

BEAVERTON SCHOOL DISTRICT - ALOHA HIGH SCHOOL - PARTIAL ROOF REPLACEMENT



SITE MAPS



1 LOCATION MAP
GI-1 SCALE: NTS

2 VICINITY MAP
GI-1 SCALE: NTS

3 CAMPUS PLAN
GI-1 SCALE: NTS

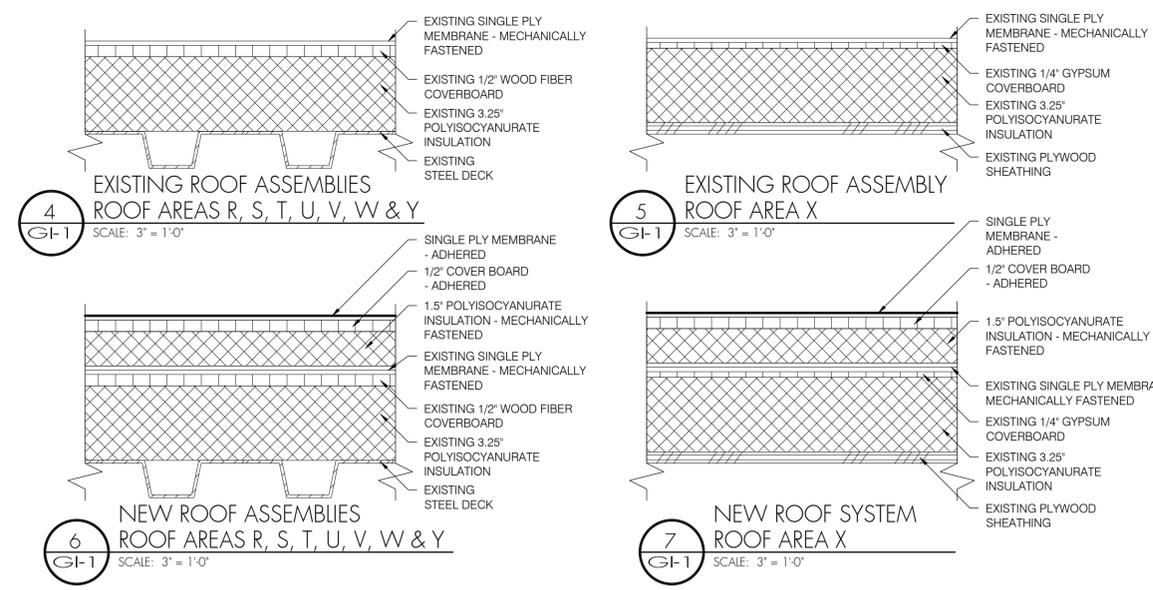
DRAWING SCHEDULE

GI-1	GENERAL INFORMATION
R100	ROOF PLANS - EAST
R200	DETAILS
R201	DETAILS
R202	DETAILS
S100	GENERAL STRUCTURAL NOTES AND FALL PROTECTION STRUCTURAL NOTES
S101	ROOF PLAN WIND LOAD DIAGRAM
S201	STRUCTURAL DETAILS

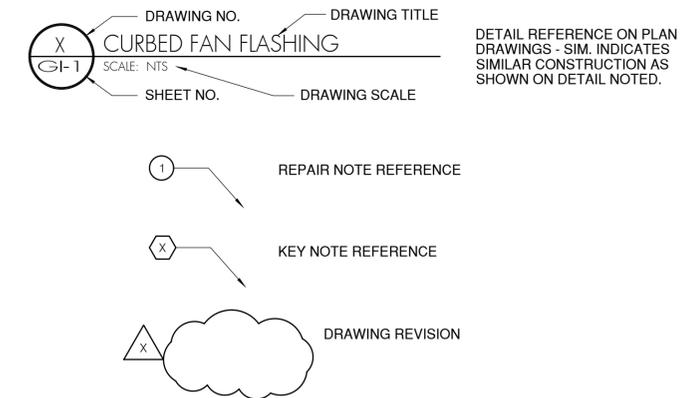
GENERAL NOTES

- 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 2019 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 SINGLE BASE BID AND TWO ADDITIVE ALTERNATE SCOPES OF WORK. THE SCOPE OF WORK DOES NOT INCLUDE ANY INCREASE IN AREA OR CHANGES IN OCCUPANCY.
- BASE BID: INCLUDES BUT IS NOT LIMITED TO RECOVERING EIGHT (8) INDIVIDUAL ROOF AREAS IDENTIFIED AS AREAS R, S, T, U, V, W, X, AND Y WITH AN ADHERED PVC ROOF ASSEMBLY AND RELATED SHEET METAL FLASHINGS.
 - 9.1 ALTERNATE BID NO. 1: INCLUDES BUT IS NOT LIMITED TO INSTALLING FIXED ACCESS LADDER FOR AREA X.
 - 9.2 ALTERNATE BID NO. 2: INCLUDES BUT IS NOT LIMITED TO INSTALLING THREE (3) FALL PROTECTION ANCHORS ON AREA X.
- SCOPE OF WORK CONSISTS OF THIS DRAWING SET AND SPECIFICATION SECTIONS INDICATED ON THIS SHEET.
- IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO PROTECT BUILDING OCCUPANTS AND PASSERS-BY FROM FALLING DEBRIS OR EQUIPMENT. DO NOT THROW MATERIALS FROM THE ROOF.
- ROOF ACCESS BY MEANS OF EXTERNAL LADDER OR STAIR TOWER.

ROOF SYSTEM ASSEMBLIES



DRAWING SYMBOLS



PROJECT TEAM

OWNER
Beaverton School District
16550 SW Merlo Road,
Beaverton, Oregon 97003
tel: (503) 356-4452
Contact: Kurt Meeuwse,
Construction Project Manager



ROOF CONSULTANT
Professional Roof Consultants, Inc.
1108 SE Grand Ave., Suite 300
Portland, Oregon 97214
tel: (503) 280-8759
fax: (503) 280-8866
Contact: Derek Josephson, RRC, RRO, REWO



STRUCTURAL CONSULTANT
TM Rippey Consulting Engineers
7650 SW Beveland St
Tigard Oregon 97223
tel: (503) 443-3900
fax: (503) 443-3700
Contact: Ralph Turnbaugh, P.E.



**BEAVERTON SCHOOL DISTRICT
ALOHA HIGH SCHOOL
PARTIAL ROOF REPLACEMENT**

SHEET TITLE:
GENERAL INFORMATION

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THE BAR SCALE IS 2 INCHES IN LENGTH. IF THE BAR IS NOT 2 INCHES LONG, THIS DRAWING IS NOT TO THE SCALE INDICATED.

