STRUCTURAL DESIGN CRITERIA

1. THESE NOTES SUPPLEMENT THE SPECIFICATIONS. PROJECT SPECIFICATIONS SHALL BE REFERRED TO FOR CLARIFICATIONS AND ADDITIONAL INFORMATION. IN CASE OF CONFLICT BETWEEN PROJECT SPECIFICATIONS AND THESE NOTES, THESE NOTES SHALL GOVERN.

2. GOVERNING BUILDING CODE: 2015 IBC AS AMENDED BY THE STATE OF WISCONSIN.

3. DESIGN LOADS

LIVE LOAD
- TYPICAL SLAB ON GRADE ---- 100 psf
- MEZZANINE ---- 100 psf

ROOF
- LIVE LOAD
- SNOW ---- 30 psf+DRIFTING
- SUPERIMPOSED DEAD LOAD
- TOP CHORD ---- 10 psf
- BOTTOM CHORD ---- 10 psf

SNOW LOADS
- GROUND SNOW (Pg) ---- 30 psf
- SNOW LOAD IMPORTANCE FACTOR (Is) ---- 1.0
- SNOW LOAD EXPOSURE FACTOR (Ce) ---- 1.0
- ROOF THERMAL LOAD FACTOR (Ct) AT BUILDING ---- 1.1
- BASE ROOF SNOW LOAD AT BUILDING ---- 21 psf

WIND LOADS
- BASIC WIND SPEED ---- 107 mph
- BUILDING OCCUPANCY CATEGORY ---- II
- WIND LOAD IMPORTANCE FACTOR (Iw) ---- 1.0
- WIND EXPOSURE CATEGORY ---- C
- INTERNAL PRESSURE COEFFICIENT ---- ±0.18

MAIN WIND FORCE - RESISTING SYSTEM:
- MWFRS SELECTED EDGE STRIP DISTANCE, (2A) ---- 11.0 ft
- CALCULATED HORIZONTAL LOADS:

	END ZONE		INTERIOR ZONE	
	WALL	ROOF	WALL	ROOF
TRANSVERSE CASE #1:	24.0 psf	16.5 psf	19.2 psf	13.2 psf
TRANSVERSE CASE #2:	24.0 psf	16.5 psf	19.2 psf	13.2 psf
LONGITUDINAL:	24.0 psf	16.5 psf	19.2 psf	13.2 psf

- CALCULATED VERTICAL LOADS:

	END ZONE		INTERIOR ZONE	
	WINDWARD	LEEWARD	WINDWARD	LEEWARD
TRANSVERSE CASE #1:	1.8 psf	-14.7 psf	0.7 psf	-12.5 psf
TRANSVERSE CASE #2:	9.3 psf	-7.2 psf	8.0 psf	-5.2 psf
LONGITUDINAL:	-25.7 psf	-14.7 psf	-17.8 psf	-11.3 psf

COMPONENTS AND CLADDING:
- (SEE ASCE/SEI 7-SECTION 6 FOR ZONE DEFINITIONS AND DIAGRAMS)
- COMPONENT AND CLADDING SELECTED EDGE STRIP DISTANCE, (A) ---- 5.5 ft

TRIBUTARY WIND LOAD AREAS	10 ft²	50 ft²	100 ft²
ROOF (MONOSLOPE):			
ZONE 1 (NEGATIVE)	19.7 psf	17.3 psf	16.3 psf
ZONE 2 (NEGATIVE)	23.0 psf	20.7 psf	19.7 psf
ZONE 3 (NEGATIVE)	23.0 psf	20.7 psf	19.7 psf
WALLS:			
ZONE 4 (NEGATIVE)	21.3 psf	19.3 psf	18.4 psf
ZONE 5 (NEGATIVE)	26.3 psf	22.3 psf	20.4 psf
ZONE 4 & 5 (NEGATIVE)	19.7 psf	17.6 psf	16.7 psf

SEISMIC LOADS
- SEISMIC USE GROUP / OCCUPANCY CATEGORY ---- II
- SEISMIC IMPORTANCE FACTOR (Ie) ---- 1.0
- SEISMIC SITE CLASS ---- C
- SPECTRAL RESPONSE COEFFICIENT (Sds) ---- 0.048
- SPECTRAL RESPONSE COEFFICIENT (Sd1) ---- 0.032
- SEISMIC DESIGN CATEGORY ---- A
- BASIC SEISMIC FORCE RESISTING SYSTEM:
  - BEARING WALL SYSTEM
  - LIGHT FRAMED WALL SHEATHED WITH WOOD STRUCTURAL PANELS RATED FOR SHEAR RESISTANCE:
    R = 6.5 Ωo = 3.0 Cd = 4.0
- ANALYSIS PROCEDURE:
  - EQUIVALENT LATERAL FORCE PROCEDURE

4. FOUNDATIONS AND EARTHWORK
   - ALLOWABLE SOIL BEARING PRESSURE FOR FOOTINGS ---- 4,000 psf

5. CONCRETE
   - MINIMUM 28 DAY COMPRESSIVE STRENGTH (f'c)
     - FOOTINGS ---- 4,000 psi
     - PIERS, WALLS ---- 4,000 psi
     - SLAB-ON-GRADE (INTERIOR) ---- 3,500 psi
     - SLAB-ON-GRADE (EXTERIOR) ---- 4,500 psi
   - COVER ON MILD STEEL REINFORCEMENT
     - CONCRETE CAST AGAINST AND PERMANENTLY EXPOSED TO EARTH ---- 3"
     - CONCRETE EXPOSED TO EARTH OR WEATHER
       - #5 BARS AND SMALLER ---- 1 1/2"
       - #6 BARS AND LARGER ---- 2"
     - CONCRETE NOT EXPOSED TO WEATHER OR IN CONTACT WITH GROUND ---- 1"
   - CONCRETE REINFORCEMENT YIELD STRENGTH (Fy)
     - ALL DEFORMED MILD STEEL ---- 60,000 psi
     - WELDED WIRE FABRIC ---- 65,000 psi

6. CONCRETE MASONRY
   - DESIGN STRESSES
     - MASONRY (NORMAL WEIGHT) MEETING ASTM C90 ---- f'm = 2,250 psi
     - GROUT: MIN COMPRESSIVE STRENGTH AT 28 DAYS MEETING ASTM C476 ---- 3,000 psi
     - MINIMUM BLOCK COMPRESSIVE STRENGTH ---- 2,600 psi

7. STRUCTURAL STEEL
   - STRUCTURAL STEEL YIELD STRENGTH (Fy)
     - TUBES ---- 46,000 psi
     - WF BEAMS ---- 50,000 psi
     - WF COLUMNS ---- 50,000 psi
     - BOLTS FOR STANDARD FRAME CONNECTIONS ---- 3/4" DIAMETER A325
     - BOLTS FOR SINGLE SHEAR TAB CONNECTIONS ---- 3/4" DIAMETER A325
     - ANCHOR RODS ---- F1554
     - WELDING ELECTRODES ---- E70

8. MISCELLANEOUS
   - VERIFY OPENINGS THROUGH FLOOR AND WALLS WITH ARCHITECTURAL, MECHANICAL, PLUMBING, AND ELECTRICAL REQUIREMENTS. CHANGES IN SIZE, LOCATION OR NUMBER OF OPENINGS SHOWN ON THE STRUCTURAL DRAWINGS SHALL NOT BE PERMITTED WITHOUT WRITTEN APPROVAL OF THE STRUCTURAL ENGINEER. NOT ALL OPENINGS ARE SHOWN ON THE STRUCTURAL DRAWINGS.

GENERAL NOTES APPLY TO ALL SHEETS

1. CONTRACTOR TO PROVIDE DRAFT STOPPING IN ATTIC. MAXIMUM AREA OF SUBDIVIDE ATTIC AREA IS 3000 SF CONTRACTOR TO COORDINATE LOCATION OF DRAFT STOPPING WITH ARCHITECT AND TRUSS SHOP DRAWINGS PRIOR TO START OF CONSTRUCTION. PROVIDE AN ATTIC ACCESS PANEL INTO EACH ATTIC COMPARTMENT. MINIMUM OPENING SIZE OF 20" x 30" COORDINATE LOCATION WITH ARCHITECT. DRAFT STOPPING TO EXTEND TO FASCIA AT OVERHANGS.

2. SECURE TRUSSES AT EACH BEARING WITH SIMPSON H2.5A MIN.

3. CONTRACTOR TO SUBMIT TRUSS SHOP DRAWINGS TO ARCHITECT FOR REVIEW PRIOR TO CONSTRUCTION.

GENERAL

1. STRUCTURAL DRAWINGS ARE INTENDED TO BE USED WITH ARCHITECTURAL AND MECHANICAL DRAWINGS. CONTRACTOR IS RESPONSIBLE FOR COORDINATING SUCH REQUIREMENTS INTO THE SHOP DRAWINGS AND WORK.

2. NO OPENING SHALL BE MADE IN ANY STRUCTURAL BEAM, COLUMN, SUPPORT FLOOR, LOAD BEARING WALL, FOOTING, OR FOUNDATION WALL WITHOUT THE WRITTEN APPROVAL OF THE ARCHITECT/ ENGINEER. OPENINGS IN NON-LOAD BEARING WALLS REQUIRE THE ARCHITECT'S APPROVAL.

3. THE CONTRACTOR IS RESPONSIBLE FOR LIMITING THE AMOUNT OF CONSTRUCTION LOAD IMPOSED UPON NEW STRUCTURAL FRAMING. CONSTRUCTION LOADS SHALL NOT EXCEED THE DESIGN CAPACITY OF THE FRAMING AT THE TIME THE LOADS ARE IMPOSED.

4. THE STRUCTURE IS DESIGNED TO FUNCTION AS A UNIT UPON COMPLETION. THE CONTRACTOR IS RESPONSIBLE FOR FURNISHING ALL TEMPORARY BRACING AND/OR SUPPORT THAT MAY BE REQUIRED AS THE RESULT OF THE CONTRACTOR'S CONSTRUCTION METHODS AND/OR SEQUENCES. THE STRUCTURAL ENGINEER ASSUMES NO LIABILITY FOR THE STRUCTURE DURING CONSTRUCTION.

5. FIREPROOFING METHODS AND MATERIALS FOR STRUCTURAL DRAWINGS. REFER TO ARCHITECTURAL DRAWINGS AND SPECIFICATIONS FOR RATING REQUIREMENTS, FIREPROOFING METHODS AND MATERIALS.

6. ALL SECTIONS, DETAIL AND NOTES SHOWN ON THE STRUCTURAL DRAWINGS ARE INTENDED TO BE TYPICAL AND SHALL APPLY TO SIMILAR SITUATIONS ELSEWHERE UNLESS OTHERWISE NOTED.

7. WHEN CONFLICTS ARE NOTED ON THE DRAWINGS, THE CONTRACTOR IS RESPONSIBLE FOR NOTIFYING THE A/E FOR RESOLUTION PRIOR TO FABRICATION OR INSTALLATION.

