

# PROJECT: Roof Replacement and Accesories

**Berkeley Unified School District**  
1720 Oregon Street  
Berkeley, CA 94704

## Project Location:

**Oxford Elementary  
School**  
1130 Oxford Street  
Berkeley, CA 94707

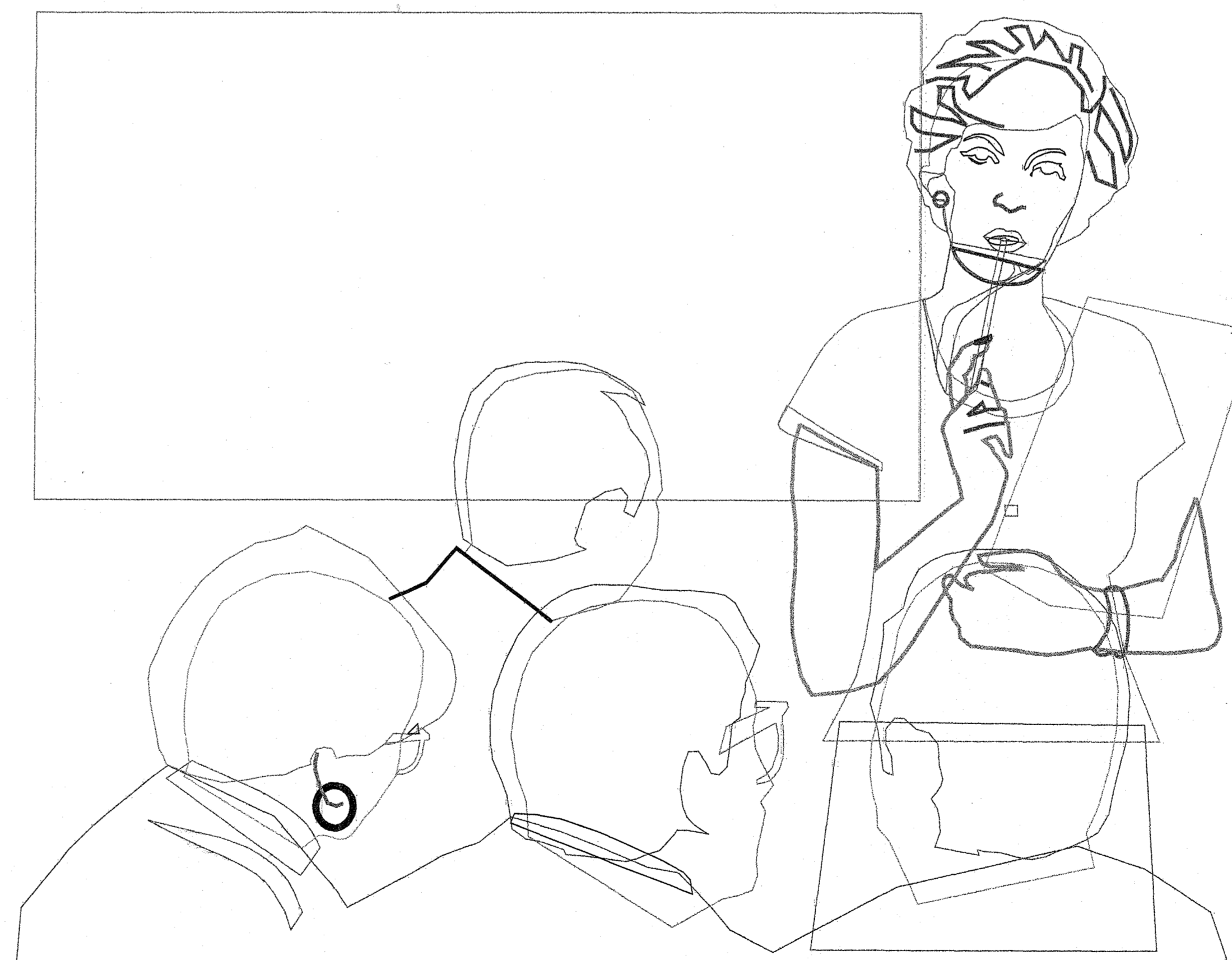
### SCOPE OF WORK:

CONTRACTOR SHALL REPLACE DESIGNATED ROOFS AND PERFORM  
MISCELLANEOUS WORK AS OUTLINED IN THE DRAWINGS AND SPECIFICATION.