Date: APRIL 2021
Revisions:

Drawn: C.G.
Check: D.E.J.
File: GfGen_Info
Job: R3055.24

SHEET NUMBER:
GI-1

BID SET

**BEAVERTON SCHOOL DISTRICT
ALOHA HIGH SCHOOL
PARTIAL ROOF REPLACEMENT**

SHEET TITLE:
ROOF PLAN

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Date: APRIL 2021
Revisions:

Drawn: C.G.
Checked: D.E.J.
File: R100-Roof_Plans
Job: R3055.24

SHEET NUMBER:
R100

LEGEND

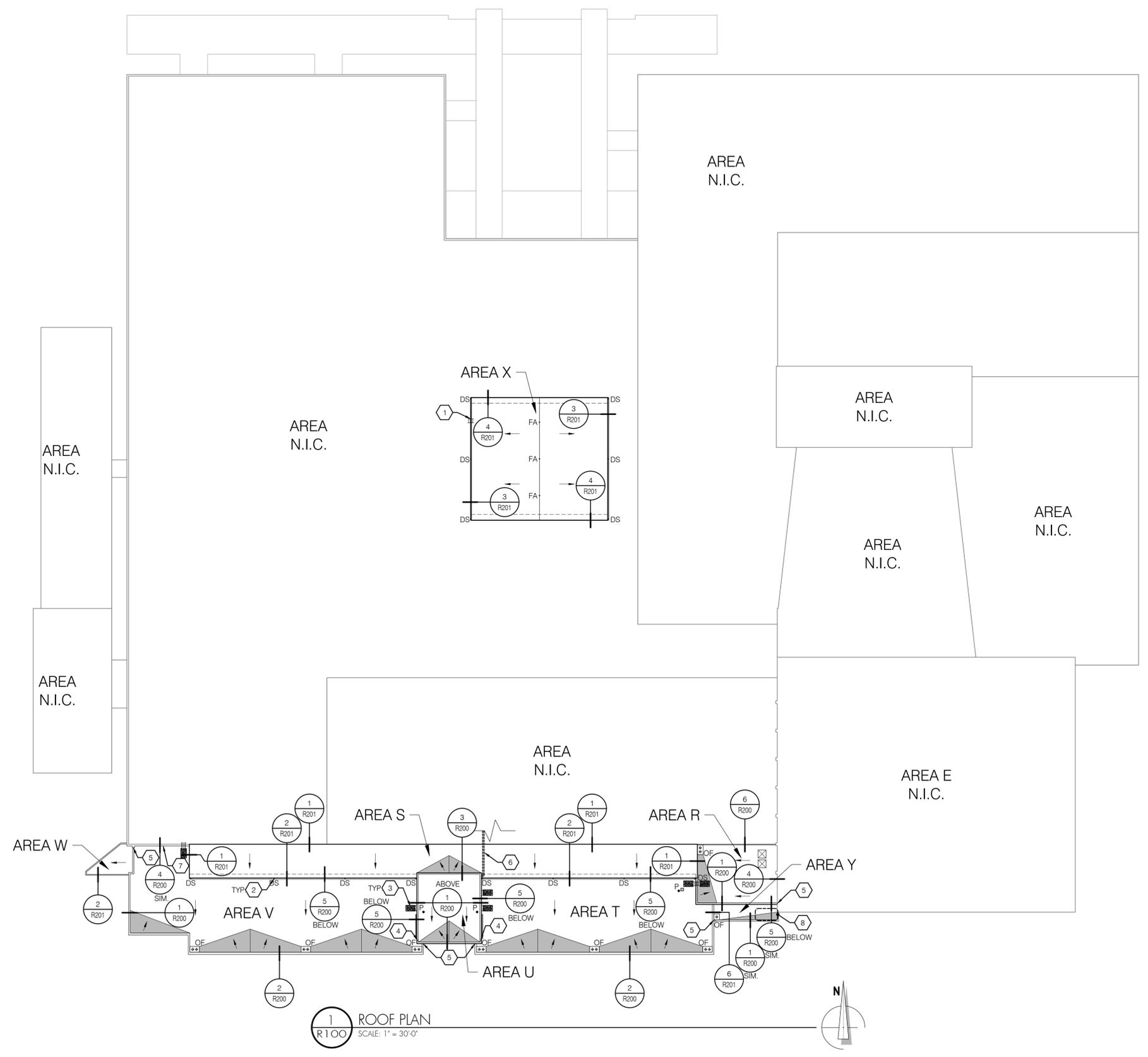
	P•	EXISTING VENT PIPE PENETRATION
	▣	EXISTING CURBED FAN UNIT
	OF []	EXISTING INTERIOR ROOF DRAIN WITH OVERFLOW DRAIN - REFERENCE ROOF PLAN FOR ORIENTATION
	[] OF	EXISTING ROOF DRAIN & OVERFLOW SCUPPER
	DS	EXISTING GUTTER DOWNSPOUT
	III	EXISTING ROOF ACCESS LADDER
	■	WALK PADS
	⊠	EXISTING CURBED VENT
	>	EXISTING ACCESS DOOR
	—	EXISTING LOUVER VENT
	----	EXISTING CONDUIT OVER ROOF
	→	INDICATES DIRECTION OF EXISTING ROOF SLOPE
	▲	EXISTING CRICKET
	FA•	FALL PROTECTION ANCHOR

GENERAL NOTES

- ALL ITEMS TRANSPORTED TO ROOF SHALL BE TRANSPORTED USING APPROVED AND SAFE METHODS OF LOADING.
- CONTRACTOR SHALL EMPLOY MEANS OF PROTECTING BUILDING OCCUPANTS AND GENERAL PUBLIC AT ALL TIMES DURING THE COURSE OF CONSTRUCTION.
- TEMPORARY STAGING, SCAFFOLDING, AND RUNWAYS SHALL BE ALLOWED IN DESIGNATED LOCATIONS ONLY.
- ALL PERMITTING, INCLUDING ROAD CLOSURES, PARKING STALLS, SIDEWALK CLOSURES, SCAFFOLD ERECTION, ETC. SHALL BE COORDINATED, OBTAINED, AND PAID FOR BY CONTRACTOR.
- CONTRACTOR SHALL PROVIDE TEMPORARY PROTECTION WALKWAYS OVER EXISTING ADJACENT ROOF AREAS NOT IN CONTRACT AND CONFINE CONSTRUCTION TRAFFIC TO DESIGNATED WALKWAYS ONLY.
- LIMIT CONSTRUCTION TRAFFIC ON ALL ADJACENT ROOF AREAS. TRAVERSE AREAS ONLY TO ACCESS AREA X AND PERFORM SPECIFIED SCOPE OF WORK.

KEY NOTES

- INSTALL ACCESS LADDER AS SPECIFIED ON THE STRUCTURAL DRAWINGS. REFERENCE DETAIL 4/R202 FOR FLASHING REQUIREMENTS.
- INSTALL SINGLE WIDTH OF WALKPAD AT THE BASE OF ALL DOWNSPOUTS - TYPICAL OF 14 LOCATIONS.
- REMOVE EXISTING WALKPADS AT ALL DOORS AND LADDER LOCATIONS PRIOR TO INSTALLING NEW ROOF ASSEMBLY. INSTALL NEW, SINGLE WIDTH OF MANUFACTURERS WALKPAD AT SAME LOCATION OVER FINISHED ROOF ASSEMBLY - TYPICAL OF 6 LOCATIONS.
- MODIFY WIDTH OF SCUPPER OPENING TO NET 12" CLEAR - REFERENCE DETAIL 6/R202 FOR SIMILAR CONDITION.
- INSTALL FULLY SOLDERED, STAINLESS STEEL SADDLE FLASHING AT PARAPET WALL INTERFACE. REMOVE EXISTING ADJACENT SIDING AS REQUIRED TO INCORPORATE SADDLE INTO EXISTING WRB. WEATHER LAP ALL FLASHINGS AND RE-INSTALL SIDING OVER VERTICAL FLANGE OF SADDLE FLASHING.
- MODIFY EXISTING UTILITY LINE SUPPORTS AND RAISE CONDUIT AS REQUIRED TO ACCOMMODATE HEIGHT OF NEW ROOF ASSEMBLY.
- INFILL ABANDONED SCUPPER OPENING WITH MINERAL WOOL INSULATION. INSTALL SHEET METAL COVER WITH HEMMED EDGES, EXTENDING 2" BEYOND OPENING ON ALL SIDES. SECURE COVER WITH EPDM WASHERED FASTENERS AT 6" ON-CENTER (MIN. 2 PER SIDE).
- REMOVE EXISTING ROOF MEMBRANE AND WARPED INSULATION. REPLACE INSULATION TO MATCH SURROUNDING.