FOUNDATION NOTES

1. GEOTECHNICAL INFORMATION TAKEN FROM: GEOTECHNICAL EXPLORATION REPORT C23051-6.

2. THE OWNER SHALL RETAIN A SOILS ENGINEERING FIRM TO MONITOR PROPER SUBGRADE PREPARATIONS AND TO OVERSEE THE TESTING AND COMPACTION OF COMPACTED FILL MATERIAL.

3. CONTRACTOR SHALL LOCATE EXISTING UNDERGROUND UTILITIES BEFORE FOUNDATION EXCAVATION IF UNDERGROUND UTILITY CONFLICTS ARE DISCOVERED BEFORE OR ENCOUNTERED DURING EXCAVATION, NOTIFY THE ARCHITECT/ENGINEER IMMEDIATELY.

4. CONTRACTOR SHALL VERIFY THE LOCATION AND ELEVATION OF ANY EXISTING FOUNDATIONS.

5. BEFORE PLACING FOOTINGS, FOUNDATIONS, GRADE BEAMS, OR SLAB-ON-GRADE, THE SUB-GRADE SHALL BE PREPARED AND INSPECTED AS REQUIRED BY THE SPECIFICATIONS AND THE DRAWINGS.

6. REINFORCE ALL FOUNDATION WALLS AND FOOTINGS AS SHOWN ON THE ARCHITECTURAL AND STRUCTURAL DRAWINGS.

7. CONTROL JOINTS IN THE CAST-IN-PLACE CONCRETE FOUNDATION WALLS SHALL BE PLACED AT NOT TO EXCEED 20' OC OR AS LOCATED ON THE DRAWINGS.

8. PERIMETER FOUNDATION WALL INSULATION IS NOT SHOWN ON THE FOUNDATION DETAILS. SEE ARCHITECTURAL DRAWINGS AND THE SPECIFICATIONS FOR INSULATION REQUIREMENTS.

9. SEE SPECIFICATIONS FOR FREE DRAINING BACKFILL BENEATH ALL CONCRETE WALKS AND SLABS ADJACENT TO STRUCTURE.

10. CONTRACTOR NOTE: THE BASE OF ALL EXCAVATIONS SHALL BE KEPT FREE OF WATER AND LOOSE SOIL PRIOR TO PLACING CONCRETE. CARE SHOULD BE TAKEN DURING EXCAVATION AND CONSTRUCTION TO MINIMIZE DISTURBANCE OF THE BEARING SOILS. THE CONCRETE SHOULD BE PLACED AS SOON AS POSSIBLE AFTER EXCAVATION TO PREVENT EXCESSIVE DRYING OR WETTING OF THE SOIL.

MASONRY NOTES

1. ALL MASONRY WALLS ARE TO HAVE HORIZONTAL REINFORCEMENT WHICH DOES NOT EXCEED 16 INCHES ON CENTER VERTICALLY. SEE SPECIFICATIONS FOR INFORMATION RELATING TO CONCRETE BLOCK, BRICK, AND WALL REINFORCING.

2. ALL VERTICAL REINFORCING STEEL IN MASONRY WALLS ARE TO COMPLY WITH ASTM A615, GRADE 60. LAPS SHALL BE 48 BAR DIAMETERS (12" MINIMUM).

3. PROVIDE SPLICE BARS FOR ALL BOND BEAM REINFORCING AT ALL CORNERS. SPLICE BAR TO BE THE SAME SIZE AS BARS IN THE BOND BEAM. LAPS SHALL BE 50 BAR DIAMETER.

4. WHERE MASONRY IS APPLIED ADJACENT TO STEEL MEMBERS (BEAMS AND COLUMNS) PROVIDE ANCHORING DEVICES PER SPECIFICATIONS.

5. REFER TO ARCHITECTURAL PLANS FOR ROUGH OPENING LOCATIONS, SIZES, AND ELEVATIONS.

6. USE SIMPSON TITEN HD OR APPROVED EQUAL TYPE ANCHORS IN CMU WALL PARTITIONS.

7. ALL NON-STRUCTURAL CMU WALLS SHALL BE REINFORCED WITH A #3 VERTICAL BAR AT 48" OC WITH THAT CMU CORE GROUTED AND HORIZONTAL JOINT REINFORCEMENT AT 16" OC THE BOTTOM TWO COURSES SHALL BE GROUTED SOLID. PROVIDE CONTINUOUS BOND BEAM AT TOP OF WALL WITH 2 #4's CONTINUOUS GROUT BOND BEAM SOLID. PROVIDE #3 DOWEL AT 48" OC MATCH VERTICAL BAR, LAP 50 BAR DIAMETERS. PROVIDE LINTEL BLOCK AS BOND BEAM WITH (2) #5 x CONT, AND 8" BEARING EACH END. TYPICAL UNLESS NOTED OTHERWISE.

8. CONSTRUCTION BRACING FOR MASONRY WALLS SHALL BE DESIGNED BY A PROFESSIONAL ENGINEER LICENSED IN THE STATE IN WHICH THE PROJECT IS LOCATED. MASONRY SUBMITTALS SHALL CONTAIN A LETTER SEALED BY THE ENGINEER AND SHALL BE ISSUED TO THE OWNER AFTER SUBMITTAL REVIEW AND PRIOR TO STARTING MASONRY CONSTRUCTION.

COLD FORMED TRUSS NOTES

1. TRUSS FABRICATOR SHALL DESIGN TRUSSES FOR LOADS SPECIFIED ON PLANS IN CONFORMANCE WITH "QUALITY CONTROL MANUAL" BY TPI. REFER TO THE ARCHITECTURAL DRAWINGS FOR ADDITIONAL DEAD LOADS RESULTING FROM DORMERS AND OTHER MISCELLANEOUS FRAMING. ALL TRUSSES SHALL BE DESIGNED FOR A MINIMUM OF 30 PSF LIVE LOAD PLUS 10 psf DEAD LOAD.

2. LIVE LOAD IS ON A HORIZONTAL PROJECTION OTHER LIVE LOADS SHOWN ON THE DRAWINGS ARE IN ADDITION TO THESE DESIGNATED LOADS.

3. CHECK VERTICALLY PROJECTED ELEMENTS FOR DESIGN WIND LOAD.

4. DESIGN TRUSSES TO RESIST A NET UPLIFT OF 10 PSF.

5. SUBMIT SHOP DRAWINGS AND CALCULATIONS PRIOR TO FABRICATION.

6. CONFORM TO TPI SPECIFICATIONS.

7. FLOOR TRUSS LL DEFLECTION SHALL NOT EXCEED L/480.

8. ROOF TRUSS LL DEFLECTION SHALL NOT EXCEED L/360.

9. PERMANENT BRACING NOT SHOWN ON PLANS, WHICH IS REQUIRED FOR STRENGTH AND STABILITY OF TRUSS MEMBERS, SHALL BE DESIGNED AND PROVIDED BY TRUSS SUPPLIER.

10. ALL TRUSS TOP CHORDS SHALL BE CONTINUOUSLY BRACED BY THE (ROOF/FLOOR) DECKING. ALL ROOF TRUSS WEB MEMBERS SHALL BE BRACED AT 4'-0" OC UNLESS CALCULATIONS SHOW OTHERWISE.

11. TEMPORARY BRACING SHALL BE THE CONTRACTOR'S RESPONSIBILITY. PROVIDE IN ACCORDANCE WITH TPI GUIDELILNES.

12. PROVIDE 24" WIDE VIERENDEEL PANEL AT CENTER OF EACH PARALLEL CHORD TRUSS.

STRUCTURAL STEEL NOTES

1. FABRICATION AND ERECTION OF STRUCTURAL STEEL SHALL CONFORM WITH THE AISC (AMERICAN INSTITUTE OF STEEL CONSTRUCTION), "MANUAL OF STEEL CONSTRUCTION", LATEST EDITION.

2. ALL STEEL DETAILS AND CONNECTIONS SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE AISC "SPECIFICATIONS FOR STRUCTURAL STEEL BUILDINGS, ALLOWABLE STRESS DESIGN AND PLASTIC DESIGN", LATEST EDITION.

3. ALL WELDING SHALL BE BY WELDERS HOLDING CURRENT VALID AWS CERTIFICATES IN THE TYPE OF WELD REQUIRED.

4. SHOP CONNECTIONS NOT SPECIFICALLY DETAILED ON THE DRAWINGS SHALL BE BOLTED OR WELDED. FIELD CONNECTIONS SHALL BE BOLTED UNLESS SPECIFICALLY DETAILED OTHERWISE.

5. DESIGN IN ACCORDANCE WITH GUIDE DETAILS AND REACTIONS.

6. USE A325N BOLTS UNLESS NOTED OTHERWISE.

7. OVERSIZED OR SLOTTED HOLES SHALL NOT BE USED FOR ANY CONNECTIONS UNLESS SPECIFICALLY INDICATED ON THE DRAWINGS OR APPROVED IN WRITING BY THE ENGINEER.

8. ALL BEAM COPES MUST BE MADE TO A RADIUS (1" MINIMUM). ALL BUTT AND FULL PENETRATION WELDS SHALL BE MADE USING RUN OFF TABS WHICH SHALL BE TRIMMED FLUSH AND GROUND SMOOTH AFTER WELD IS COMPLETED.

9. ALL WELDS INDICATED SHALL MEET THE MINIMUM WELD SIZE SPECIFIED BY THE CURRENT AISC MANUAL OF STEEL DESIGN. (SINGLE PASS AS REQUIRED).

10. CUTS, HOLES, COPING, ETC. REQUIRED FOR WORK OF OTHER TRADES SHALL BE SHOWN ON THE SHOP DRAWINGS AND MADE IN THE SHOP. CUTS OR BURNING OF HOLES IN STRUCTURAL STEEL MEMBERS IN THE FIELD WILL NOT BE PERMITTED.

11. PROVIDE ANY NECESSARY TEMPORARY BRACING OR GUYS TO PROVIDE LATERAL SUPPORT OF THE BUILDING UNTIL PERMANENT FRAME IS COMPLETELY INSTALLED.