NEW ROOF SYSTEM SHALL BE A UL CLASS A FIRE RATED SYSTEM.  
TYPE OF OCCUPANCY: STUDENTS, TEACHERS, ADMINISTRATION.

### APPLICABLE CODES TO INCLUDE:

1. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 1 BUILDING STANDARDS ADMINISTRATIVE CODE.
2. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 2/VOLUME 1 CALIFORNIA BUILDING CODE/AMENDMENTS WITH 1997 UBC, VOLUME 2
3. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 2/VOLUME 2 CALIFORNIA BUILDING CODE/AMENDMENTS WITH 1997 UBC, VOLUME 2
4. 1997 UNIFORM BUILDING CODE, VOLUME 3
5. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 3 CALIFORNIA ELECTRICAL CODE/AMMENDMENTS WITH 1996 NEC
6. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 4 CALIFORNIA MECHANICAL CODE/AMMENDMENTS WITH 1997 UMC
7. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 5 CALIFORNIA PLUMBING CODE WITH 1997 UPC
8. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 6 CALIFORNIA ENERGY CODE
9. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 9 CALIFORNIA FIRE CODE/AMMENDMENTS WITH 1997 UFC
10. STATE OF CALIFORNIA TITLE 24 (1998 EDITION) - PART 12 CALIFORNIA REFERENCED STANDARDS CODE
11. TITLE 19, CCR, PUBLIC SAFETY, STATE FIRE MARSHAL REGULATIONS
12. NRCA (LATEST EDITION) NATIONAL ROOFING CONTRACTORS ASSOCIATION GUIDELINES



General Notes

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Skyline Engineering

David Eastman  
Construction Specialist,  
Facilities Planning &  
Operations  
Berkeley Unified School  
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1720 Oregon Street  
Berkeley, CA 94704

No.	Revision/Issue	Date
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Firm Name and Address