BID SET

**BEAVERTON SCHOOL DISTRICT
 ALOHA HIGH SCHOOL
 PARTIAL ROOF REPLACEMENT**

SHEET TITLE:
 DETAILS

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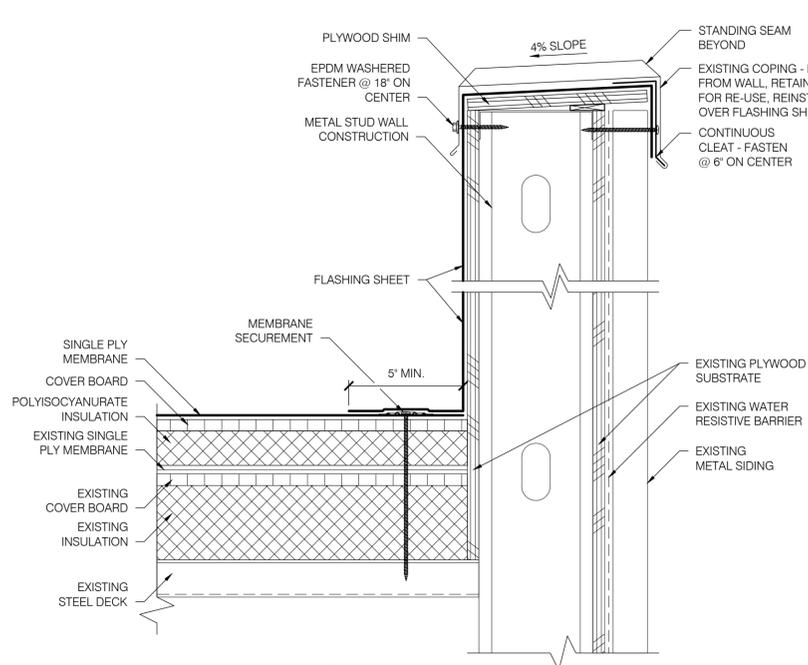
THE BAR SCALE IS 2 INCHES IN LENGTH. IF THE BAR IS NOT 2 INCHES LONG, THIS DRAWING IS NOT TO THE SCALE INDICATED.

Date: APRIL 2021
 Revisions:

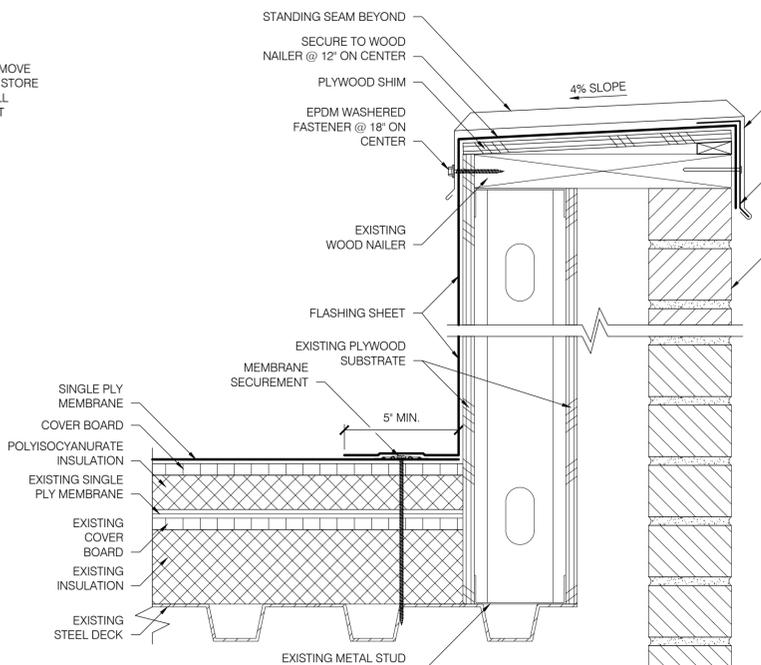
Drawn: C.G.
 Check: D.E.J.
 File: R200-Details
 Job: R3055.24

SHEET NUMBER:
R200

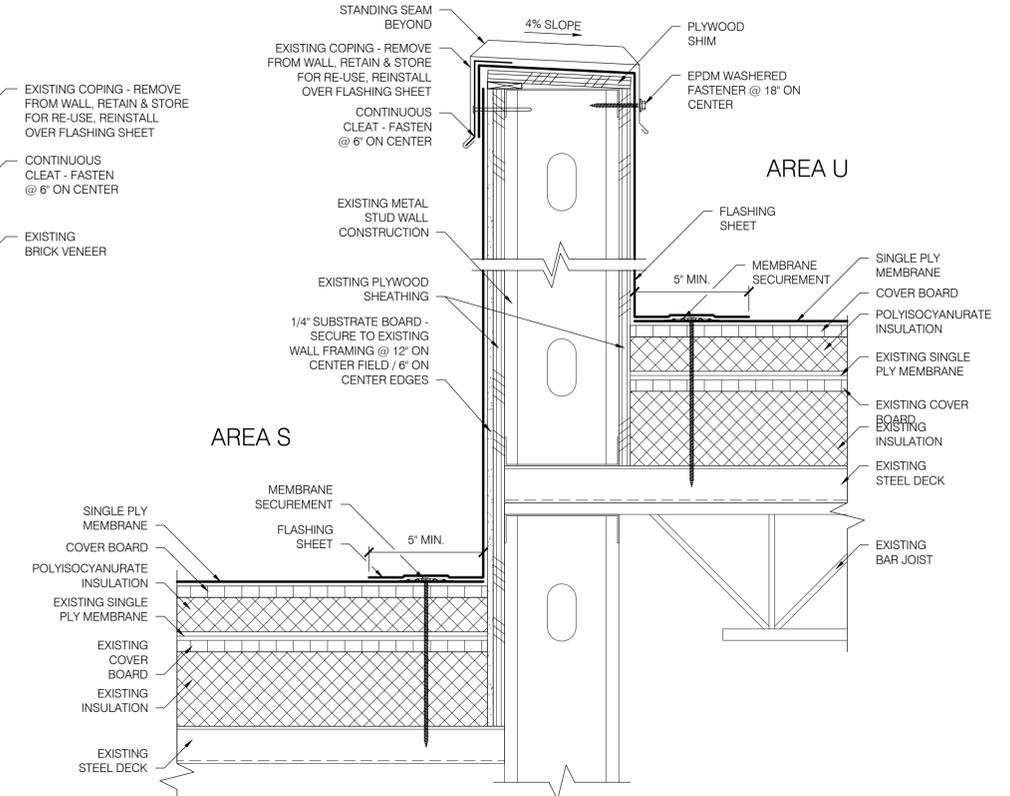
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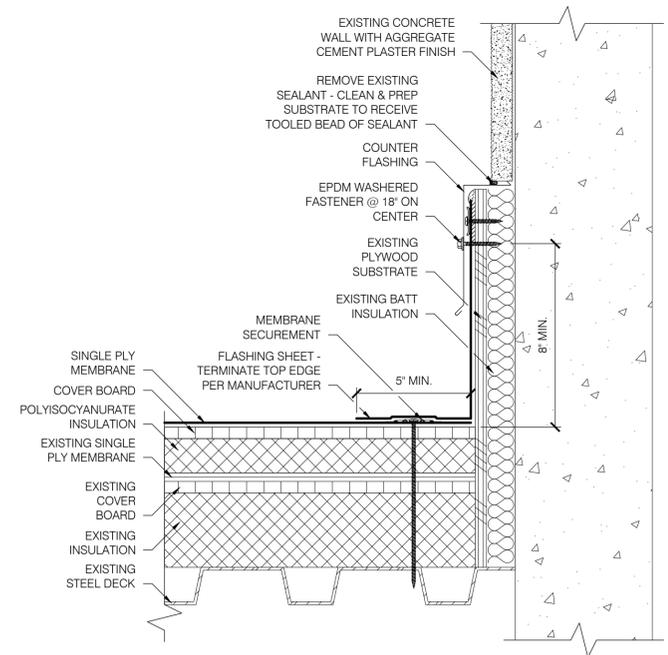
1 PARAPET FLASHING
 R200 SCALE: 3" = 1'-0"