12. INSTALL EXPANSION BOLTS IN ACCORDANCE WITH THE ICBO REPORT RECOMMENDATIONS.

13. ALL ELEVATOR GUIDE BEAMS SHALL BE S8x18.4 UNLESS NOTED OTHERWISE. SLOPE TO MATCH BEAM SLOPE.

14. STRUCTURAL STEEL FRAMING SHALL BE TRUE AND PLUMB BEFORE CONNECTIONS ARE FINALLY BOLTED OR WELDED.

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.otie.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300,
Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

NO.	DESCRIPTION	DATE

DRAWN BY AWB

CHECKED BY Checker

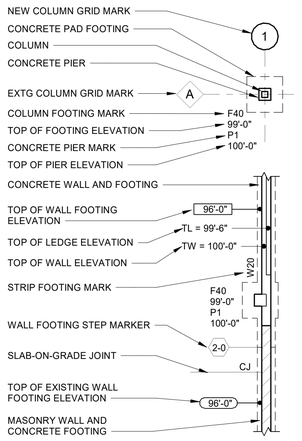
STRUCTURAL NOTES

S001

ABBREVIATION LIST

AB	ANCHOR BOLT (ROD)
AHU	AIR HANDLING UNIT
ALT	ALTERNATE
ARCH	ARCHITECTURAL
BLDG	BUILDING
BRG	BEARING
BP(##)	BASE PLATE CALL-OUT
CF	COLD-FORMED
CIP	CAST-IN-PLACE
CJ	CONTROL JOINT
CL	CENTER LINE
CLR	CLEAR (DISTANCE)
CMU	CONCRETE MASONRY UNIT
COL	COLUMN
CONC	CONCRETE
CONT	CONTINUOUS
DBA	DEFORMED BAR ANCHOR
DEMO	DEMOLITION / DEMOLISH
DIA	DIAMETER
DWG	DRAWING
EOD	EDGE OF DECK
EOS	EDGE OF SLAB
EF	EACH FACE
EJ	EXPANSION JOINT
ELEV	ELEVATION
EQ	EQUAL
EW	EACH WAY
EWEF	EACH WAY EACH FACE
EXP	EXPANSION
EXT	EXTERIOR
EXTG	EXISTING
FD	FLOOR DRAIN
FLR	FLOOR
FV	FIELD VERIFY
F(##)	FOOTING CALL-OUT
GA	GAUGE
GALV	GALVANIZED
GC	GENERAL CONTRACTOR
GLULAM	GLUE-LAMINATED BEAM(S)
HK	HOOK
HORIZ	HORIZONTAL
HP	HIGH POINT
HWS	HEADED WELDED STUD(S)
IF	INSIDE FACE
INT	INTERIOR
JBE	JOIST BEARING ELEVATION
LLH	LONG LEG HORIZONTAL
LLV	LONG LEG VERTICAL
LSL	LAMINATED STRAND LUMBER
LTWT	LIGHTWEIGHT
LVL	LAMINATED VENEER LUMBER
LW	LONG WAY
MAX	MAXIMUM
MECH	MECHANICAL
MFR	MANUFACTURER
MIN	MINIMUM
MISC	MISCELLANEOUS
NA	NOT APPLICABLE
NTS	NOT TO SCALE
OC	ON CENTER
OF	OUTSIDE FACE
OPNG	OPENING
OPP	OPPOSITE
PC	PRECAST / PRESTRESSED
PCI	POUNDS PER CUBIC INCH
PDF	POUNDS PER CUBIC FOOT
PL	PLATE
PLF	POUNDS PER LINEAR FOOT
PROJ	PROJECTION
PSF	POUNDS PER CUBIC FOOT
PSI	POUNDS PER SQUARE INCH
PT	PRE (POST) -TENSIONED
P(#)	PIER CALL-OUT
RD	ROOF DRAIN
REINF	REINFORC(ED)(ING)
RTU	ROOF TOP UNIT
SIM	SIMILAR
SOG	SLAB-ON-GRADE
SPA	SPAC(ES)(ED)(ING)
SPEC	SPECIFICATION(S)
SQ	SQUARE
SS	STAINLESS STEEL
SW	SHORT WAY
TL	TOP OF LEDGE
TP	TOP OF PIER
TW	TOP OF WALL
TYP	TYPICAL
UNO	UNLESS NOTED OTHERWISE
VERT	VERTICAL
WP	WORKING POINT
WWF	WELDED WIRE FABRIC

FOUNDATION LEGEND

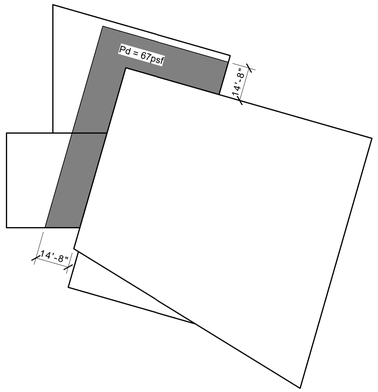


LINTEL SCHEDULE

LENGTH	SIZE AND REINFORCING	NOTE/ REMARKS
0'-4"	8" W x 8" H BOND BM W/ (2) #5 BOT	SEE ARCH FOR LOCATIONS
4'-8"	8" W x 16" H BOND BM W/ (2) #5 BOT	SEE ARCH FOR LOCATIONS

NOTES:

1. AT NEW WALLS, REINFORCE AT BEARING WITH (1) #5 VERT FULL HEIGHT OF WALL FROM FLOOR TO FLOOR OR FLOOR TO ROOF.
2. AT EXISTING WALLS, BEAR LINTEL ON MIN (2) COURSES GROUTED CMU.
3. AT EXTERIOR OPENINGS, PROVIDE GALV BENT PL5/16"x7 1/2"x7 1/2" x CONT TO OPENING CORNERS.
4. 8" MIN BEARING AT ENDS.



DRIFT LOAD KEY PLAN

SCALE: 12" = 1'-0"

WALL FOOTING SCHEDULE

MARK	CONTINUOUS FOOTING DIMENSIONS		FOOTING REINFORCEMENT	REMARKS
	WIDTH	THICKNESS		
W24	2' - 4"	1' - 0"	(3) #5; B, CONT	
W28	2' - 8"	1' - 0"	(3) #6; B, CONT	
W30	3' - 0"	1' - 0"	(3) #6; B, CONT	
W90	9' - 0"	1' - 8"	(7) @ 12" T&B, EW	

MASONRY WALL REINFORCEMENT SCHEDULE

MARK	WALL TYPE	REINFORCEMENT		NOTES
		VERTICAL	HORIZONTAL	
A	12" CMU	#6 AT 16" OC	HJR AT 16" OC	BOND BEAM WITH (1) #5 AT 40" OC AND AT BOTTOM OF WALL
B	12" CMU	#8 AT 8" OC	HJR AT 16" OC	VERTICAL REINFORCING TO BE AT EXTERIOR FACE OF CMU
C	8" CMU	#6 AT 16" OC	HJR AT 16" OC	BOND BEAM WITH (1) #5 AT 40" OC AND AT BOTTOM OF WALL

NOTES:

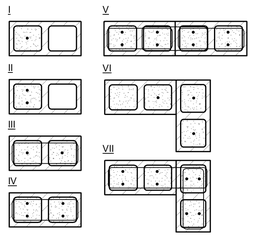
1. SEE ARCHITECTURAL WALL TYPES FOR ADDITIONAL REQUIREMENTS.
2. REINFORCEMENT IS TO BE LOCATED IN CENTER OF WALL UNO.
3. PROVIDE CONTINUOUS BOND BEAM WITH (2) #5 AT ALL BEARING ELEVATIONS AND OVER WINDOWS DOORS AND OTHER OPENINGS UNO.
4. PROVIDE HORIZONTAL REINFORCEMENT INTO INTERSECTING WALLS AT 16" OC VERTICAL. EXTENT 30" EACH DIRECTION WITH PREFABRICATED "T" AND "L" SECTION TYP.
5. SEE GENERAL MASONRY NOTES ON SHEET S001 FOR NON LOAD BEARING WALL REINFORCEMENT REQUIREMENTS.
6. PROVIDE DOWELS TO MATCH VERTICAL REINFORCEMENT. EMBED DOWELS 30" INTO FOUNDATION WALL AND LAP 30" WITH OR MAKE CONTINUOUS WITH VERTICAL STEEL.

MASONRY PIER SCHEDULE

MARK	SIZE (LENGTH)	TYPE	VERTICAL REINFORCING	CLOSED LOOP TIE	COMMENTS
MP1	16"	III	(6) #6	(2) SETS OF 1/4" AT 8"	
MP2	24"	IV	(8) #6	(2) SETS OF 1/4" AT 8"	

NOTES

1. ALL REINFORCED CMU CORES ARE GROUTED SOLID.
2. RUN HORIZONTAL JOINT REINFORCING CONT. THROUGH MASONRY PIERS.
3. USE 1/4" (2) RODS AS CLOSED LOOP TIES.
4. USE BOND BEAM CMU BLOCKS OR DROP TOP CMU BLOCK AT MASONRY PIERS WITH TIES.
5. SIZE IS WALL WIDTH x LENGTH.



LOOSE STEEL LINTEL SCHEDULE

PROVIDE WHERE OTHER LINTELS ARE NOT SPECIFICALLY DETAILED

WALL THICK	CLEAR MASONRY OPENING WIDTH	SECTION
ALL	AT FIRE EXTINGUISHER CABINETS AND DRINKING FOUNTAINS	1/4" PLATE
4"	TO 5'-0"	ST3x6.25
4"	TO 7'-0"	PL 3/8 x 4 1/2 ON PL 3/8 x 3 1/2
4"	TO 9'-0"	PL3/8"x7 1/2" ON PL3/8"x3 1/2"
6"	TO 5'-0"	(2) L3 1/2x2 1/2x1/4 (LLV)
6"	TO 7'-0"	WT4x10.5
6"	TO 9'-0"	WT7x11
6"	TO 12'-0"	WT7x13 WITH PL1/2"x2"
8"	TO 5'-0"	(2) L3 1/2x3 1/2x1/4
8"	TO 7'-0"	(2) L4x3 1/2x5/16 (LLV)
8"	TO 9'-0"	WT7x15
10"	TO 7'-0"	W8x10 WITH PL5/16"x9"
10"	TO 10'-0"	W8x15 WITH PL5/16"x9"
12"	TO 5'-0"	(3) L3 1/2x3 1/2x1/4
12"	TO 7'-0"	W8x10 WITH PL5/16"x11"
12"	TO 10'-0"	W8x15 WITH PL5/16"x11"

3/16 1 1/2-8

NOTES:

1. PROVIDE MINIMUM 8" BEARING AT EACH END OF LINTEL.
2. GROUT BLOCK CORES AND REINFORCE WITH (1) #5 VERT BELOW LINTEL BEARING.
3. CENTER LINTELS IN WALL UNLESS OTHERWISE NOTED.
4. BOTTOM PLATES UNDER WIDE FLANGE SHAPES SHALL BE EXTENDED FULL LENGTH OF LINTEL.
5. WELD LINTEL COMPONENTS INTO SINGLE UNIT.
6. NOT LINTELS ARE REQUIRED FOR 4" AND 6" NON-BEARING MASONRY WALLS WHERE GROUTED HOLLOW METAL FRAMES HAVE A HEADSPAN OF 4'-0" OR LESS.

BRICK LOOSE LINTEL SCHEDULE

MARK	SECTION	NOTE/ REMARKS
W ≤ 4'-0"	L4x4x5/16	.
6'-6" < L < 9'-0"	L6x4x3/8	.
9'-0" < L < 12'-0"	L7x4x1/2	.
12'-0" < L < 15'-0"	L8x4x3/4	.