**SKYLINE**  
Engineering, Inc.  
8991 Del Rio Circle  
Gilroy, CA 95020

Project Name and Address

Berkeley Unified School  
District  
Oxford Elementary  
School

Project Oxford Elementary  
School

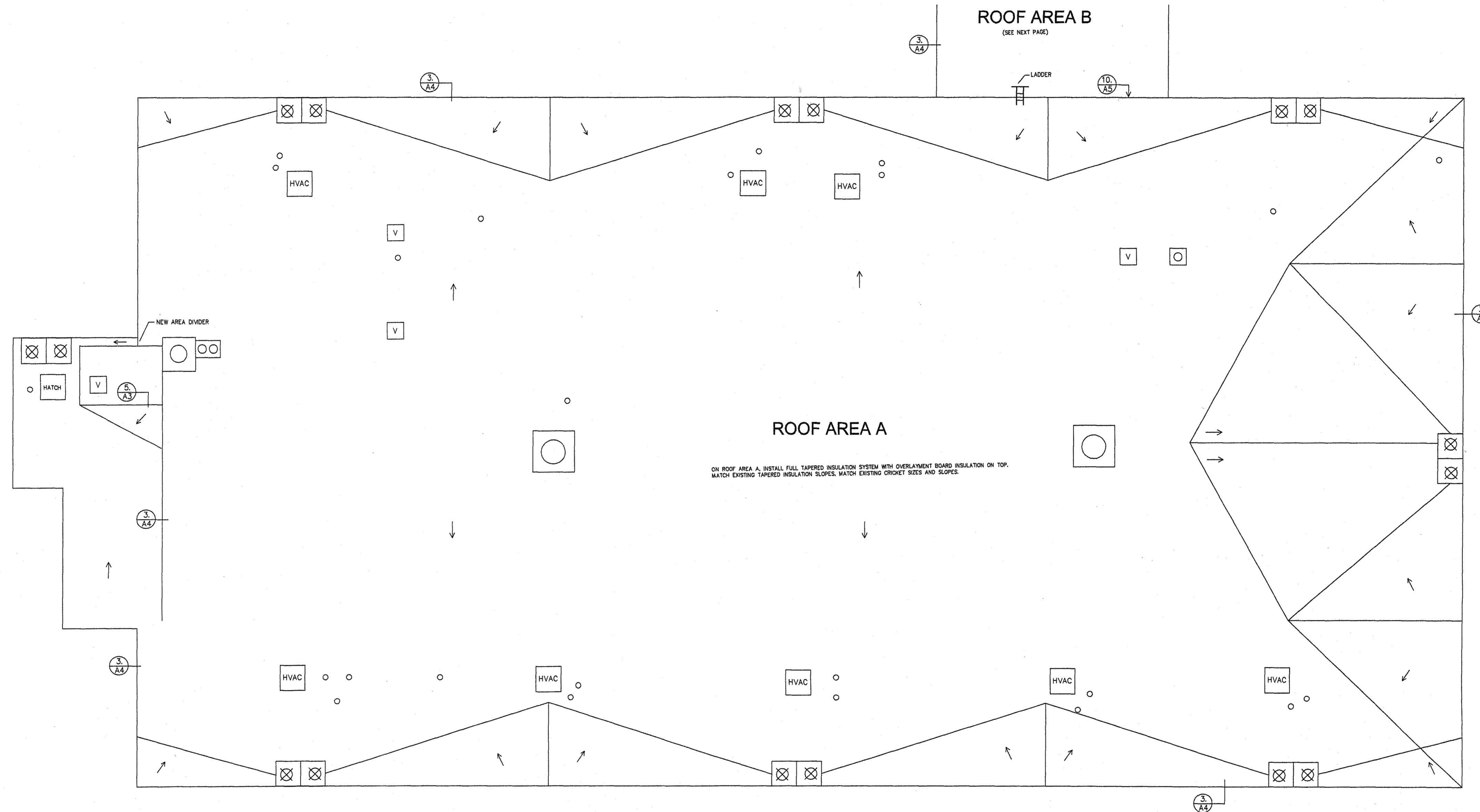
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April 2005  
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**A-1**  
**Title**  
**Page**

# General Notes

- Contractor shall remove existing roofs, insulations, base flashings, metal flashings, blocks, old sleepers/caps, metal, old downspouts, old funnel boxes, etc. from the roofs.
- Contractor shall install 2 additional wood nailer layers on top of perimeter wall around roof area A (build up an additional 3").
- Contractor shall mechanically attach full tapered insulation system and overlayment board insulation, per the wind uplift requirements, on roof area A. (Match existing tapered insulation slopes, cricket sizes on roof area A).
- Contractor shall mechanically attach overlayment board insulation, per wind uplift requirements, on roof area B and C. Install new crickets on C.
- Install 60 mil, white, TPO or PVC membrane fully adhered or mechanically attached.
- Install new metal everywhere (ie coping caps, cleats, skirts, counterflashings, primary scuppers, overflow scuppers, drain inserts, etc.).
- Install overflow scuppers and primary scuppers as shown. Contractor will have to core thru the walls for these.
- Install new drain inserts on roof area B, at old drain box locations. Install new overflow scuppers next to these. Install new downspouts below the drain inserts down to the ground. Install new wood decking here as needed when removing the drain boxes. Cut/repair soffit below as needed to install the new downspouts.
- Install new overflow scuppers and primary scuppers on roof area C. Install new funnel boxes and downspouts down to roof area B. Install drip pans and mats under the downspouts on roof area B.
- Install new 30 lb coated base sheet and composition shingles on steep roof between roof B and roof C.
- Install 1600 linear feet of walkpanels at the end of the job, at location of owner's desire.
- Clean, etch, prime and paint all metal at the end of the job (unless it is clad/membrane coated metal).
- Disconnect/reconnect/modify ladder as needed from roof area A to roof area B. Roof up and over the new block at base of ladder. Install metal cap over the block. Reconnect the ladder. Ensure ladder is solid/secure.



