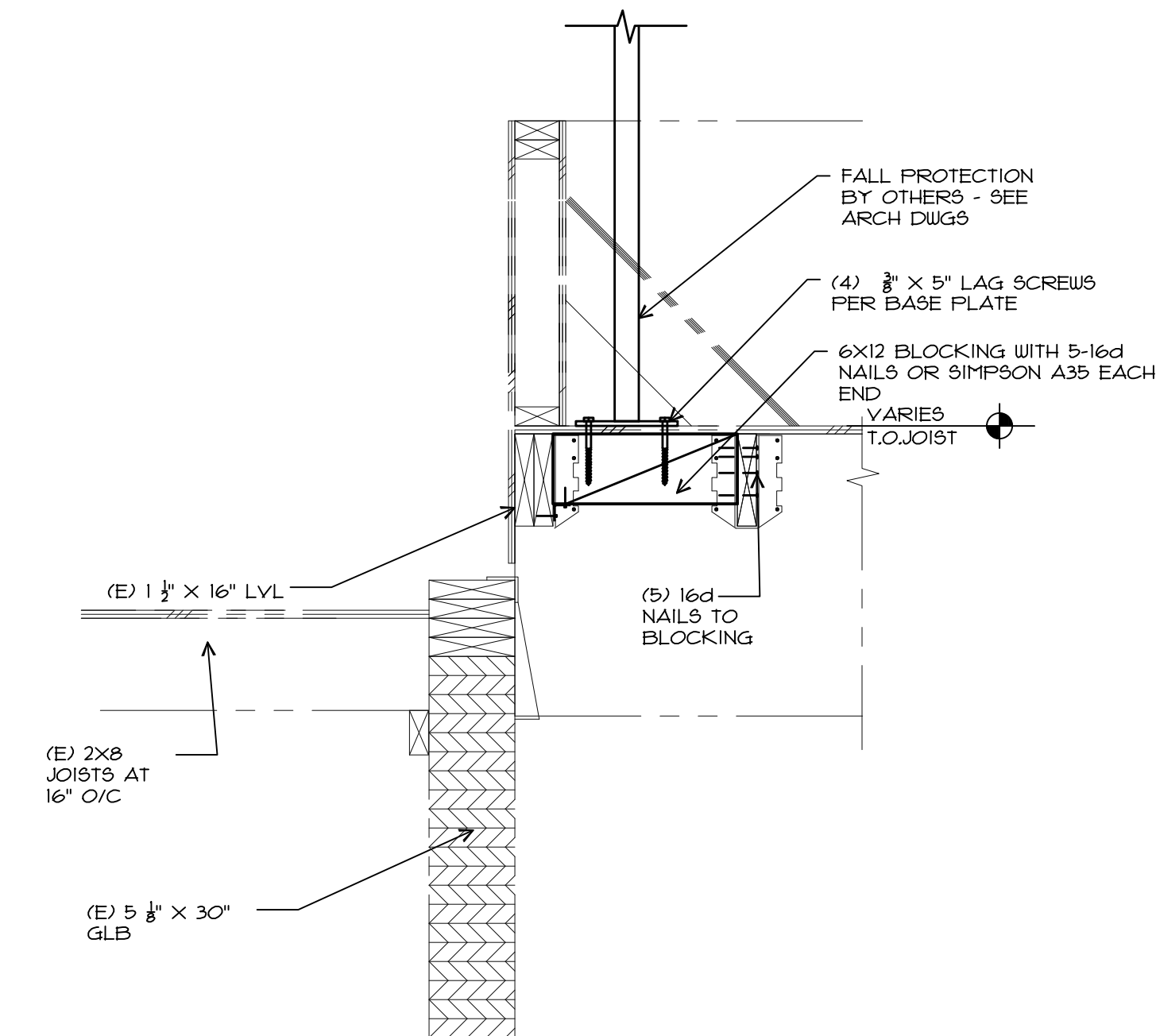
ROOFING MEMBRANE AND FLASHING DETAILS
SEE ARCHITECTURAL DRAWINGS FOR DETAILS FOR FLASHING, CUTTING AND RESTORATION OF ROOF MEMBRANE, INSULATION AND FOR FLASHING DETAILS OF INDIVIDUAL CB-12 FALL PROTECTION DEVICES.