NOTES:

1. LINTELS TO BE SHOP PAINTED WITH ZINC RICK URETHANE. SEE SPECIFICATIONS.
2. PROVIDE 4" MIN BEARING EACH END OF LINTEL UNDER 9'-0". 8" BEARING FOR LONGER LINTELS.
3. SEE ARCH FOR CONTROL JOINT LOCATIONS AND FLASHING REQUIREMENTS.

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.otie.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300,
Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

NO.	DESCRIPTION	DATE

DRAWN BY AWB

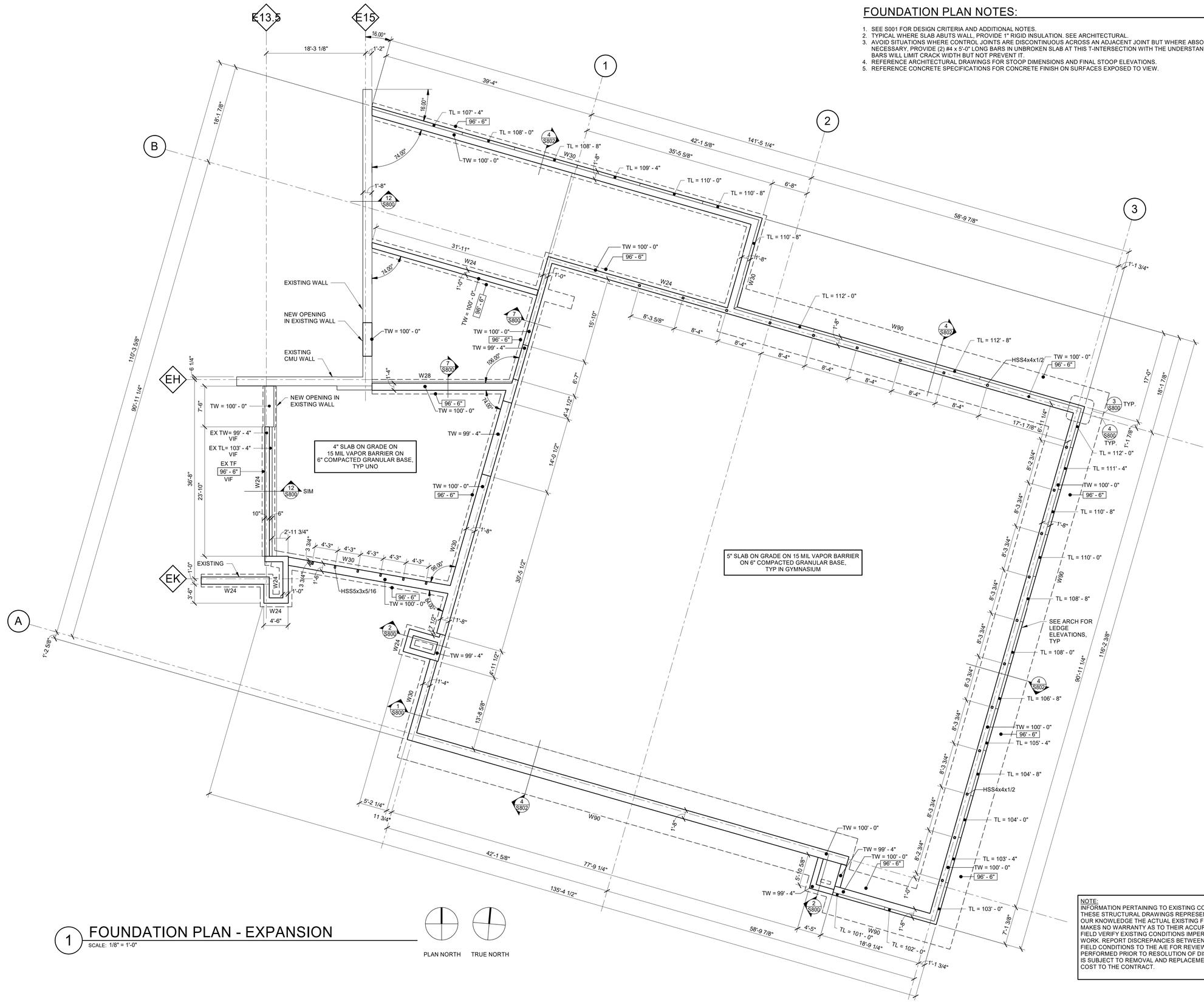
CHECKED BY Checker

STRUCTURAL SCHEDULES

S002

FOUNDATION PLAN NOTES:

1. SEE S001 FOR DESIGN CRITERIA AND ADDITIONAL NOTES.
2. TYPICAL WHERE SLAB ABUTS WALL, PROVIDE 1" RIGID INSULATION. SEE ARCHITECTURAL.
3. AVOID SITUATIONS WHERE CONTROL JOINTS ARE DISCONTINUOUS ACROSS AN ADJACENT JOINT BUT WHERE ABSOLUTELY NECESSARY, PROVIDE (2) #4 x 5'-0" LONG BARS IN UNBROKEN SLAB AT THIS T-INTERSECTION WITH THE UNDERSTANDING THAT BARS WILL LIMIT CRACK WIDTH BUT NOT PREVENT IT.
4. REFERENCE ARCHITECTURAL DRAWINGS FOR STOOP DIMENSIONS AND FINAL STOOP ELEVATIONS.
5. REFERENCE CONCRETE SPECIFICATIONS FOR CONCRETE FINISH ON SURFACES EXPOSED TO VIEW.



1 FOUNDATION PLAN - EXPANSION
SCALE: 1/8" = 1'-0"

PLAN NORTH TRUE NORTH

NOTE:
INFORMATION PERTAINING TO EXISTING CONDITIONS GIVEN ON THESE STRUCTURAL DRAWINGS REPRESENTS TO THE BEST OF OUR KNOWLEDGE THE ACTUAL EXISTING FIELD CONDITIONS. OTIE MAKES NO WARRANTY AS TO THEIR ACCURACY. CONTRACTOR TO FIELD VERIFY EXISTING CONDITIONS IMPERATIVE TO THE NEW WORK. REPORT DISCREPANCIES BETWEEN THE DRAWINGS AND FIELD CONDITIONS TO THE A/E FOR REVIEW. ANY WORK PERFORMED PRIOR TO RESOLUTION OF DISCREPANCIES BY THE A/E IS SUBJECT TO REMOVAL AND REPLACEMENT AT NO ADDITIONAL COST TO THE CONTRACT.

Engberg Anderson ARCHITECTS
MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises
www.otie.com Job Number 2023037
Office 608.243.6470 Fax 608.241.3914
5100 Eastpark Blvd, Suite 300,
Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

NO.	DESCRIPTION	DATE

DRAWN BY AWB

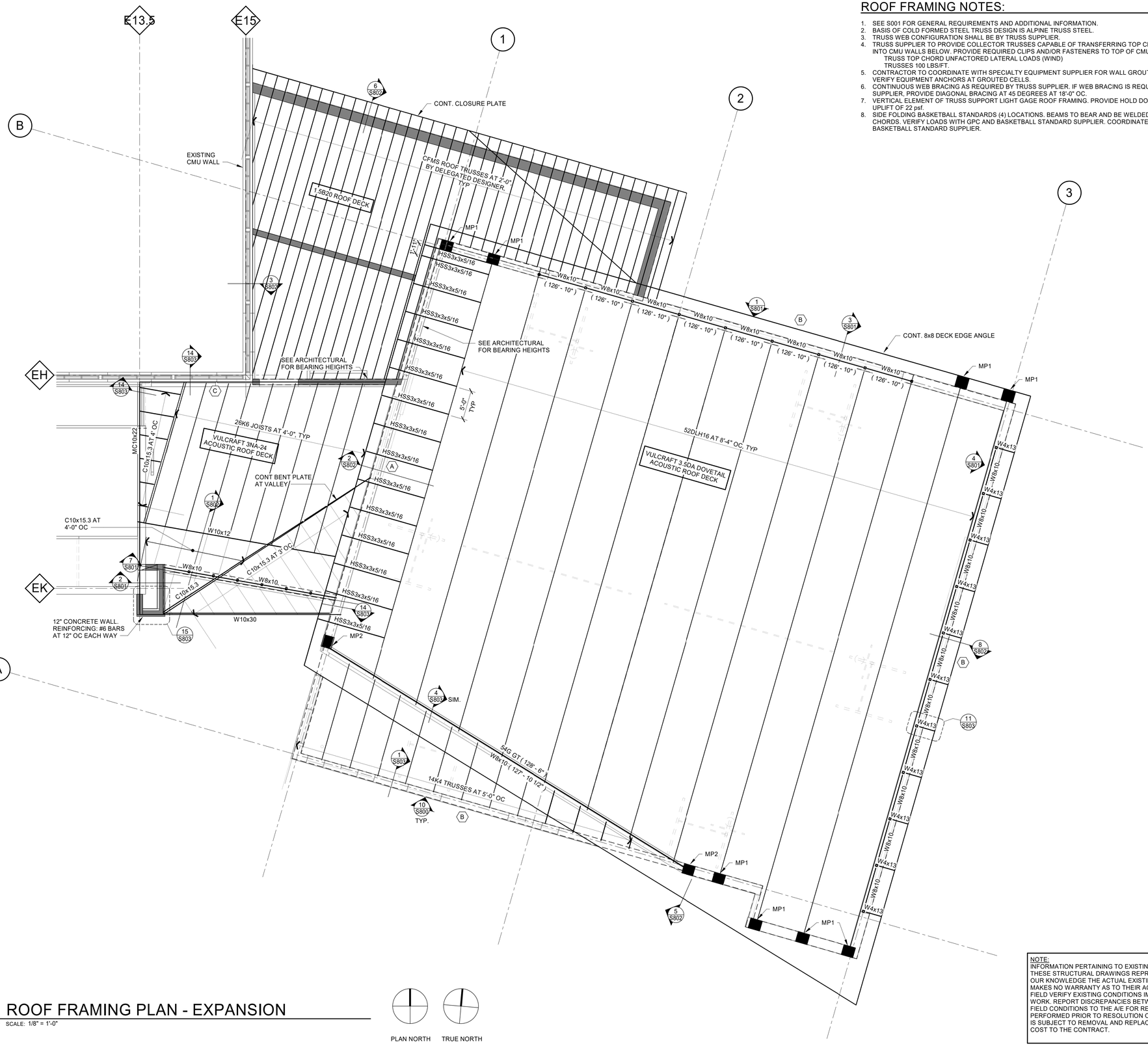
CHECKED BY Checker

FOUNDATION PLAN - EXPANSION

S200

ROOF FRAMING NOTES:

1. SEE S001 FOR GENERAL REQUIREMENTS AND ADDITIONAL INFORMATION.
2. BASIS OF COLD FORMED STEEL TRUSS DESIGN IS ALPINE TRUSS STEEL.
3. TRUSS WEB CONFIGURATION SHALL BE BY TRUSS SUPPLIER.
4. TRUSS SUPPLIER TO PROVIDE COLLECTOR TRUSSES CAPABLE OF TRANSFERRING TOP CHORD LATERAL LOADS INTO CMU WALLS BELOW. PROVIDE REQUIRED CLIPS AND/OR FASTENERS TO TOP OF CMU WALL/LEDGER
   TRUSS TOP CHORD UNFACTORED LATERAL LOADS (WIND)
   TRUSSES 100 LBS/FT.
5. CONTRACTOR TO COORDINATE WITH SPECIALTY EQUIPMENT SUPPLIER FOR WALL GROUTING REQUIRMENTS. VERIFY EQUIPMENT ANCHORS AT GROUTED CELLS.
6. CONTINUOUS WEB BRACING AS REQUIRED BY TRUSS SUPPLIER. IF WEB BRACING IS REQUIRED BY THE TRUSS SUPPLIER, PROVIDE DIAGONAL BRACING AT 45 DEGREES AT 18'-0" OC.
7. VERTICAL ELEMENT OF TRUSS SUPPORT LIGHT GAGE ROOF FRAMING. PROVIDE HOLD DOWN/STRAP TO RESIST UPLIFT OF 22 psf.
8. SIDE FOLDING BASKETBALL STANDARDS (4) LOCATIONS. BEAMS TO BEAR AND BE WELDED TO JOISTS BOTTOM CHORDS. VERIFY LOADS WITH GPC AND BASKETBALL STANDARD SUPPLIER. COORDINATE LOCATIONS WITH BASKETBALL STANDARD SUPPLIER.