## General Notes

Equipment and projection locations are approximate.

Contractors are responsible for all measurements and projection counts.

## MECHANICAL LEGEND

SYMBOL	EQUIPMENT OR PROJECTION
○	ROUND PROJECTIONS
	SCUPPER
⊗	DRAIN
○	VENT
⊞	SKYLIGHT
⊞	VENT
⊞	ACCESS HATCH
⊞	CURB
⊞	HVAC
■	PITCH PAN

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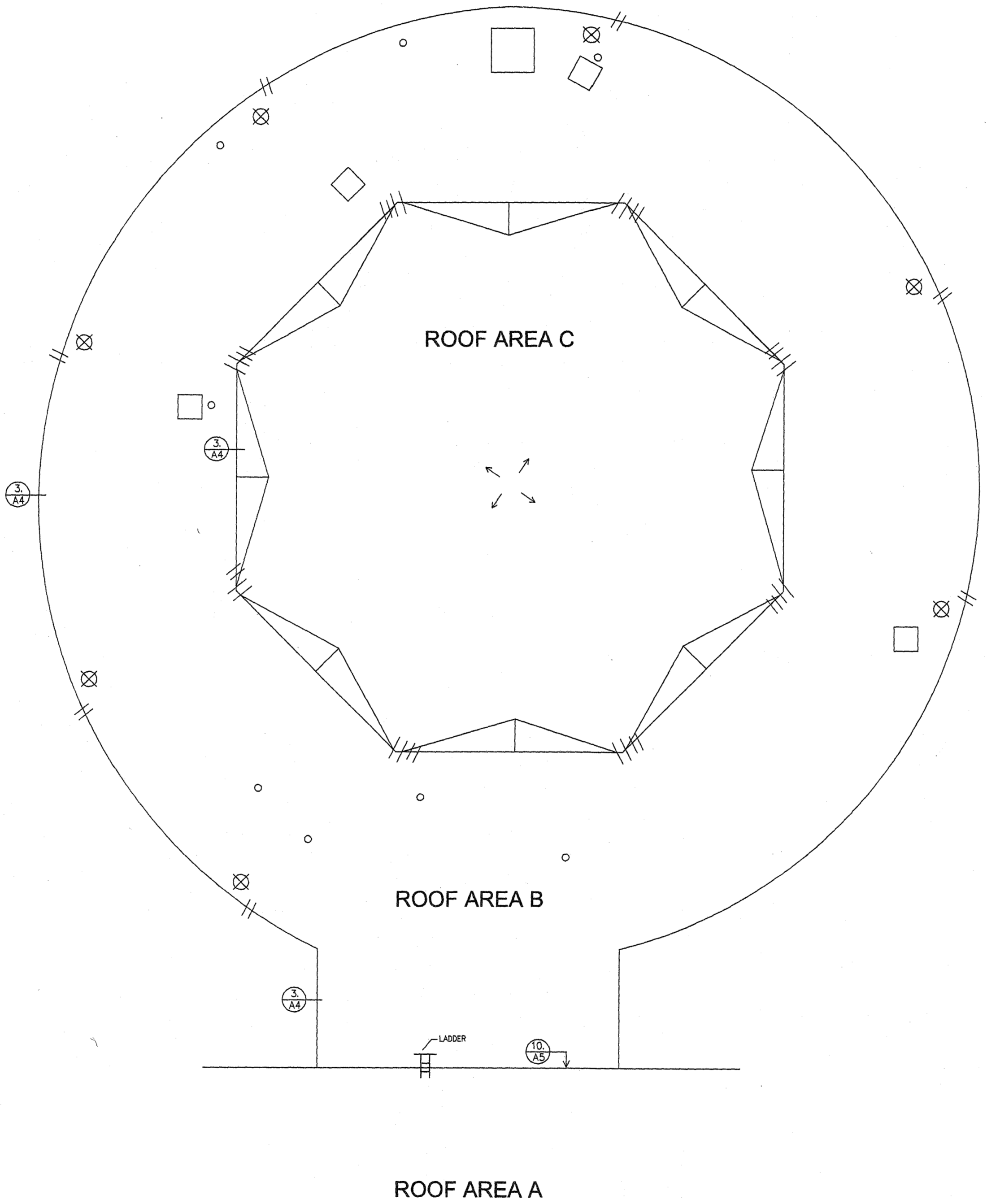
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1" = 8'  
1/8" = 1'