SPECIFICATION FOR GUSSET ATTACHMENT SCREWS
ALL SCREWS TO BE #10 DRIVE SCREWS WITH COARSE THREAD PATTERN AND WITH BUGLE HEAD. HEX HEAD SCREWS MAY BE USED ONLY IF GUSSET IS TOPPED BY RIGID INSULATION.
TYPICAL FIELD AND EDGE SCREWS:
SCREWS SHALL BE OF LENGTH TO PENETRATE THROUGH 3/4" PLYWOOD GUSSET AND THROUGH UNDERLYING PLYWOOD STOPPING AT UNDER SURFACE OF EXISTING SHEATHING. WHERE EXISTING ROOF CONSISTS OF DECKING OR OTHER THICKER STRATA, CHOOSE LENGTH OF TYPICAL SCREW TO PENETRATE 15 INCHES INTO EXISTING WOOD SHEATHING OR DECKING. AT ANY LOCATIONS WHERE FRAMING OR UNDERSIDE OF (E) SHEATHING IS ARCHITECTURALLY EXPOSED, SCREWS SHALL BE SELECTED TO AVOID VISUAL IMPACT - COORDINATE THESE LOCATIONS WITH ENGINEER OF RECORD.
SPECIAL LONGER SCREW FOR ATTACHMENT INTO (E) STRUCTURAL FRAMING MEMBERS:
AT ALL LOCATIONS WHERE EXISTING ROOF STRUCTURAL MEMBERS OCCUR BENEATH SHEATHING WITHIN ZONE OF GUSSET COVERAGE, FASTEN GUSSET PLATE INTO STRUCTURAL FRAMING MEMBERS USING LONGER #10 SCREWS SPACED AT 6" O/C. SELECT LENGTH OF SCREW TO PASS THROUGH EXISTING SHEATHING AND TO PENETRATE 15 INCHES INTO STRUCTURAL RAFTER OR TRUSS.
APPROVED SCREW PRODUCTS INCLUDE THE FOLLOWING: (SIMILAR PRODUCTS BY OTHER MANUFACTURES ARE ACCEPTABLE)
GRABBER COARSE THREAD #10 SCREW
QUICK-DRIVE 933DSC OR CB3BLG COARSE THREAD #10 SCREW

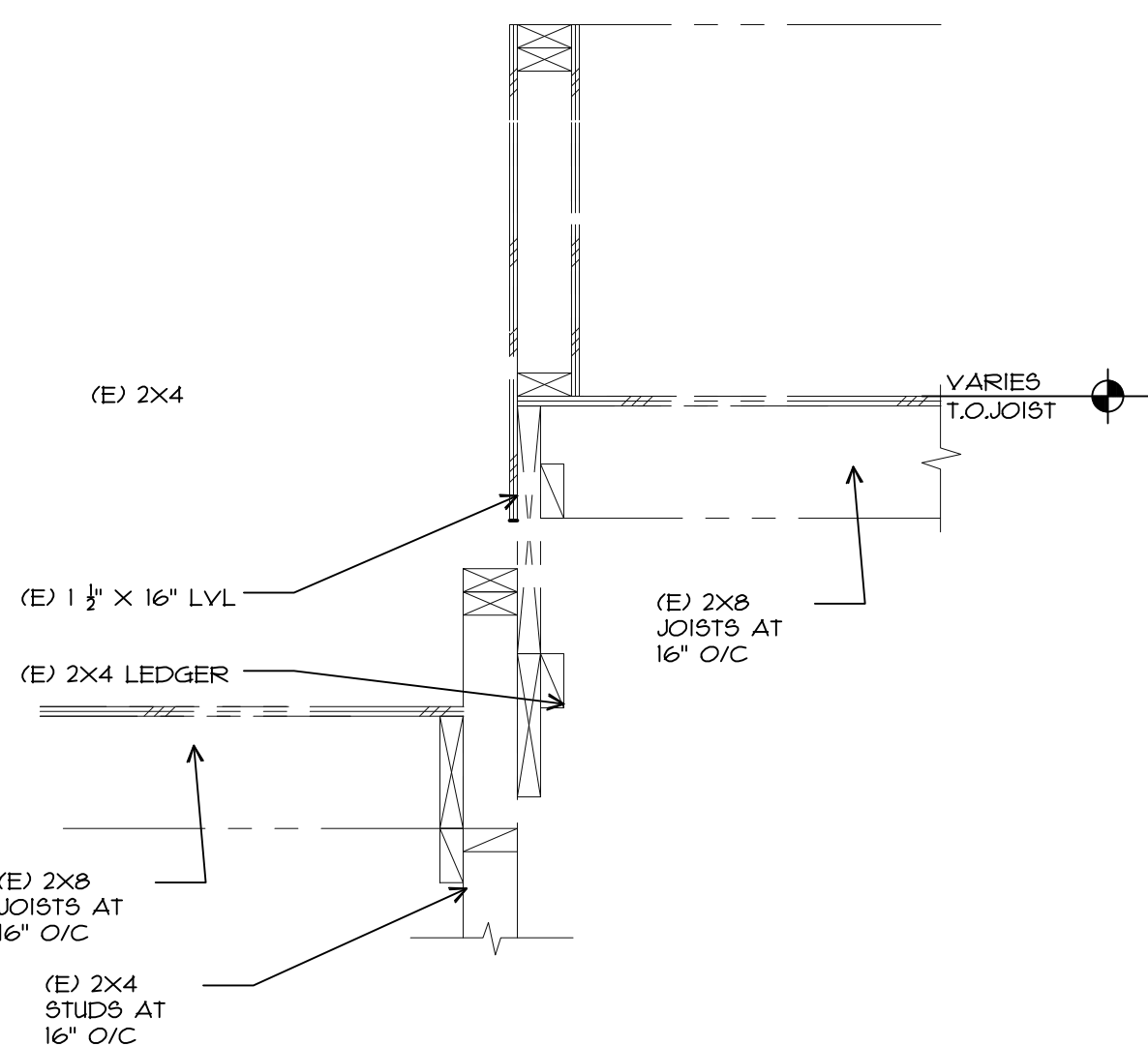
5
S5303
FALL RESTRAINT DEVICE DETAILS
P = 1'-0"