1 ROOF FRAMING PLAN - EXPANSION
SCALE: 1/8" = 1'-0"

PLAN NORTH TRUE NORTH

NOTE:
INFORMATION PERTAINING TO EXISTING CONDITIONS GIVEN ON THESE STRUCTURAL DRAWINGS REPRESENTS TO THE BEST OF OUR KNOWLEDGE THE ACTUAL EXISTING FIELD CONDITIONS. OTIE MAKES NO WARRANTY AS TO THEIR ACCURACY. CONTRACTOR TO FIELD VERIFY EXISTING CONDITIONS IMPERATIVE TO THE NEW WORK. REPORT DISCREPANCIES BETWEEN THE DRAWINGS AND FIELD CONDITIONS TO THE A/E FOR REVIEW. ANY WORK PERFORMED PRIOR TO RESOLUTION OF DISCREPANCIES BY THE A/E IS SUBJECT TO REMOVAL AND REPLACEMENT AT NO ADDITIONAL COST TO THE CONTRACT.

Engberg Anderson ARCHITECTS
MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises
www.otie.com Job Number 2023037
Office 608.243.6470 Fax 608.241.3914
5100 Eastpark Blvd, Suite 300,
Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

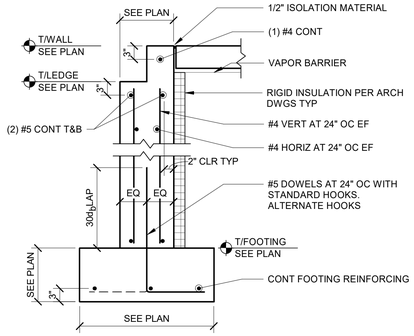
NO.	DESCRIPTION	DATE

DRAWN BY AWB

CHECKED BY Checker

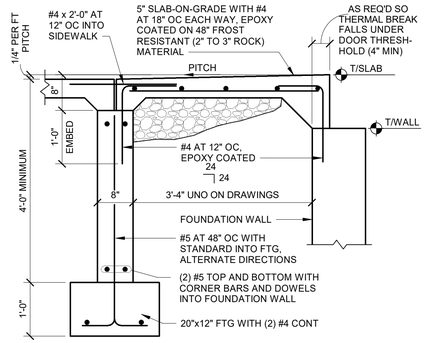
ROOF FRAMING PLAN - EXPANSION

S201



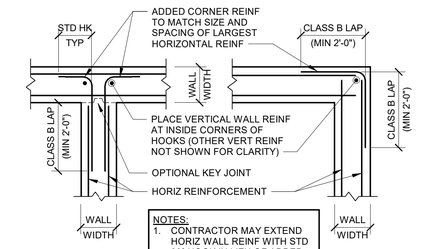
1 CONCRETE FROST WALL

SCALE: 3/4" = 1'-0"



2 TYPICAL STOOP

SCALE: 3/4" = 1'-0"

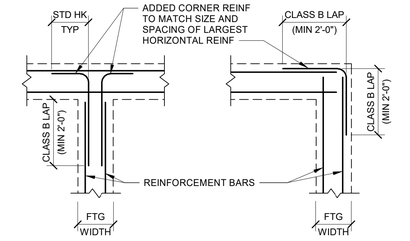


WALL INTERSECTION

WALL CORNER

3 TYPICAL WALL CORNER REINFORCEMENT

SCALE: 3/4" = 1'-0"

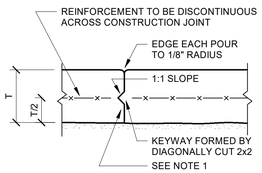


FTG INTERSECTION

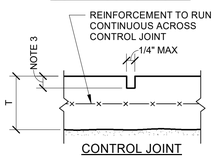
FTG CORNER

4 TYPICAL FOOTING CORNER REINFORCEMENT

SCALE: 3/4" = 1'-0"



CONSTRUCTION JOINT



CONTROL JOINT

GENERAL NOTES

1. SLAB-ON-GRADE CONSTRUCTION SHOULD CONFORM WITH THE RECOMMENDATIONS AND REQUIREMENTS SET FORTH IN THE LATEST RELEASE OF ACI 302 GUIDE FOR CONCRETE FLOOR AND SLAB CONSTRUCTION.
2. SEE PLANS FOR THE SLAB THICKNESS (T) AND REINFORCEMENT.
3. THE SLAB REINFORCEMENT, IF OTHER THAN WWF, SHALL BE CHAIRED BY SOIL SUPPORTED SLAB BOLSTERS.
4. REFER TO THE GENERAL NOTES, THE SPECIFICATIONS, AND THE DRAWINGS FOR SUB-FLOOR DRAINAGE SYSTEM, SUBGRADE PREPARATION, AND/OR MUD SLAB AND VAPOR RETARDER REQUIREMENTS.
5. THE SUBGRADE SHALL BE FREE OF STANDING WATER AT THE TIME OF CONCRETE PLACEMENT.

CONSTRUCTION JOINT NOTES

1. BREAK THE BOND BETWEEN NEW AND PREVIOUSLY PLACED SLABS BY SPRAYING OR BY PAINTING THE EXPOSED SIDE OF THE JOINT WITH A CURING COMPOUND, ASPHALTIC EMULSION, OR FORM OIL.

JOINT SPACING NOTES

1. UNLESS SHOWN OTHERWISE ON THE DRAWINGS, PROVIDE CONTROL AND/OR CONSTRUCTION JOINTS AT EVERY COLUMN LINE AND IN BETWEEN THE COLUMNS SUCH THAT THE JOINT SPACING DOES NOT EXCEED 36 * (SLAB THICKNESS) UNLESS SHOWN OTHERWISE. THE RESULTING PANELS SHOULD BE APPROXIMATELY SQUARE.

CONTROL JOINT NOTES

1. FOR SAW CUT CONTROL JOINTS, MAKE THE SAW CUT AS SOON AS THE SLAB IS ABLE TO SUPPORT THE WEIGHT OF WORKERS AND SAWING EQUIPMENT WITHOUT DAMAGE TO THE FINISHED SURFACE OF THE SLAB, BUT WITHIN 24 HOURS.
2. REFER TO SPECIFICATIONS REGARDING EPOXY RESIN OR ELASTOMERIC SEALANT REQUIREMENTS TO FILL CTRL JOINTS.
3. DEPTH OF SAWCUT SHOULD BE 1 1/4" IF PRODUCED USING EARLY ENTRY DRY-CUT PROCESS AND T/4 (1" MINIMUM) IF PRODUCED USING THE CONVENTIONAL WET-CUT PROCESS.

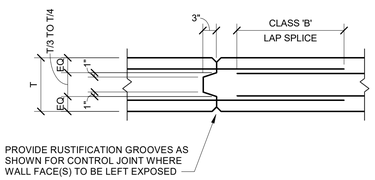
FORMED CONTROL JOINT OPTION NOTES

1. FORM CONTROL JOINTS BY INSERTING A PRE-MOLDED STRIP INTO THE FRESH CONCRETE UNTIL THE TOP SURFACE OF THE STRIP IS FLUSH WITH THE TOP SURFACE OF THE SLAB.
2. TOOL THE SLAB EDGES ROUND ON EACH SIDE OF THE INSERT, 1/8" MAXIMUM RADIUS.
3. AFTER THE CONCRETE HAS CURED, REMOVE THE INSERTS AND CLEAN THE GROOVE OF LOOSE DEBRIS.

5 TYPICAL CONSTRUCTION AND CONTROL JOINTS IN SOG

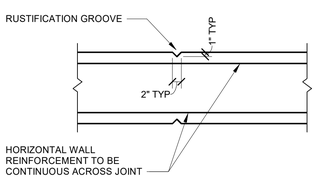
SCALE: 3/4" = 1'-0"

NOTE:
MAXIMUM LENGTH OF WALL POUR BETWEEN CONSTRUCTION JOINTS LIMITED TO 60'-0"



CONSTRUCTION JOINT

NOTE:
CONTROL JOINT DETAIL APPLIES AT 20'-0" OC (MAXIMUM) AT ALL WALL FACES THAT ARE TO BE LEFT EXPOSED TO VIEW

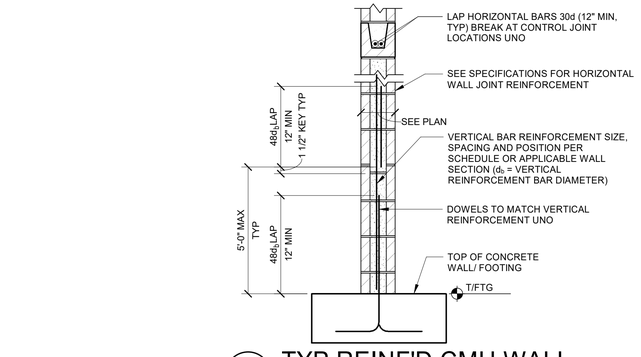


CONTROL JOINT

6 CONCRETE WALL JOINTS

SCALE: 3/4" = 1'-0"

033000-102 (16)

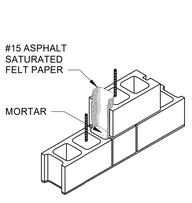


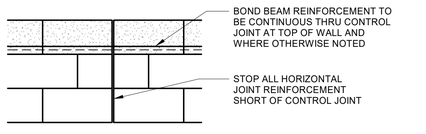
7 TYP REINF'D CMU WALL

SCALE: 3/4" = 1'-0"