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A-2  
Roof Plan

General Notes

1. Contractor shall remove existing roofs, insulations, base flashings, metal flashings, blocks, old sleepers/caps, metal, old downspouts, old funnel boxes, etc. from the roofs.
2. Contractor shall install 2 additional wood nailer layers on top of perimeter wall around roof area A (build up an additional 3").
3. Contractor shall mechanically attach full tapered insulation system and overlayment board insulation, per the wind uplift requirements, on roof area A. (Match existing tapered insulation slopes, cricket sizes on roof area A).
4. Contractor shall mechanically attach overlayment board insulation, per wind uplift requirements, on roof area B and C. Install new crickets on C.
5. Install 60 mil, white, TPO or PVC membrane fully adhered or mechanically attached.
6. Install new metal everywhere (ie coping caps, cleats, skirts, counterflashings, primary scuppers, overflow scuppers, drain inserts, etc.).
7. Install overflow scuppers and primary scuppers as shown. Contractor will have to core thru the walls for these.
8. Install new drain inserts on roof area B, at old drain box locations. Install new overflow scuppers next to these. Install new downspouts below the drain inserts down to the ground. Install new wood decking here as needed when removing the drain boxes. Cut/repair soffit below as needed to install the new downspouts.
9. Install new overflow scuppers and primary scuppers on roof area C. Install new funnel boxes and downspouts down to roof area B. Install drip pans and mats under the downspouts on roof area B.
10. Install new 30 lb coated base sheet and composition shingles on steep roof between roof B and roof C.
11. Install 1600 linear feet of walkpanels at the end of the job, at location of owner's desire.
12. Clean, etch, prime and paint all metal at the end of the job (unless it is clad/membrane coated metal).
13. Disconnect/reconnect/modify ladder as needed from roof area A to roof area B. Roof up and over the new block at base of ladder. Install metal cap over the block. Reconnect the ladder. Ensure ladder is solid/secure.



General Notes

Equipment and projection locations are approximate.

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MECHANICAL LEGEND

SYMBOL	EQUIPMENT OR PROJECTION
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■	PITCH PAN