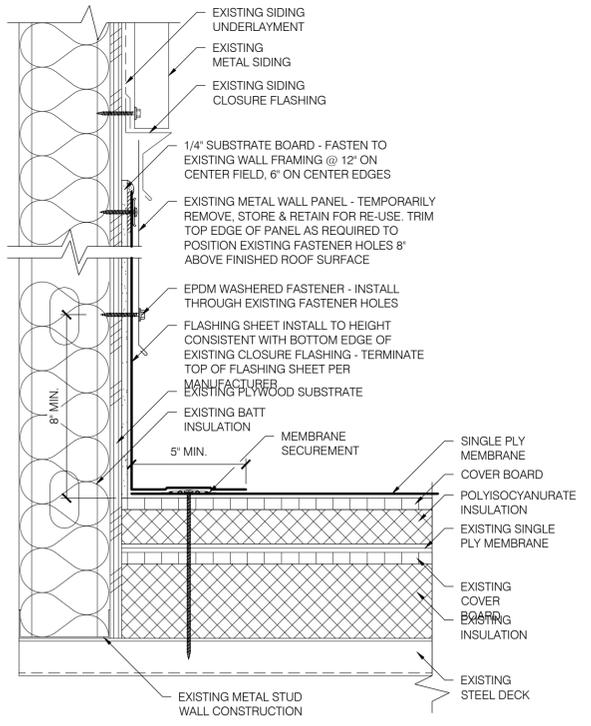
2 PARAPET FLASHING
 R200 SCALE: 3" = 1'-0"



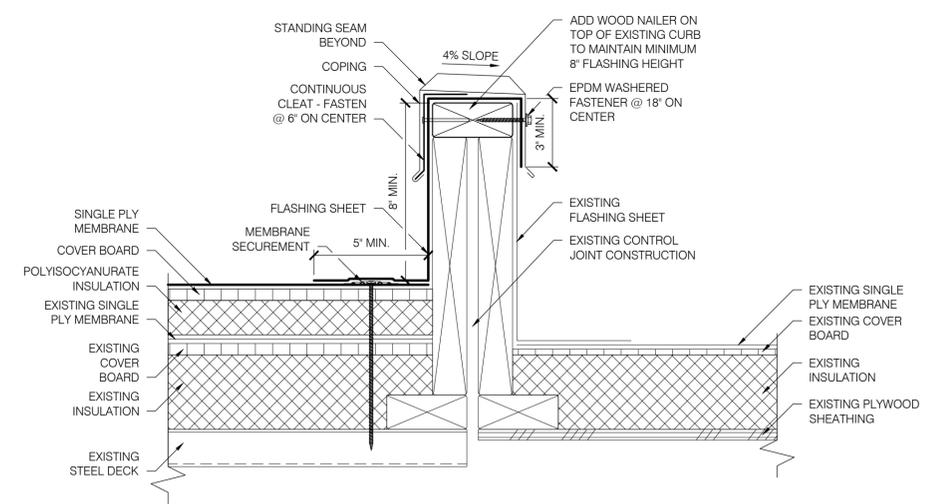
3 PARAPET WALL FLASHING
 R200 SCALE: 3" = 1'-0"



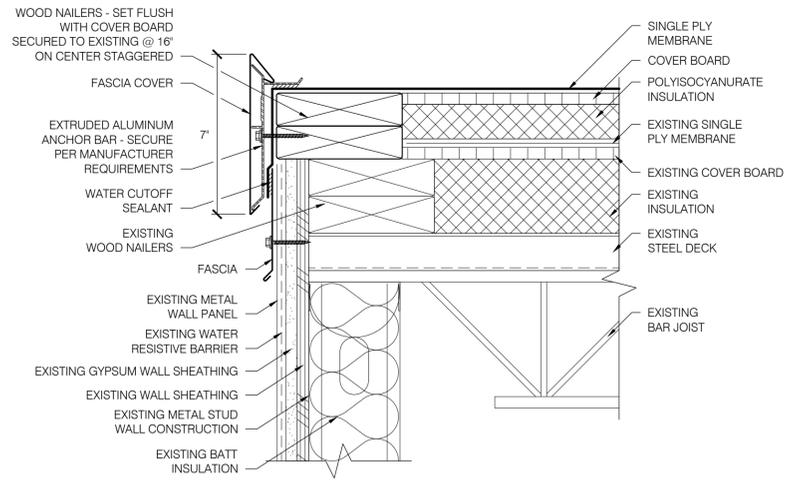
4 BASE FLASHING
 R200 SCALE: 3" = 1'-0"



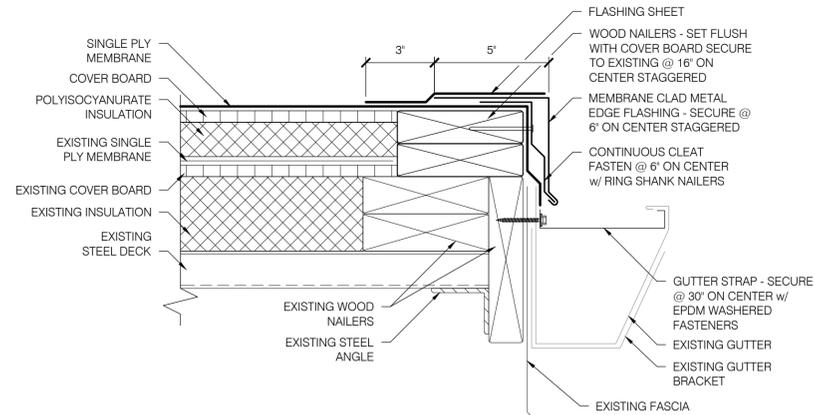
5 BASE FLASHING
 R200 SCALE: 3" = 1'-0"