CONTROL JOINTS TO BE PLACED:

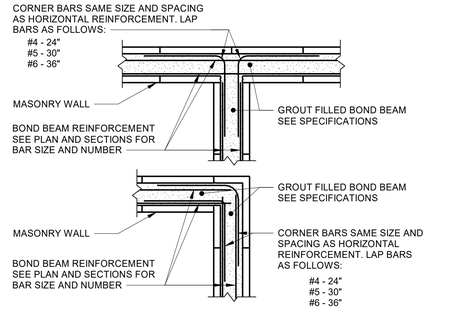
1. MAXIMUM OF X'-XX" OC.
2. MAXIMUM OF X'-XX" FROM WALL INTERSECTIONS AND CORNERS.
3. AT ALL CHANGES IN WALL HEIGHT OR THICKNESS
4. AT CHASES AND RECESSES FOR PIPING COLUMNS FIXTURES ETC.
5. AT EXPANSION JOINTS IN ROOFS FLOOR AND FOUNDATIONS.
6. ADJACENT TO ONE SIDE OF WINDOW OR DOOR OPENINGS < 6'-0" WIDE.
7. ADJACENT TO BOTH SIDE OF WINDOW OR DOOR OPENINGS > 6'-0" WIDE.
8. AS SPECIFICALLY DETAILED ON ARCHITECTURAL DRAWINGS





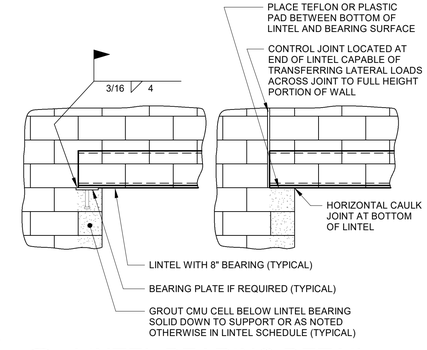
8 CMU CONTROL JOINT

SCALE: 3/4" = 1'-0"



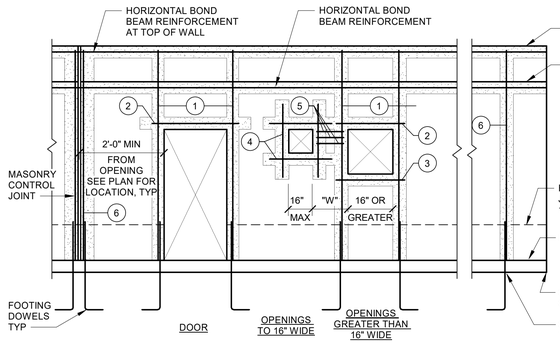
9 MASONRY BOND BEAM CORNER REINFORCEMENT PLAN

SCALE: 3/4" = 1'-0"



10 LINTEL BEARING DETAIL

SCALE: 3/4" = 1'-0"



NOTES:

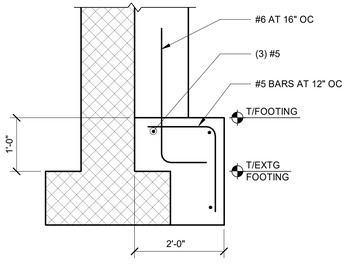
1. JAMB REINFORCEMENT PER LINTEL SCHEDULE OR LINTEL DETAILS
2. REINFORCEMENT PER LINTEL SCHEDULE OR LINTEL DETAILS
3. (1) #6 SILL BAR. EXTEND 2'-0" PAST OPENING
4. (1) #4 EACH SIDE OF OPENING UNO EXTEND 2'-0" PAST OPENING
5. WHEN "W" IS LESS THAN 2'-0" AT 8" CMU WALL AND 3'-0" AT 12" CMU WALLS, ADD 1/4" CLOSED TIE SETS AT 8"OC
6. REINFORCE VERTICAL CELLS AT EDGE OF WALL AND ADJACENT TO CONTROL JOINTS

GENERAL NOTES:

1. GROUT SOLID ALL CELLS W/REINFORCING.
2. USE BOND BEAM BLOCKS WITH OPEN BOTTOMS ONLY AT BOND BEAM LOCATIONS. DO NOT USE THROUGH-TYPE BLOCKS AT BOND BEAMS.
3. DO NOT CONTINUE BOND BEAM REINFORCING THOUGH CONTROL JOINTS.
4. ALL MASONRY SHALL BE LAID IN RUNNING (COMMON) BOND, UNO.
5. REFER TO DETAILS FOR LOCATION OF ADDITIONAL BOND BEAMS.
6. HORIZ. JOINT REINF SHALL BE 8" OC BELOW GRADE AND IN PARAPETS.

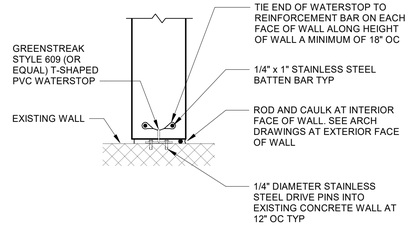
11 TYPICAL CMU WALL REINFORCEMENT AT OPENINGS

SCALE: 3/4" = 1'-0"



12 NEW WALL AND FOOTING ADJACENT TO EXISTING

SCALE: 3/4" = 1'-0"



13 NEW FDN TO EXISTING

SCALE: 3/4" = 1'-0"

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.otie.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300, Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

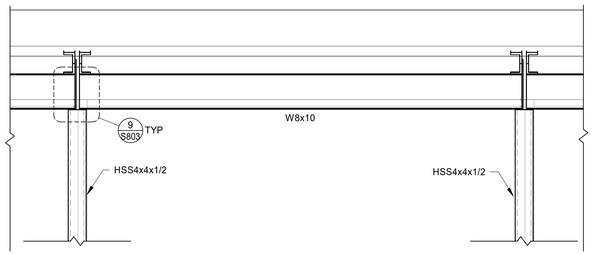
NO. DESCRIPTION DATE

DRAWN BY AWB

CHECKED BY Checker

STRUCTURAL DETAILS

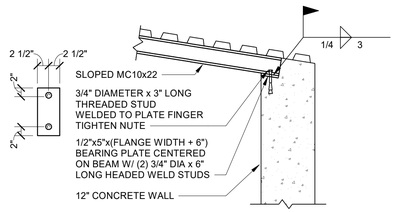
S800



1 HSS COLUMNS FOR RIBBON WINDOW

SCALE: 3/4" = 1'-0"

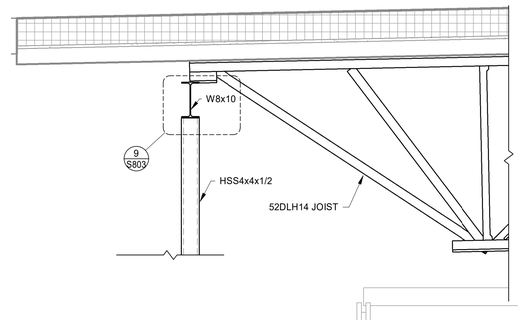
0 6" 1' 1'-6"



2 VESTIBULE ENTRY MC BEARING DETAIL

SCALE: 3/4" = 1'-0"

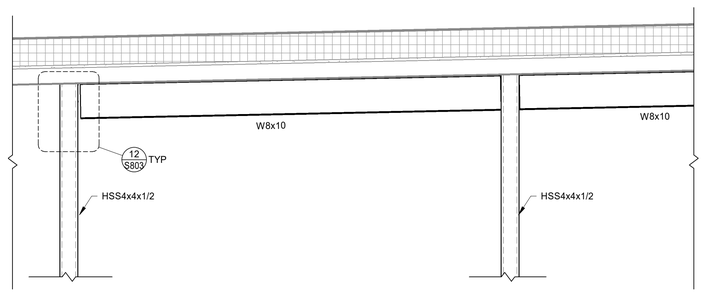
0 6" 1' 2'



3 JOIST ON BEAM AT RIBBON WINDOW

SCALE: 3/4" = 1'-0"

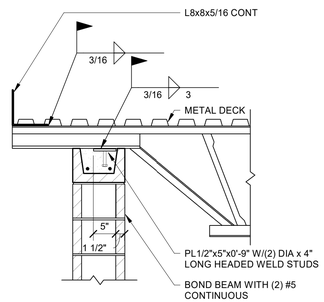
0 6" 1' 1'-6"



4 STEEL BEAM AT RIBBON WINDOW

SCALE: 3/4" = 1'-0"

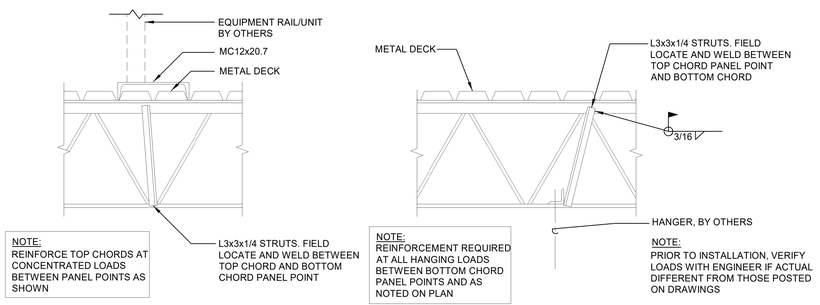
0 6" 1' 1'-6"



5 LH JOIST ON CMU WALL WITH DECK CHORD ANGLE

SCALE: 3/4" = 1'-0"