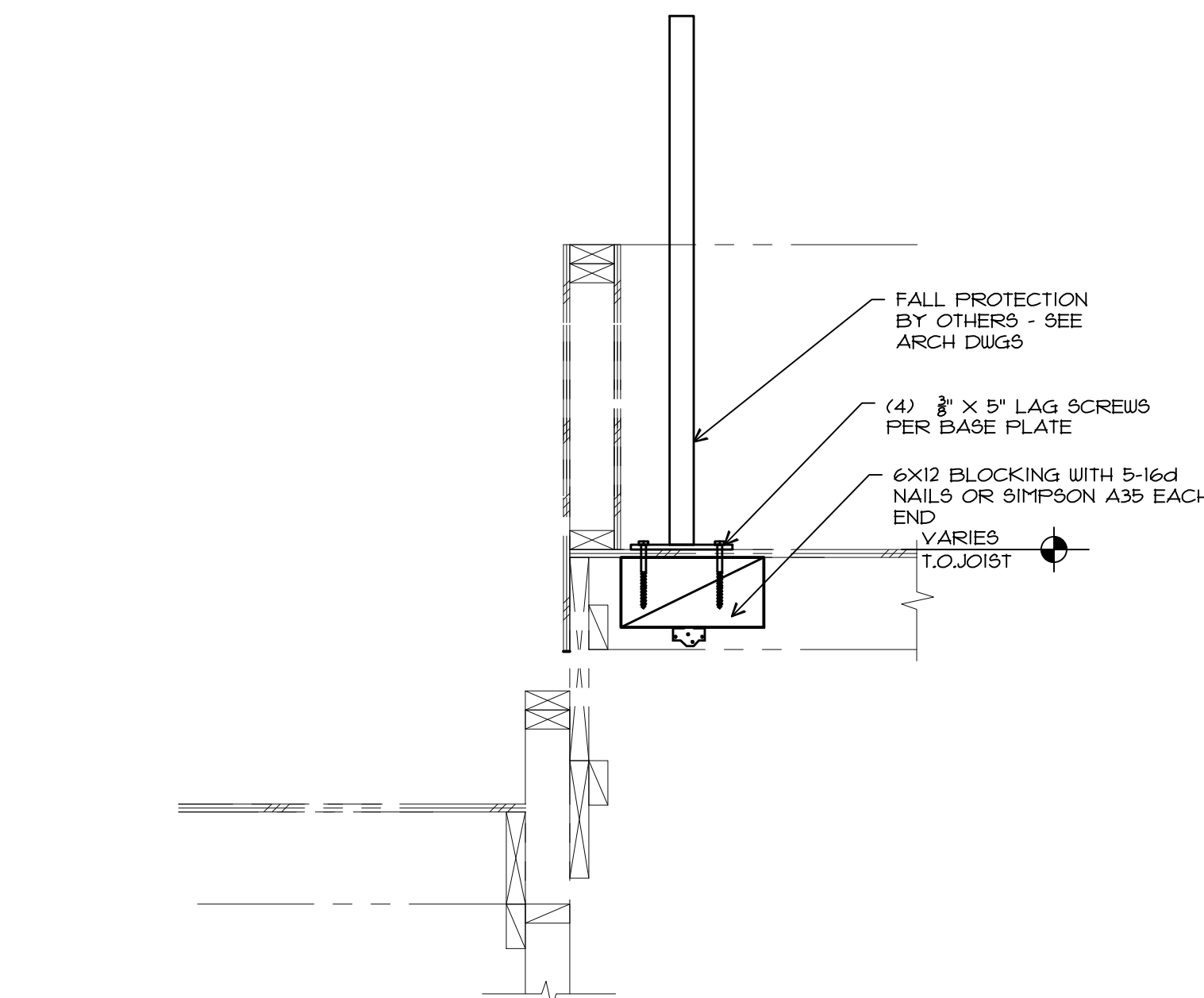
7E
S5303
PARAPET WALL
P = 1'-0"



7
S5303
DIVIDING WALL
P = 1'-0"



6E
S5303
PARAPET WALL
P = 1'-0"



6
S5303
PARAPET WALL
P = 1'-0"

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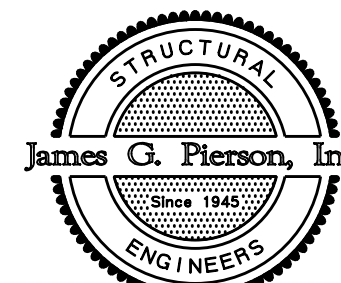


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phase Bid Documents

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STRUCTURAL DETAILS

S5303