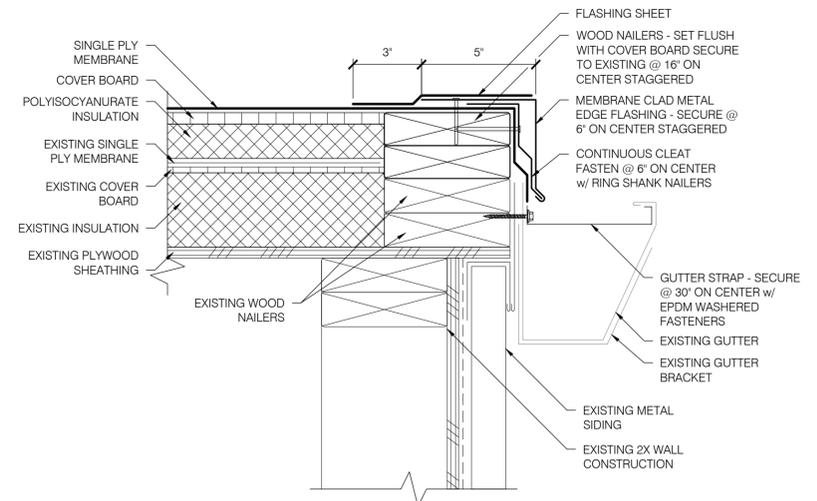
6 CONTROL JOINT FLASHING
 R200 SCALE: 3" = 1'-0"



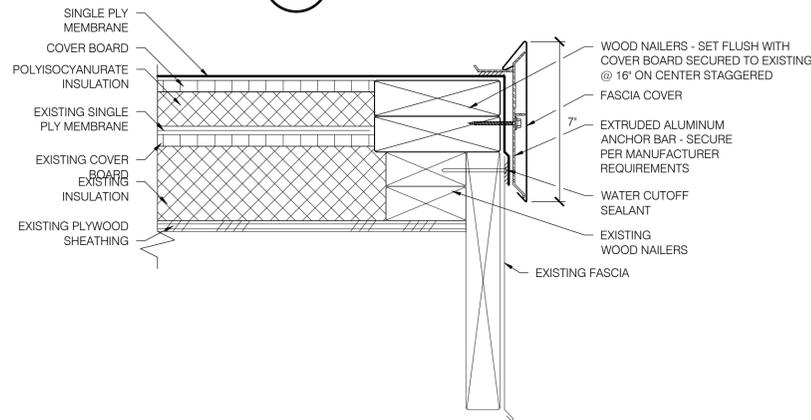
1 EDGE FLASHING
R201 SCALE: 3" = 1'-0"



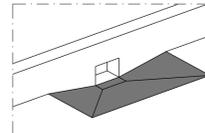
2 GUTTER EDGE FLASHING
R201 SCALE: 3" = 1'-0"



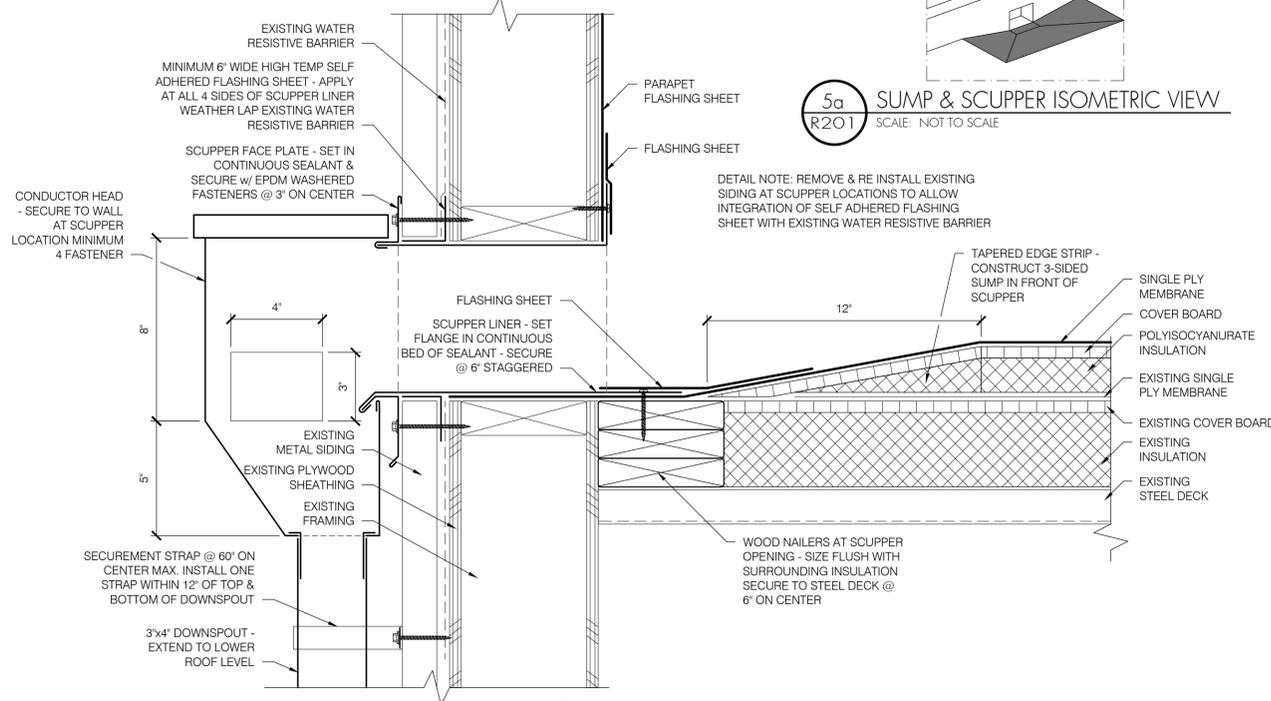
3 GUTTER EDGE FLASHING
R201 SCALE: 3" = 1'-0"



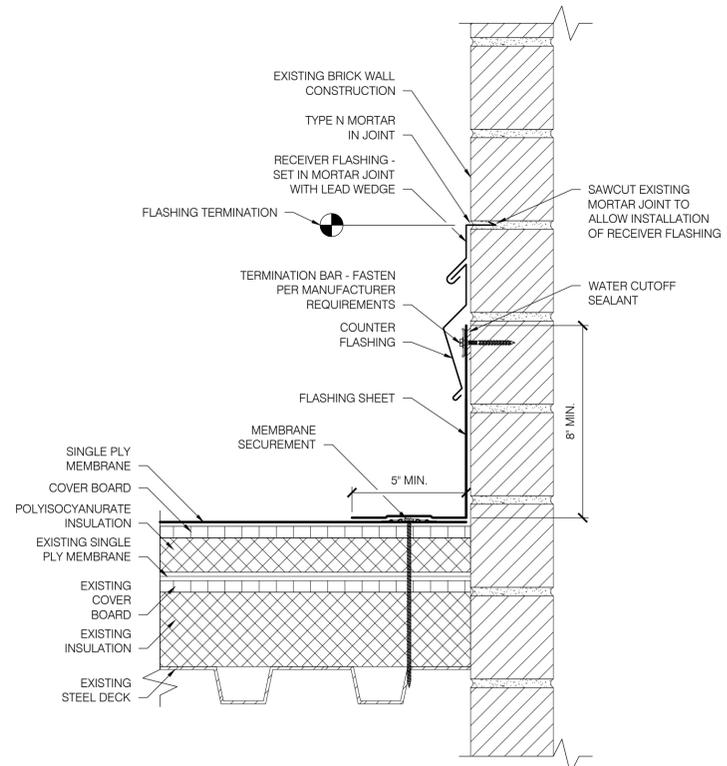
4 RAKE EDGE FLASHING
R201 SCALE: 3" = 1'-0"