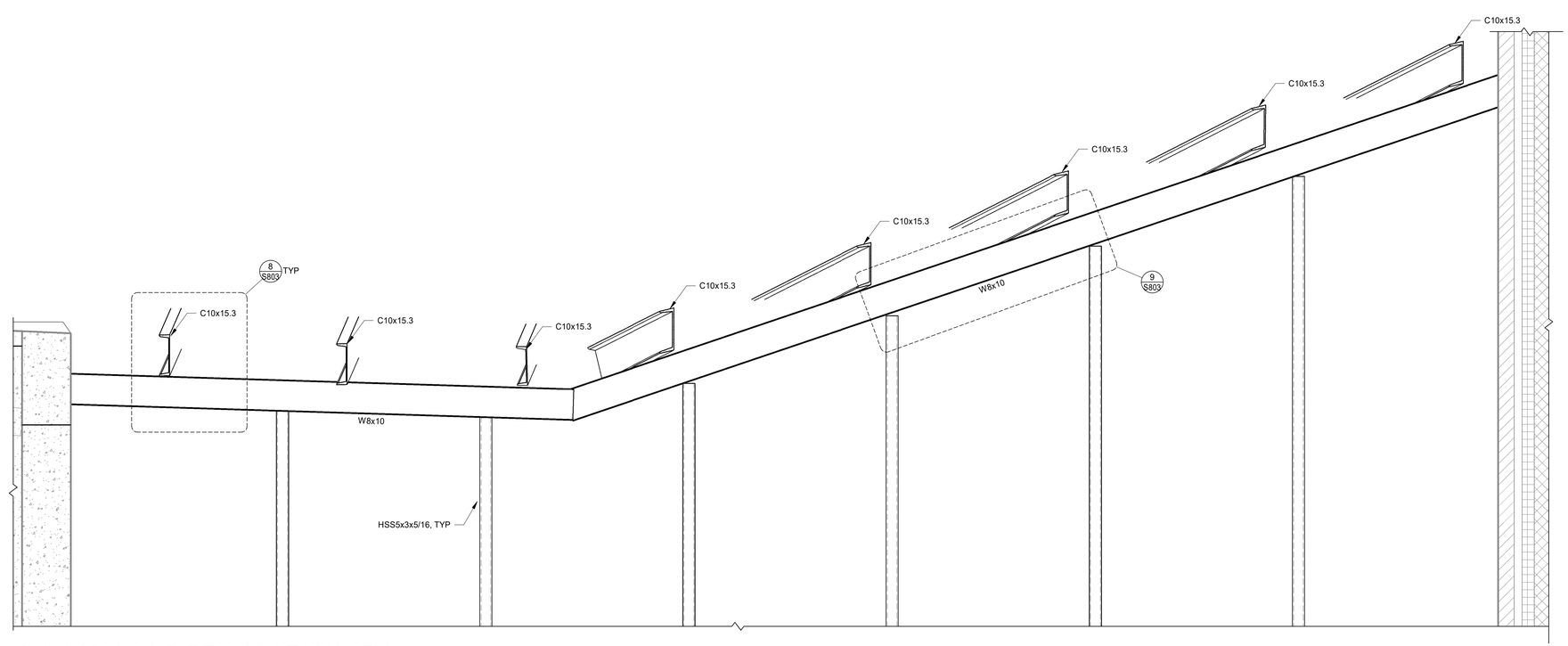
0 6" 1' 2'



6 LOAD AT JOIST

SCALE: 3/4" = 1'-0"

0 6" 1' 2'



7 COLUMNS AND BEAMS AT VALLEY

SCALE: 3/4" = 1'-0"

0 6" 1' 1'-6"

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.otie.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300,
Madison, Wisconsin 53718

WARNER PARK
COMMUNITY
RECREATION CENTER
EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

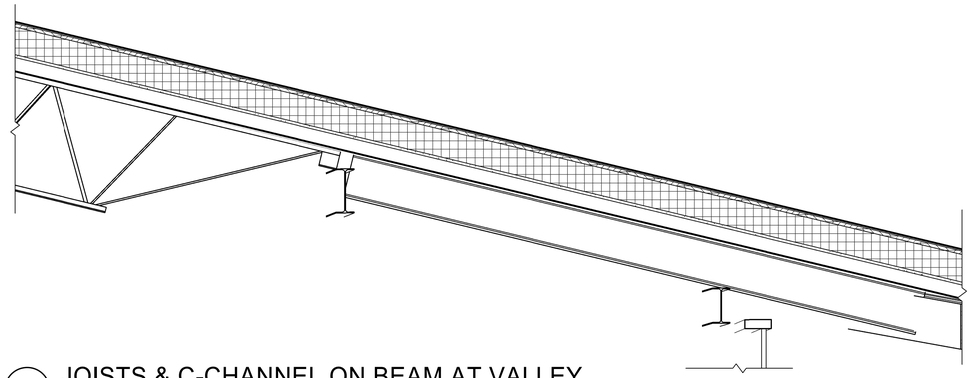
NO.	DESCRIPTION	DATE

DRAWN BY AWB

CHECKED BY Checker

STRUCTURAL DETAILS

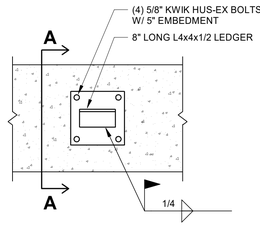
S801



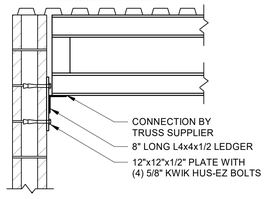
1 JOISTS & C-CHANNEL ON BEAM AT VALLEY

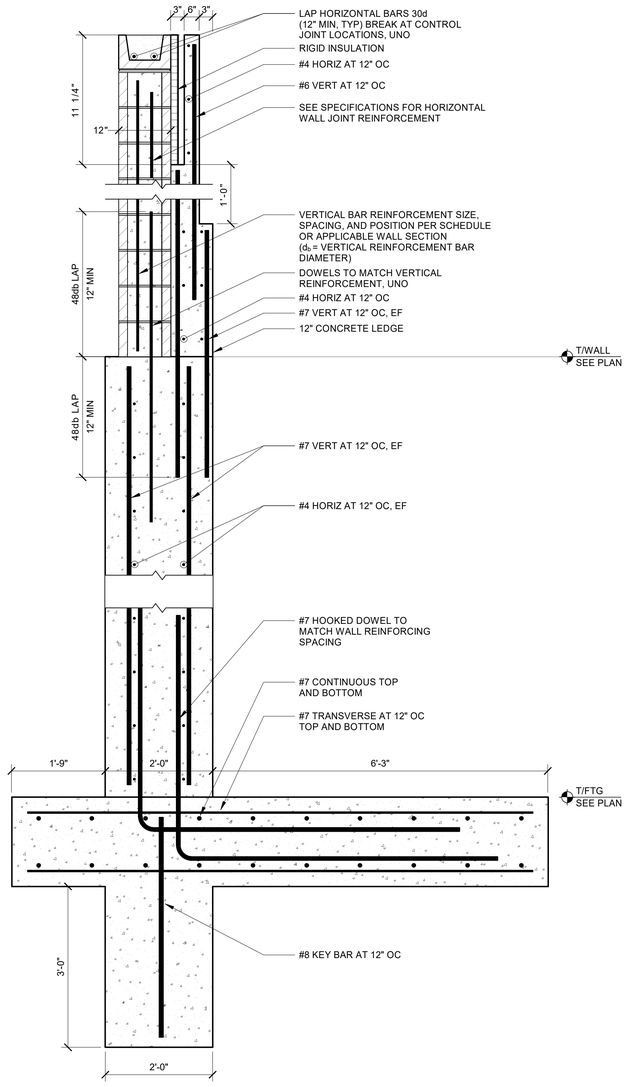
SCALE: 3/4" = 1'-0"

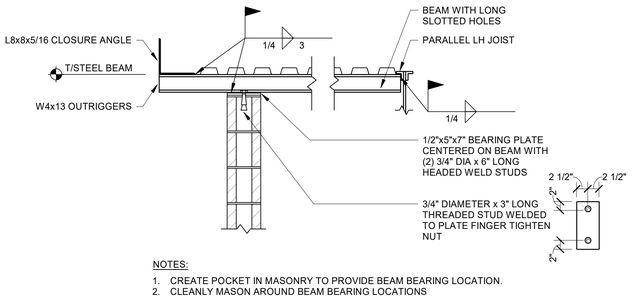
0 6" 1' 1'-6"



SECTION A







NOTES:

1. CREATE POCKET IN MASONRY TO PROVIDE BEAM BEARING LOCATION.
2. CLEANLY MASON AROUND BEAM BEARING LOCATIONS

2 WEST OUTRIGGER DETAIL

SCALE: 3/4" = 1'-0"

0 6" 1' 2'

3 INTERIOR CFMS TRUSS BEARING

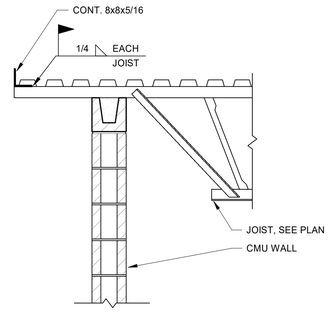
SCALE: 3/4" = 1'-0"

0 6" 1' 2'

4 EXTERIOR GYM WALL SECTION

SCALE: 3/4" = 1'-0"

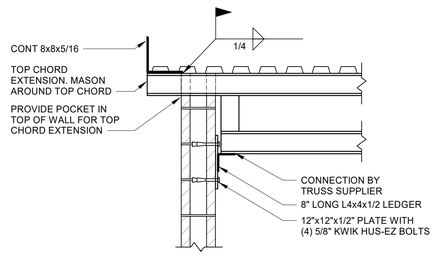
0 6" 1' 1'-6"



5 ROOF DECK EDGE

SCALE: 3/4" = 1'-0"

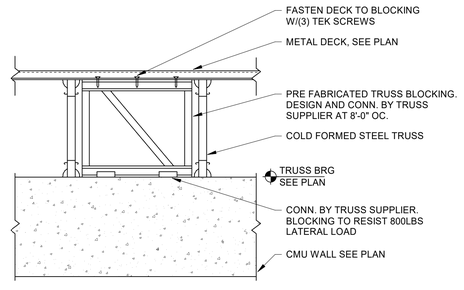
0 6" 1' 2'



6 EXTERIOR CFMS TRUSS BEARING

SCALE: 3/4" = 1'-0"

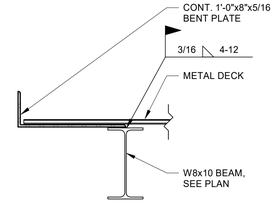
0 6" 1' 2'



7 TYP TRUSS BLOCKING

SCALE: 3/4" = 1'-0"

0 6" 1' 2'



8 DECK EDGE AT EAST WALL

SCALE: 1 1/2" = 1'-0"

0 6" 1' 2'

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.otie.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300, Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

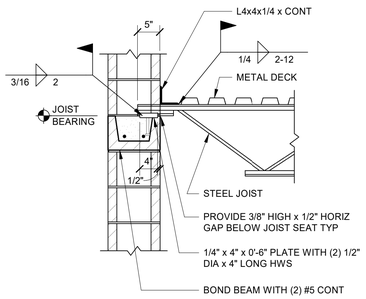
NO.	DESCRIPTION	DATE

DRAWN BY AWB

CHECKED BY Checker

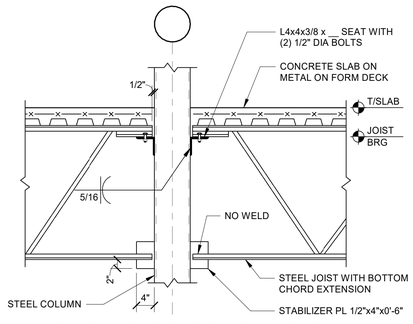
STRUCTURAL DETAILS

S802



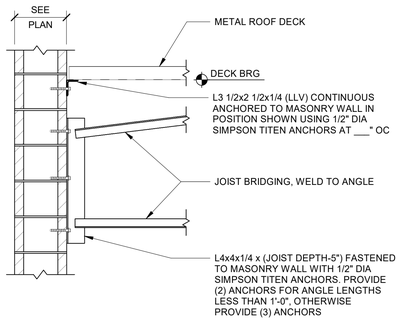
1 K-SERIES JOIST ON MASONRY WALL

SCALE: 3/4" = 1'-0"