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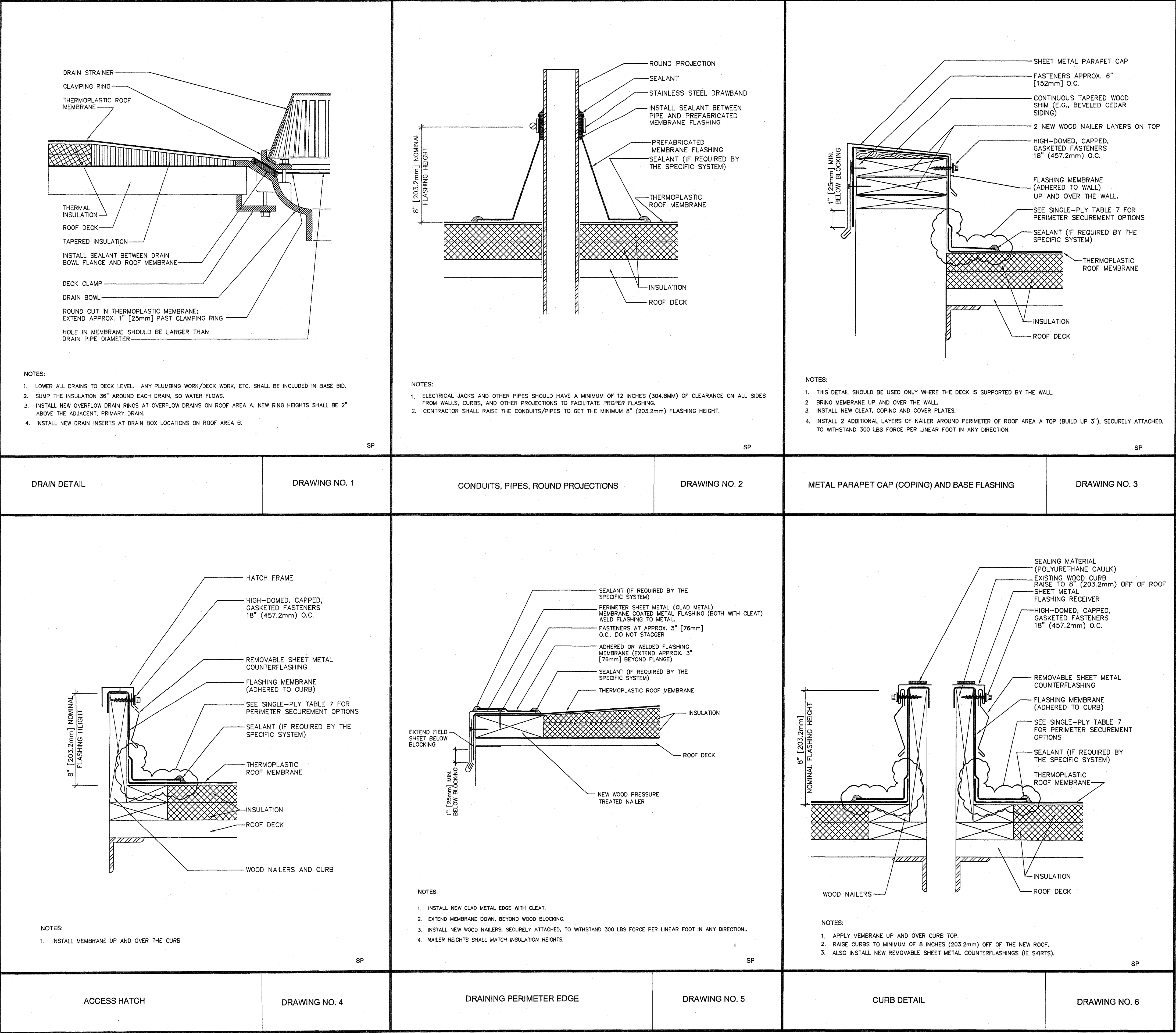
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A-3  
Roof Plan



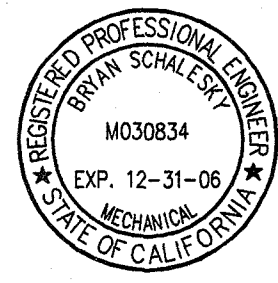
NOTES:

The purpose of these detail drawings is to provide the installer with a basic guideline for the installation of termination and projection flashings. Where field conditions warrant alteration of these details, the installer shall notify the owner and design engineer.

If conflict exists between these detail drawings and the flashing details as published by the manufacturer providing the warranty for this project, the more stringent requirements shall govern.

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Date	April 2005	A-4 Details
Scale	N.T.S.	