5a SUMP & SCUPPER ISOMETRIC VIEW
R201 SCALE: NOT TO SCALE



5 SCUPPER FLASHING
R201 SCALE: 3" = 1'-0"



6 BASE FLASHING AT MASONRY WALL
R201 SCALE: 3" = 1'-0"

**BEAVERTON SCHOOL DISTRICT
ALOHA HIGH SCHOOL
PARTIAL ROOF REPLACEMENT**

SHEET TITLE: _____
DETAILS: _____

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Date: APRIL 2021
Revisions: _____

Drawn: C.G.
Check: D.E.J.
File: R200-Details
Job: R3055.24

SHEET NUMBER:
R201

BID SET

**BEAVERTON SCHOOL DISTRICT
 ALOHA HIGH SCHOOL
 PARTIAL ROOF REPLACEMENT**

SHEET TITLE:
 DETAILS

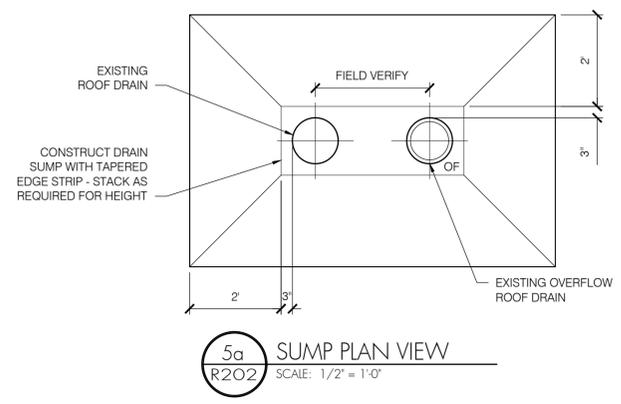
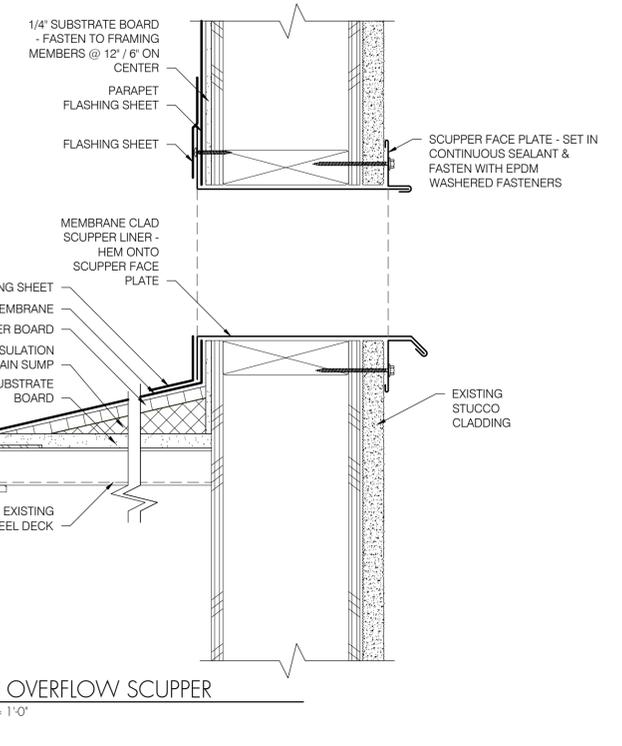
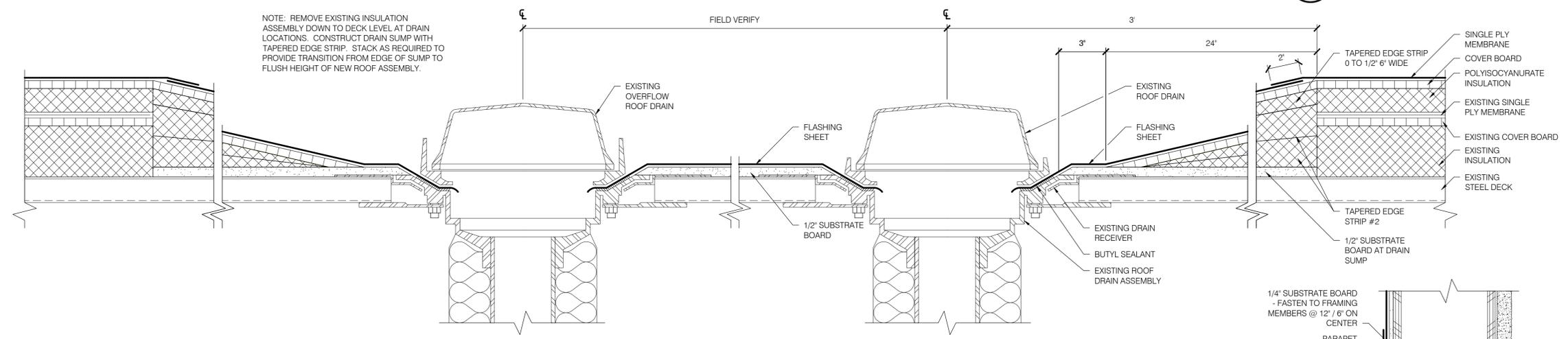
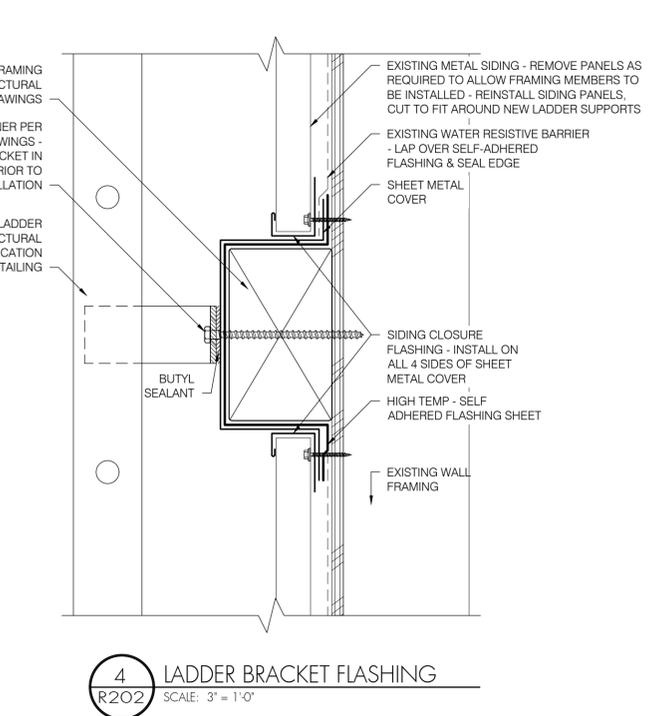
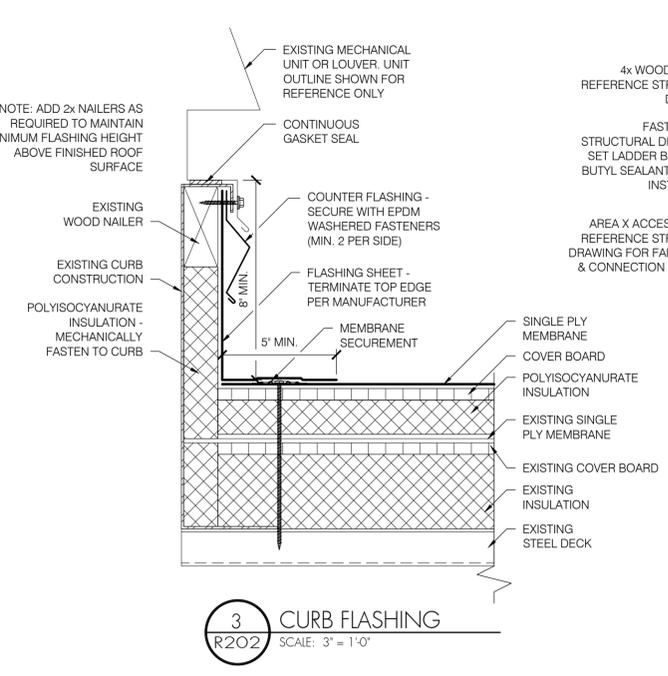
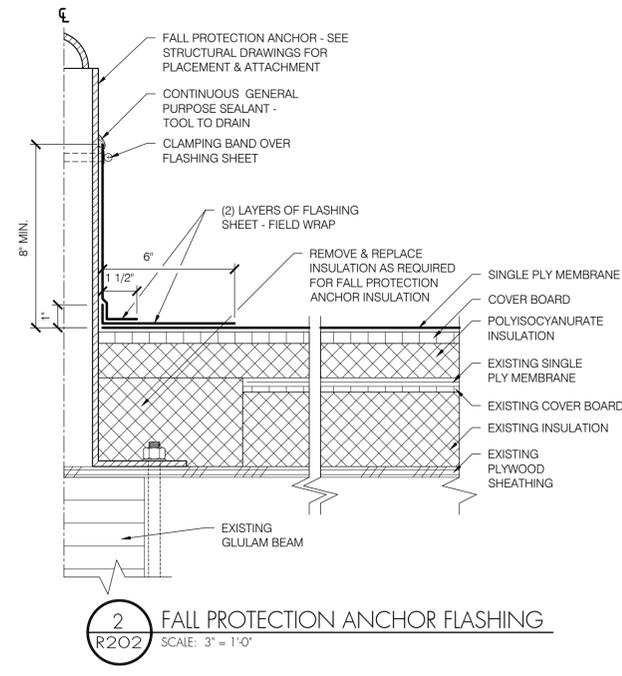
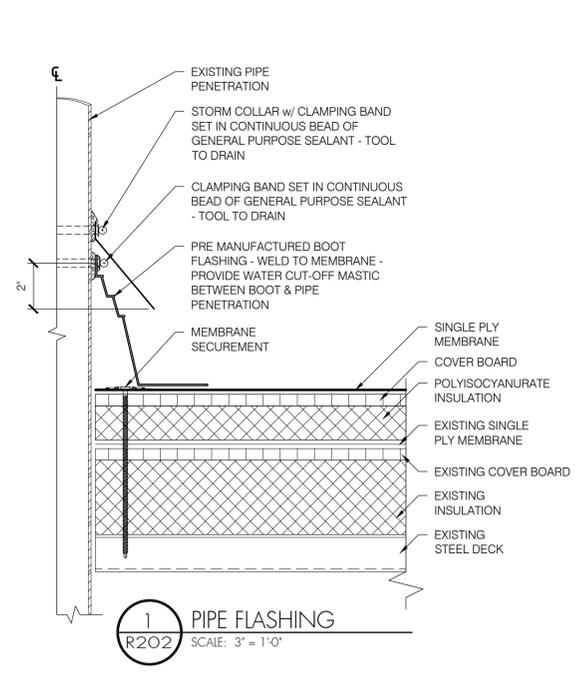
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Date: APRIL 2021
 Revisions:

Drawn: C.G.
 Check: D.E.J.
 File: R200-Details
 Job: R3055.24

SHEET NUMBER:
R202



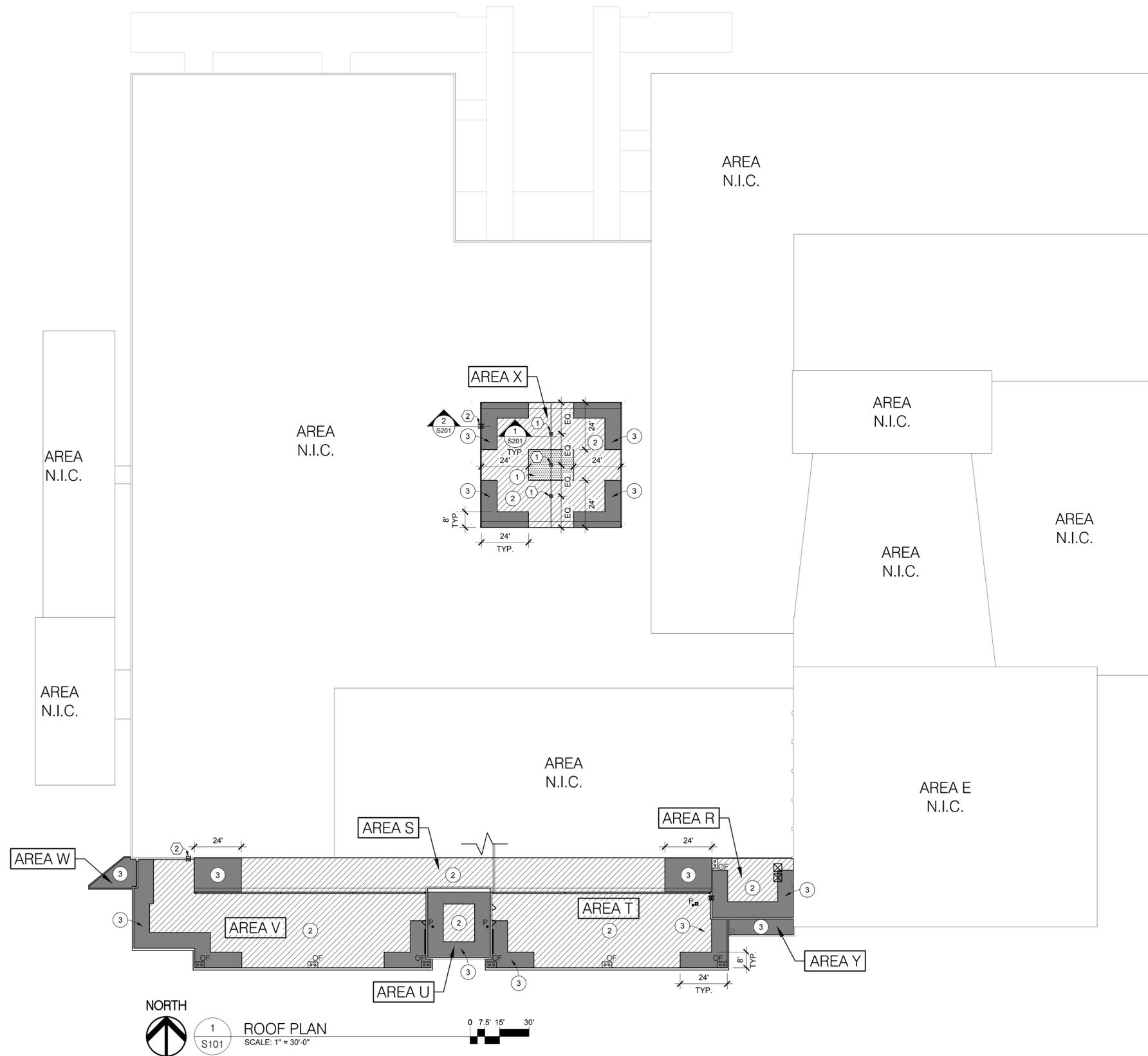
BID SET



7600 SW Beaverton, Suite 100
 Portland, Oregon 97223
 T.M. RIPPEY
 CONSULTING ENGINEERS
 EXP: 6/30/22

PROFESSIONAL ROOF CONSULTANTS INC.
 1108 SE GRAND AVENUE, SUITE 300
 PORTLAND, OREGON 97214
 PH. 503 280 8759 FAX: 503 280 8866

**BEAVERTON SCHOOL DISTRICT
 ALOHA HIGH SCHOOL
 PARTIAL ROOF REPLACEMENT**



ROOF WIND UPLIFT LOADS

ROOF WIND UPLIFT (psf)			
ZONE 1	ZONE 2	ZONE 2	ZONE 3
19.0	33.0	43.6	59.4

- NOTES:**
- CODE: ASCE 7-16 CH. 30.
 - BASIC WIND SPEED (3-SEC. GUST) = 103 MPH
 - RISK CATEGORY: III
 - WIND EXPOSURE: B
 - LOADS ARE AT ULTIMATE (LRFD) LEVEL. MULTIPLY VALUES BY 0.6 TO OBTAIN ALLOWABLE STRESS (ASD) LEVEL LOADS.
 - UPLIFT VALUES BASED ON TRIBUTARY AREA OF 10 SQ. FT.