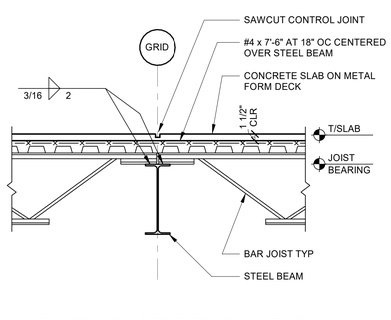
2 BAR JOIST BEARING ON HSS COLUMN

SCALE: 3/4" = 1'-0"



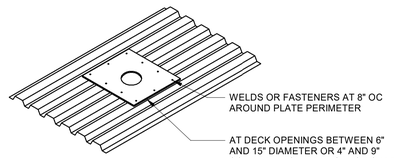
3 TYP END WALL BRIDGING

SCALE: 3/4" = 1'-0"



4 BAR JOIST BEARING ON BEAM

SCALE: 3/4" = 1'-0"



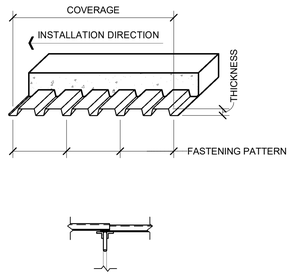
NOTES:

A. NO PLATE REINFORCEMENT REQUIRED AT DECK OPENINGS SMALLER THAN 6" DIAMETER OR 4" SQUARE.

B. FOR DECK OPENINGS LARGER THAN 13" DIAMETER OR 9" SQUARE, PROVIDE STEEL FRAME PER TYPICAL FRAMING AT ROOF OPENINGS DETAIL.

5 TYP ROOF DECK OPENING

SCALE: 3/4" = 1'-0"



END LAP DETAIL

LAP END LAPS. LAPS ARE TO OCCUR AT SUPPORTS ONLY

DECK ID	DECK TYPE	GAUGE	DESIGN # OF SPANS	SUPPORT CONN PATTERN	SIDELAP CONN (PER SPAN)	GALV	PAINT	NOTES
D1	1.5B	20	3	36/4-#12 TEK SCREWS	(2) #10 SELF DRILLING SCREWS		X	1, 2, 3
D2	1.5B	18	3	36/5-5/8" PUDDLE WELD	(5) #10 SELF DRILLING SCREWS	X		1, 2, 3
D3	1.0C (NON-COMPOSITE)	24	3	33/4-#12 TEK SCREWS	(2) #10 SELF DRILLING SCREWS	X		1, 2, 3
D4	3"VLI (COMPOSITE)	20	3	36/4-5/8" PUDDLE WELDS	#10 SELF-DRILLING SCREWS AT 12" OC	X		1, 2, 3
D5	3" DOVETAIL	18	3	36/4-5/8" PUDDLE WELDS	#10 SELF-DRILLING SCREWS AT 12" OC	X		1, 2, 3

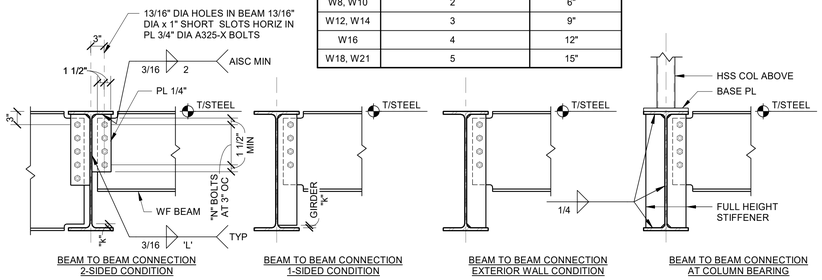
DECK NOTES:

1. ATTACH DECK TO ALL SUPPORTS WITH FASTENERS AND FASTENING PATTERNS INDICATED. FASTEN PERIMETER AT 12" OC.
2. GC CAN SUBMIT ALTERNATE FASTENING (WELDING, SCREWING, POWDER-ACTIVATED FASTENERS, PNEUMATICALLY-DRIVEN FASTENERS) FOR APPROVAL WITH MANUFACTURERS LITERATURE ON EQUAL PRIOR TO USING ALTERNATE.
3. ATTACH PARTIAL SHEETS IN ALL FLUTES.

6 METAL ROOF DECK FASTENING

SCALE: 3/4" = 1'-0"

SHEAR TAB STEEL CONNECTIONS		
BEAM SIZE	"N" NUMBER OF 3/4" DIA BOLTS	"L" MIN LENGTH
W8, W10	2	6"
W12, W14	3	9"
W16	4	12"
W18, W21	5	15"



BEAM TO BEAM CONNECTION 2-SIDED CONDITION

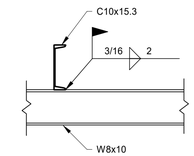
BEAM TO BEAM CONNECTION 1-SIDED CONDITION

BEAM TO BEAM CONNECTION EXTERIOR WALL CONDITION

BEAM TO BEAM CONNECTION AT COLUMN BEARING

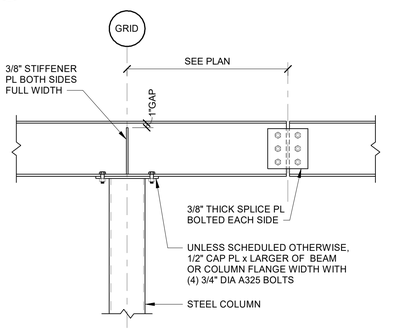
7 SHEARTAB BEAM CONNECTIONS

SCALE: 3/4" = 1'-0"



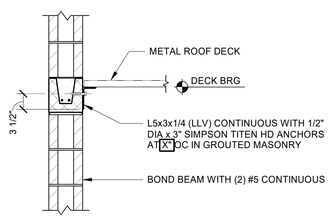
8 CHANNEL BEARING ON BEAM CONNECTION

SCALE: 3/4" = 1'-0"



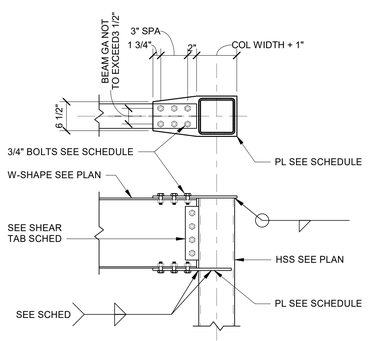
9 TYP STEEL BEAM SPLICE

SCALE: 3/4" = 1'-0"



10 DECK BEARING ANGLE AT WALL

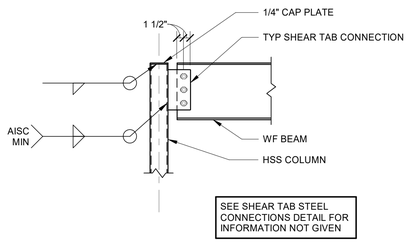
SCALE: 3/4" = 1'-0"



11 BEAM TO TUBE COLUMN MOMENT CONNECTION

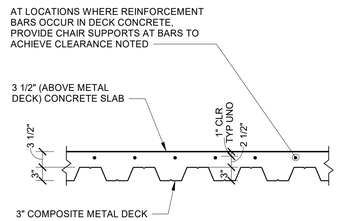
SCALE: 3/4" = 1'-0"

MOMENT SCHEDULE			
MARK	PLATE THICKNESS	NO. OF BOLTS PER FLANGE	WELD SIZE
MC1	1/2"	4	1/4



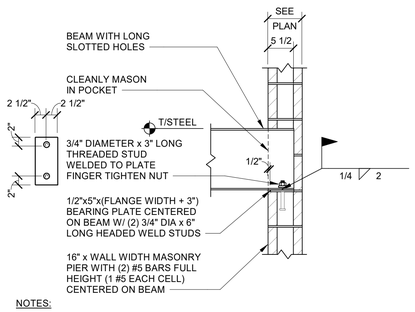
12 WF BEAM TO HSS COL CONNECTION

SCALE: 3/4" = 1'-0"



13 COMPOSITE METAL DECK

SCALE: 3/4" = 1'-0"

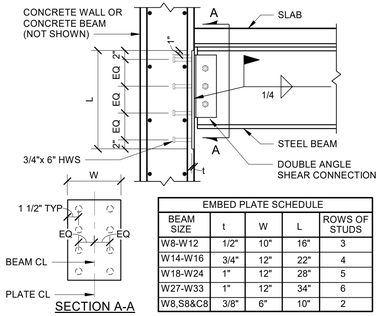


NOTES:

1. DETAIL APPLIES AT ALL BEAMS BEARING ON WALLS EXCEPT FOR LINTELS AND WHERE OTHERWISE NOTED.

14 BEAM BEARING DETAIL

SCALE: 3/4" = 1'-0"

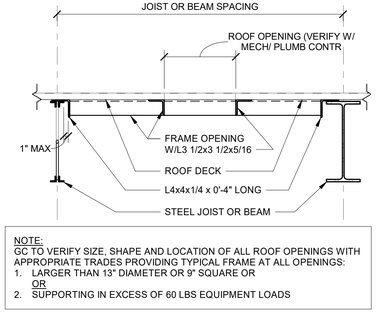


SECTION A-A

EMBED PLATE SCHEDULE				
BEAM SIZE	t	W	L	ROWS OF STUDS
W8-W12	1/2"	10"	16"	3
W14-W16	3/4"	12"	22"	4
W18-W24	1"	12"	28"	5
W27-W33	1"	12"	34"	6
W8,S8&C8	3/8"	6"	10"	2

15 BEAM CONNECTION AT CONCRETE FRAMING

SCALE: 3/4" = 1'-0"



NOTE:
GC TO VERIFY SIZE, SHAPE AND LOCATION OF ALL ROOF OPENINGS WITH APPROPRIATE TRADES PROVIDING TYPICAL FRAME AT ALL OPENINGS:
1. LARGER THAN 13" DIAMETER OR 9" SQUARE OR
OR
2. SUPPORTING IN EXCESS OF 60 LBS EQUIPMENT LOADS

16 TYPICAL FRAMING AT OPENINGS

SCALE: 3/4" = 1'-0"

Engberg Anderson ARCHITECTS

MILWAUKEE | MADISON | CHICAGO

ONEIDA Total Integrated Enterprises

www.oite.com Job Number 2023037

Office 608.243.6470 Fax 608.241.3914

5100 Eastpark Blvd, Suite 300, Madison, Wisconsin 53718

WARNER PARK COMMUNITY RECREATION CENTER EXPANSION

1625 NORTHPORT DRIVE
MADISON, WI 53704

CITY OF MADISON PARKS DIVISION
330 EAST LAKESIDE STREET
MADISON, WI 53715

PROJECT NUMBER 223471.00

ISSUED FOR:

BID SET 5/16/2024

REVISION FOR:

NO.	DESCRIPTION	DATE

DRAWN BY AWB

CHECKED BY Checker

STRUCTURAL DETAILS

S803