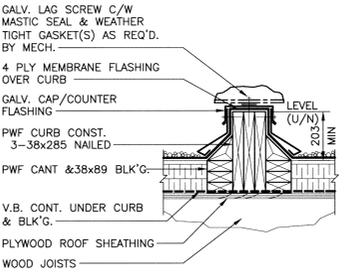


DESIGN LOADS:
SNOW LOAD: S_s = 1.9 kPa
RAIN LOAD: S_r = 0.2 kPa



GENERAL NOTES:

- 1. ALL SPECIFICATIONS AND CODES SPECIFIED SHALL BE THE LATEST REVISION AVAILABLE.
- 2. SITE VERIFY ALL DIMENSIONS, ELEVATIONS, DETAILS, QUANTITIES AND CONDITIONS PRIOR TO START OF ANY DEMOLITION, CONSTRUCTION OR PREFABRICATION OF ANY STRUCTURAL COMPONENT.
- 3. EXISTING STRUCTURAL SUPPORTS WHICH INTERFERE WITH NEW WORK SHALL BE RELOCATED UPON APPROVAL BY THE DESIGN ENGINEER.
- 4. SHIP, STORE, HANDLE, ERECT, INSTALL, ETC. ALL BUILDING MATERIALS, COMPONENTS, FIXTURES, EQUIPMENT, ETC. AS PER MANUFACTURER'S WRITTEN INSTRUCTIONS.
- 5. EACH TRADE SHALL BE RESPONSIBLE TO PROVIDE ADEQUATE PROTECTION FOR THE EXISTING FACILITY/PROPERTY TO PREVENT PHYSICAL DAMAGE AND LOSS OF VALUE OR USE OF ANY KIND, AS A RESULT OF DEMOLITION, CONSTRUCTION AND RELATED ACTIVITIES.
- 6. TIME AND DURATION OF ANY NECESSARY DISRUPTION IN THE USE OF ANY ROOM, SPACE, SERVICE, EQUIPMENT, ETC. SHALL BE COORDINATED WITH, AND APPROVED BY THE OWNER AT THE START OF THE PROJECT. PROVIDE OWNER WITH MINIMUM ONE WEEK NOTICE (OR AS REQUIRED) PRIOR TO EACH ACTUAL OCCURRENCE.
- 7. THE CONTRACTOR SHALL BE RESPONSIBLE TO NOTIFY THE OWNER AND THE DESIGN ENGINEER OF ANY PREVIOUSLY UNNOTICED PRE-EXISTING FLAW OR CONDITION THAT MIGHT INCREASE THE SCOPE OF WORK OR COMPROMISE NEW CONSTRUCTION, PRIOR TO THE START OF DEMOLITION AND CONSTRUCTION, OR AS SOON AS IT IS DISCOVERED.

DEMOLITION:

- 1. ALL DEMOLITION WORK SHALL BE DONE IN ACCORDANCE WITH THE REQUIREMENTS OF ALL PERTINENT BUILDING CODES, THE MANITOBA DEPARTMENT OF LABOUR, AND ANY OTHER PROVINCIAL AND LOCAL BY-LAWS, REGULATIONS AND ORDINANCES.
- 2. DEMOLITION SHALL INCLUDE THE SAFE REMOVAL, HAULING AND DUMPING OF ALL DEBRIS, ETC. TO AN APPROVED SITE. ALL COSTS ASSOCIATED WITH THIS OPERATION, INCLUDING TRANSPORT, LICENSES AND FEES SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.

STRUCTURAL AND MISCELLANEOUS STEEL:

- 1. STRUCTURAL AND MISCELLANEOUS STEEL FABRICATION AND ERECTION SHALL BE IN ACCORDANCE WITH CAN/CSA S16 (LATEST).
- 2. STRUCTURAL STEEL SHALL MEET THE REQUIREMENTS OF CAN/CSA G40.20/G40.21 (LATEST).
ROLLED W-SHAPES CSA G40.21-350W
ROLLED SHAPES & PLATES CSA G40.21-300W
HSS SECTIONS CSA G40.21-350W
CLASS C H
STANDARD PIPE ASTM A53
COLD FORMED STEEL CSA S136
ANCHOR BOLTS (GALV) ASTM A307
BOLTS, NUTS, & WASHERS ASTM A325
WELDING ELECTRODES CSA W48.1
- 3. WELDING SHALL BE IN ACCORDANCE WITH CSA W59 (LATEST), BY WELDERS CERTIFIED AND QUALIFIED IN ACCORDANCE WITH CSA W47.1 (LATEST). ALL WELDS TO BE 6mm UNLESS NOTED OTHERWISE.
- 4. CONTRACTOR SHALL SUBMIT SHOP DRAWINGS FOR REVIEW PRIOR TO FABRICATION.
- 5. STRUCTURAL AND MISCELLANEOUS STEEL SHALL BE FINISHED AS INDICATED BELOW, UNLESS OTHERWISE NOTED, OR APPROVED EQUAL:
EXTERIOR STEEL
- SURFACE PREP TO SP6 (COMMERCIAL BLAST)
- ONE PRIME COAT INTERZINC 52 ZINC-RICH EPOXY (2.5 MIL DFT.)
- ONE FINISH COAT INTERGARD 345 HIGH BUILD EPOXY (6.0 MIL DFT.)
- 6. COLOUR OF STRUCTURAL AND MISCELLANEOUS STEEL SHALL BE AS FOLLOWS:
- STRUCTURAL STEEL - NEUTRAL GREY
- 7. FIELD TOUCH-UP PAINT TO CONNECTIONS, WELDS, BURNED OR DAMAGED SURFACES, AND UNFINISHED SURFACES AT COMPLETION OF ERECTION SHALL MATCH THICKNESS AS SPECIFIED.
- 8. PAINTED SURFACES OF EXISTING STEEL SHALL BE GROUND SMOOTH TO BARE METAL PRIOR TO FIELD WELDING.
- 9. HEAT STRAIGHTENING PROCEDURE SHALL BE APPROVED BY A WELDING ENGINEER AND BE SUBMITTED PRIOR TO REPAIR OF BENT MEMBERS.

SCOPE OF WORK:

- 1. REMOVE EXISTING ROOF CURBS AS REQUIRED.
- 2. INSTALL NEW CURBS AND STAND.
- 3. LATEST ROOFING MEMBRANE.

CONSTRUCTION NOTES:

- 1. CONTRACTOR TO CONFIRM THAT DOUBLE ROOF JOISTS EXIST ON EACH SIDE OF ROOF OPENINGS. SEE SECTION S/S02.
- 2. CONTRACTOR TO ENSURE CONSTRUCTED SUPPORTS CONFORM TO THE DIMENSIONS OF THE SUPPLIED EQUIPMENT.
- 3. CURBS FOR AMU-1 AND AHU-2 ARE TO ENCOMPASS THE EXISTING ROOF OPENINGS AND NEW UNIT DUCT OPENINGS.
- 4. EXISTING ROOF OPENINGS ARE NOT TO BE ENLARGED OR MOVED.

WOOD FRAMING:

- 1. FRAMING LUMBER SHALL BE GRADED IN ACCORDANCE WITH NGLA "STANDARD GRADING RULES FOR CANADIAN LUMBER".
- 2. MINIMUM GRADES TO BE AS FOLLOWS:
COMPONENT GRADE
BEAMS, STUDS AND PLATES (U/N) S-P-F NO.2
- 3. LUMBER MOISTURE CONTENT NOT TO EXCEED 19%.
- 4. SHEATHING TO BE EXTERIOR GRADE DFP PLYWOOD AS SPECIFIED BY CSA 0121
- 5. MINIMUM FRAMING REQUIREMENTS TO BE IN ACCORDANCE WITH PART 9 "WOOD FRAME CONSTRUCTION" SECTION OF THE MANITOBA BUILDING CODE.
- 6. CUT LUMBER NEAT AND SQUARE PROVIDING FULL SURFACE CONTACT WITH ADJOINING MEMBERS.