<p>NOTES:</p> <ol style="list-style-type: none"> <li>1. REPLACE ALL AIR VENTS/ATTIC VENTS WITH SAME SIZE AND SHAPE AS EXISTING.</li> <li>2. INSTALL NEW NAILERS. NAILER HEIGHT SHALL MATCH INSULATION HEIGHTS.</li> </ol> <p>SP</p>	7.	<p>NOTES:</p> <ol style="list-style-type: none"> <li>1. CONTRACTOR SHALL INSTALL DRAIN INSERTS AT ROOF AREA B DRAINS.</li> <li>2. CONTRACTOR SHALL REMOVE THE DRAIN BOXES, INSTALL NEW DECKING, CUT NEW HOLE IN DECKING FOR INSERT.</li> <li>3. CONTRACTOR SHALL INSTALL NEW DOWNSPOUTS BELOW, CUT/REPAIR SOFFET AS NEEDED.</li> <li>4. SUMP THE INSULATION AROUND THE DRAIN INSERT.</li> <li>5. INSTALL NEW DECKING AFTER REMOVING THE DRAIN BOXES, MATCH ADJACENT DECKING, ENSURE SOLID/SECURE. ANY DECK WORK, PLUMBING WORK, SOFFET WORK, ETC TO BE INCLUDED IN BASE BID PRICE.</li> </ol> <p>SP</p>	8.	<p>NOTES:</p> <ol style="list-style-type: none"> <li>1. INSTALL MEMBRANE UP AND OVER THE WOOD SLEEPER.</li> <li>2. INSTALL NEW SKIRTS USING FASTENERS WITH NEOPRENE WASHERS.</li> <li>3. INSTALL NEW METAL CAP, BOLTS, SLEEPER, ETC.</li> <li>4. DISCONNECT, RECONNECT, MODIFY LADDER AS NEEDED. ENSURE IT IS SOLID/SECURE.</li> </ol> <p>SP</p>	9.
<p>NOTES:</p> <ol style="list-style-type: none"> <li>1. THIS DETAIL SHOULD BE USED ONLY WHERE THE DECK IS SUPPORTED BY THE WALL.</li> <li>2. THE JOINTS IN THE SHEET METAL COUNTERFLASHING SHOULD NOT BE SOLDERED.</li> <li>3. RAISE HEIGHT OF FLASHING TO EIGHT INCHES MINIMUM. CUT, REPAIR WALL AS NEEDED.</li> <li>4. INSTALL VERTICAL WOOD NAILER AS NEEDED TO ENSURE A SOLID/SMOOTH BACKING.</li> </ol> <p>SP</p>	10.	<p>TABLE 7 PERIMETER BASE SECUREMENT AT ROOF TO WALL &amp; ROOF TO CURB INTERSECTIONS</p> <p>SP</p>	11.	<p>NOTES:</p> <ol style="list-style-type: none"> <li>1. INSTALL NEW SCUPPERS (CLAD COATED) AT OVERVIEW DRAWING LOCATIONS.</li> <li>2. CONTRACTOR MUST CUT THROUGH EXISTING WALL BEFORE INSTALLING SCUPPERS.</li> <li>3. CAULK OUTSIDE OF SCUPPERS.</li> <li>4. INSTALL OVERFLOW SCUPPERS 2 INCHES (50.8mm) ABOVE ADJACENT DRAIN OR ADJACENT PRIMARY SCUPPER. (PRIMARY SCUPPERS SHALL BE INSTALLED LEVEL WITH ROOF SURFACE).</li> <li>5. PRIMARY SCUPPERS SHALL BE 6"x6", OVERFLOW SCUPPERS SHALL BE 4"x4".</li> <li>6. PRIMARY SCUPPERS SHALL DUMP WATER INTO NEW FUNNEL BOXES THAT CONNECT TO NEW DOWNSPOUTS. BRING NEW DOWNSPOUTS DOWN WALL. INSTALL DRIP PANS UNDER DOWNSPOUTS, WITH PROTECTIVE MEMBRANE MAT. SECURE AS NEEDED.</li> </ol> <p>SP</p>	12.
ATTIC VENTS	10.	DRAIN INSERT (FOR ROOF AREA B)	11.	EQUIPMENT SUPPORT DETAIL (I.E. UNDER LADDER)	12.
STUCCO STOP	7.	DRAIN INSERT (FOR ROOF AREA B)	8.	EQUIPMENT SUPPORT DETAIL (I.E. UNDER LADDER)	9.