KEYNOTES:

- FALL PROTECTION ANCHOR PER DETAIL 1/S201. (ALTERNATE BID #2)
- NEW WALL MOUNTED LADDER PER DETAIL 2/S201. (ALTERNATE BID #1)

SHEET TITLE:
 ROOF PLAN
 WIND LOAD DIAGRAM

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Date: APRIL 2021
 Revisions:

Drawn: JSC
 Check: JH / RNT
 File:
 TMR Job: 21118

BID SET

SHEET NUMBER:
S101

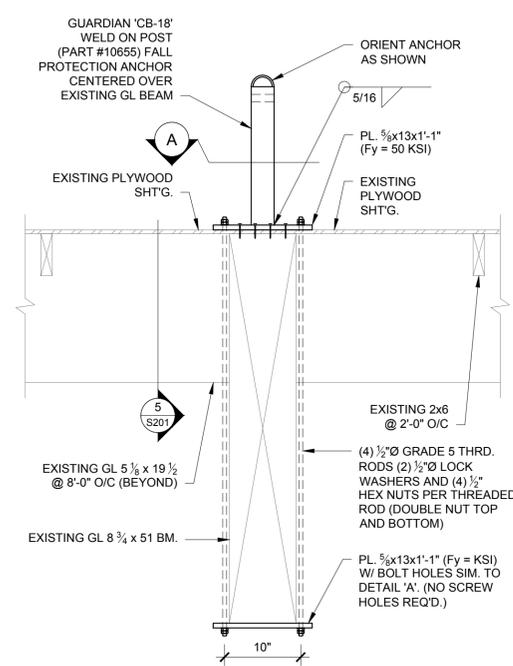


7600 SW Beaverton, Suite 100
 Tigard, Oregon 97223
 T.M. RIPPEY
 CONSULTING ENGINEERS
 EXP: 6/30/22

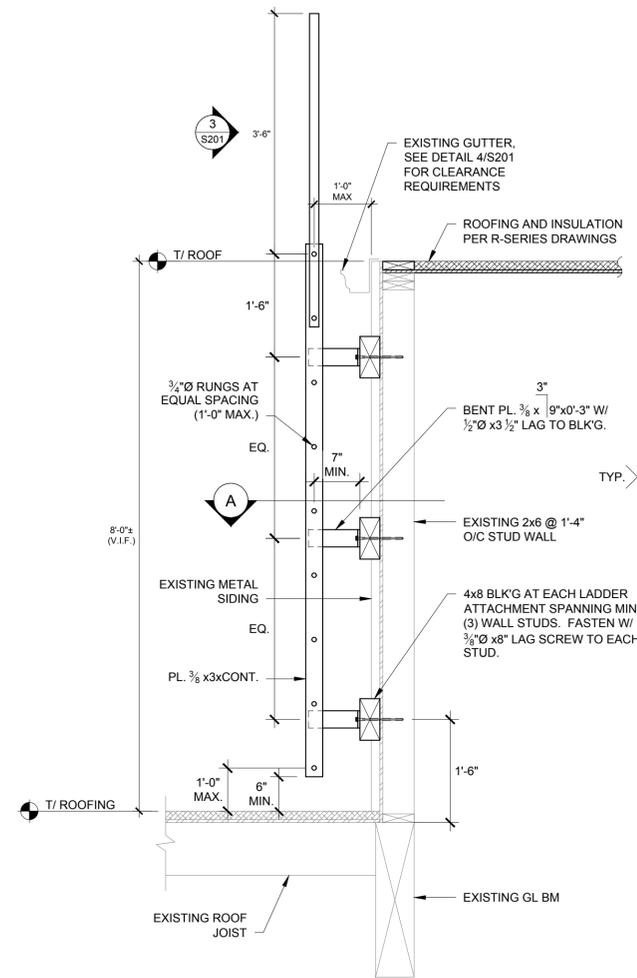
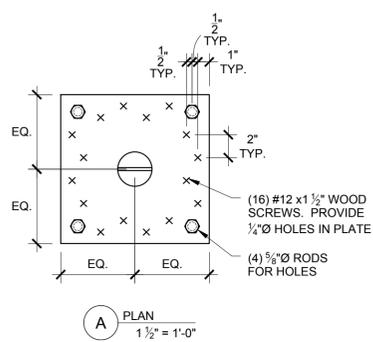


1108 SE GRAND AVENUE, SUITE 300
 PORTLAND, OREGON 97214
 PH. 503 280 8759 FAX: 503 280 8866

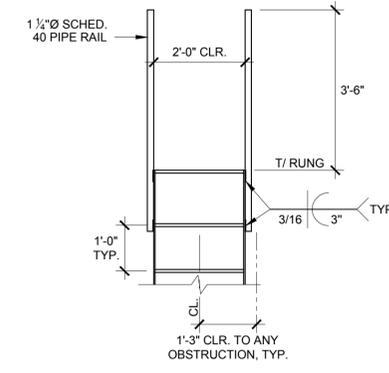
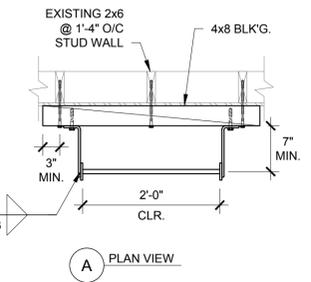
**BEAVERTON SCHOOL DISTRICT
 ALOHA HIGH SCHOOL
 PARTIAL ROOF REPLACEMENT**



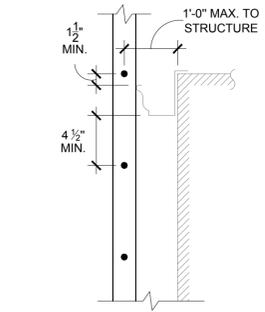
1 FALL PROTECTION ANCHOR
 S201 21118-01 SCALE: 1" = 1'-0"



2 LADDER SECTION
 S201 21118-02 SCALE: 3/4" = 1'-0"



3 LADDER ELEVATION
 S201 21118-03 SCALE: 1/2" = 1'-0"



4 CLEARANCE AT OBSTRUCTION
 S201 21118-04 SCALE: 1" = 1'-0"

SHEET TITLE:

STRUCTURAL DETAILS

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Date: APRIL 2021

Revisions:

Drawn: JSC

Check: JH / RNT

File:

TMR Job: 21118

BID SET

SHEET NUMBER:
S201