ROOFING - GENERAL:

ALTERNATES

- 1. REQUESTS FOR ALTERNATES ON SPECIFIED PRODUCTS MUST BE SUBMITTED TO THE DESIGN ENGINEER, IN WRITING. THESE REQUESTS MUST BE ACCOMPANIED BY A TECHNICAL DATA SHEETS DESCRIBING PROPOSED PRODUCT EQUIVALENCY.
- 2. ROOFING AND SHEET METAL WORK WILL BE PERFORMED IN CONFORMANCE WITH THE ROOFING MANUFACTURER'S WRITTEN RECOMMENDATIONS AS WELL AS THE REQUIREMENTS OF THE UL-C LABORATORIES CLASS C CLASSIFICATION AND CRCA.

CONTRACTOR QUALIFICATION

- 1. ROOFING CONTRACTORS AND SUB-CONTRACTORS MUST, WHEN TENDERING OR PERFORMING WORK, POSSESS A ROOFING CONTRACTOR OPERATING LICENSE - ONLY QUALIFIED, CERTIFIED INSTALLERS EMPLOYED BY A COMPANY WITH THE APPROPRIATE EQUIPMENT MAY EXECUTE THE ROOFING WORK.

GUARANTEES

- 1. THE PRODUCT MANUFACTURER WILL ISSUE A WRITTEN AND SIGNED DOCUMENT IN THE OWNER'S NAME, CERTIFYING ALL PRODUCT PERFORMANCE PROPERTIES FOR A PERIOD OF TEN (10) YEARS, STARTING FROM THE DATE OF ACCEPTANCE. THIS WARRANTY WILL COVER THE REMOVAL AND REPLACEMENT OF DEFECTIVE ROOF MEMBRANE PRODUCTS, INCLUDING LABOUR. THE WARRANTY MUST REMAIN A FULL WARRANTY FOR THE DURATION OF THE PERIOD SPECIFIED. THE SCOPE OF THIS WARRANTY MUST NOT BE LIMITED BY OTHER SYSTEM COMPONENTS MANUFACTURED OR DISTRIBUTED BY THE MEMBRANE MANUFACTURER. NO LETTER AMENDING THE MANUFACTURER'S STANDARD WARRANTY WILL BE ACCEPTED AND THE WARRANTY CERTIFICATE MUST REFLECT THESE REQUIREMENTS.
- 2. THE CONTRACTOR WILL ISSUE A WRITTEN AND SIGNED DOCUMENT IN THE OWNER'S NAME, CERTIFYING THAT THE WORK EXECUTED WILL REMAIN IN PLACE AND FREE OF ANY WORKMANSHIP DEFECT FOR A PERIOD OF TWO YEARS, STARTING FROM THE DATE OF ACCEPTANCE.

EXECUTION

- 1. BEFORE ROOFING WORK BEGINS, THE OWNER'S REPRESENTATIVE AND ROOFING FOREMAN WILL INSPECT AND APPROVE DECK CONDITIONS. IF NECESSARY, A NON-COMFORMITY NOTICE WILL BE ISSUED TO THE CONTRACTOR SO THAT REQUIRED CORRECTIONS CAN BE MADE. THE START OF ROOFING WORK WILL MEAN ROOFING CONDITIONS ARE ACCEPTABLE FOR WORK COMPLETION.
- 2. DO NOT BEGIN ANY WORK BEFORE SURFACES ARE SMOOTH, DRY, EXEMPT OF ICE AND DEBRIS. USE OF CALCIUM OR SALT IS FORBIDDEN FOR ICE OR SNOW REMOVAL.
- 3. NO MATERIALS WILL BE INSTALLED DURING RAIN OR SNOWFALL.

SITE PROTECTION

- 1. PROTECT FINISHED WORK TO AVOID DAMAGE DURING ROOF INSTALLATION AND MATERIAL TRANSPORTATION. INSTALL PROTECTIVE BOARDWALKS OVER INSTALLED ROOFING MATERIALS TO ENABLE PASSAGE OF PEOPLE AND PRODUCTS. ASSUME FULL RESPONSIBILITY FOR ANY DAMAGE.

PRIMER APPLICATION

- 1. ROOFING SUBSTRATES OF WOOD, METAL, CONCRETE, MASONRY OR GYPSUM BOARD SURFACES WILL RECEIVE A COAT OF ASPHALT PRIMER (NONE REQUIRED FOR FACTORY-PAINTED METALS). ALL SURFACES TO BE PRIMED MUST BE FREE OF RUST, DUST OR ANY RESIDUE THAT MAY HINDER ADHERENCE. COVER PRIMED SURFACES WITH ROOFING MEMBRANE AS SOON AS POSSIBLE.