# NOTES:

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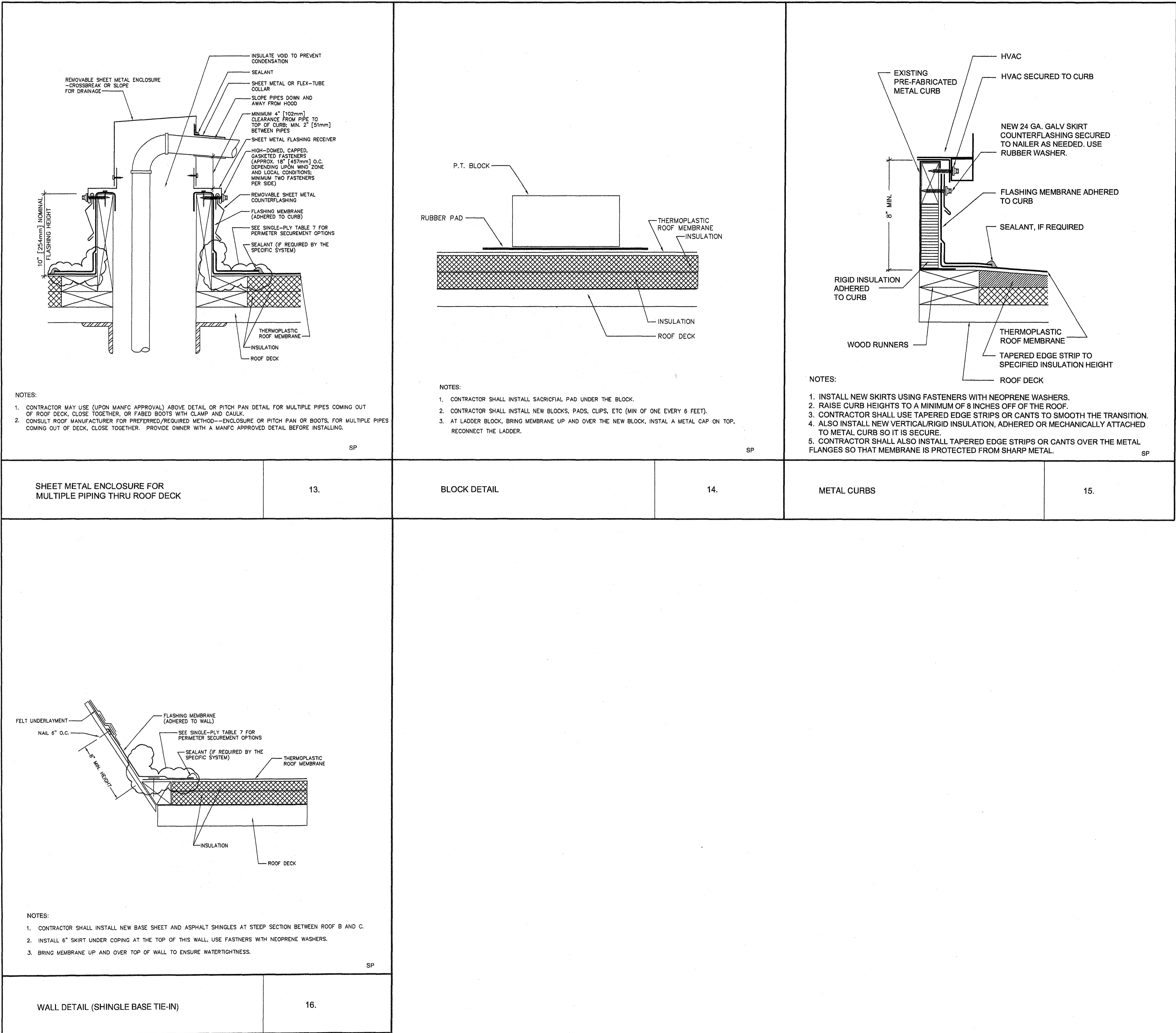
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