ROOF MEMBRANE (SBS MODIFIED):

- 1. ROOF MEMBRANE TO BE 2 PLY SBS MODIFIED BITUMEN MEMBRANE. ALL COMPONENTS OF THE ROOF MEMBRANE SYSTEM TO BE THE PRODUCTS OF A SINGLE MANUFACTURER. ACCEPTABLE MANUFACTURER: SOPREMA OR APPROVED EQUAL.
- 2. BASE SHEET TO BE "SOPRALENE FLAMSTICK", A ROOFING MEMBRANE WITH COMPOSITE HEAVY DUTY AND SBS MODIFIED BITUMEN. THE TOP FACE IS COVERED WITH A THERMOFUSIBLE PLASTIC FILM, THE UNDERSIDE IS SELF-ADHESIVE.
- 3. CAP SHEET TO BE "SOPRALENE FLAM 250 GR", A NON-WOVED POLYESTER REINFORCEMENT AND SBS MODIFIED BITUMEN. COLOURED GRANULES (TO MATCH EXISTING) ON TOP FACE AND THERMOFUSIBLE PLASTIC FILM ON BOTTOM FACE. CAP SHEET TO BE TORCH APPLIED TO BASE SHEET.
- 4. CAP SHEET FLASHING TO BE "SOPRALENE FLAM 250 GR" ROOFING MEMBRANE WITH NON-WOVEN POLYESTER REINFORCEMENT AND ELASTOMERIC BITUMEN WITH FLAME-RETARDING AGENT. THE TOP FACE IS PROTECTED BY COLOURED GRANULES, THE UNDER FACE IS COVERED WITH A THERMOFUSIBLE PLASTIC FILM.
- 5. PRIME SUBSTRATE AS RECOMMENDED BY MANUFACTURER.
- 6. FLAME-STOP MEMBRANE TO BE "SOPRAGUARD TAPE" BY SELF-ADHESIVE MEMBRANE COMPOSED OF A GLASS MAT REINFORCEMENT AND SBS MODIFIED BITUMEN DESIGNED TO PREVENT FLAMES FROM PENETRATING INTO EMPTY SPACES AND OPENINGS WHILE INSTALLING HEAT-WELDED MEMBRANES.
- 7. WATERPROOFING MASTIC TO BE "SOPRAMASTIC ALU" MASTIC MADE OF SYNTHETIC RUBBERS, PLASTICIZED WITH BITUMEN AND SOLVENTS. ALUMINIUM PIGMENTS ARE ADDED TO SOPRAMASTIC ALU TO PROVIDE GREATER RESISTANCE TO U-V.
- 8. ALL ROOF MEMBRANE COMPONENTS TO BE SHIPPED, STORED, HANDLED AND INSTALLED IN STRICT CONFORMANCE WITH MANUFACTURER'S WRITTEN INSTRUCTIONS.

Public Works and Government Services Canada / Travaux publics et Services gouvernementaux Canada
REAL PROPERTY SERVICES
Western Region
SERVICES IMMOBILIERS
Région de l'Ouest



DO NOT SCALE DRAWINGS

Revision/Édition	Description/Description	Date/Date
0	ISSUED FOR CONSTRUCTION	13/05/09

Client/client
PUBLIC WORKS AND GOVERNMENT SERVICES CANADA

100-167 LOMBARD AVENUE WINNIPEG MB R3C 2Z1

Project title/Titre du projet
REPLACEMENT OF AIR HANDLING UNITS OSBORNE CORRECTIONAL COMMUNITY CENTRE 1048 MAIN STREET, WINNIPEG, MB

Approved by/Approuvé par
HRF

Designed by/Concept par
HRF

Drawn by/Dessiné par
MBB
PWSC Project Manager/Administrateur de Projets TPSC
TIM LODGE

PWSC, Architectural and Engineering Resources Manager/ Ressources Architecturales et de Directeur d'ingénierie, TPSC

Client/client
STRUCTURAL ROOF PLAN, DETAIL & NOTES

Project No./No. du projet R.058521.001	Sheet/Fauille S01 OF 02	Revision no./La Révision 0
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