

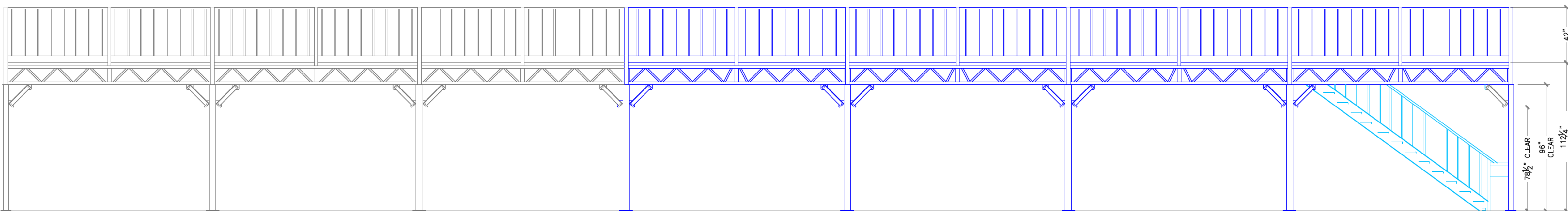
COLUMN SCHEDULE					
TYPE	O.A. LENGTH	COLUMN	3"SQ x 3/8"W INSERT	BASE PLATE	
C1,a,b	154 1/4"	4"SQ x 3/8"W HSS	YES	1/2" x 8" x 8"	
C2,a,b	154 1/4"	5"SQ x 3/8"W HSS	YES	1/2" x 10" x 10"	
C3,a	110"	5"SQ x 3/8"W HSS	YES	1/2" x 10" x 10"	
C4,a	110"	5"SQ x 3/8"W HSS	YES	1/2" x 12" x 12"	

TRUSS SCHEDULE			
TYPE	DEPTH	TRUSS CHORD (TOP & BOTTOM)	DIAGONAL
T1	14"	2"SQ x 1/8"W HSS	1 1/4"SQ x 1/8"W HSS
T2	14"	2"SQ x 1/8"W HSS	1 1/4"SQ x 1/8"W HSS

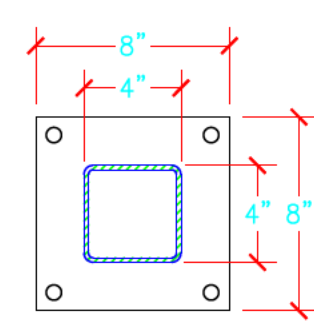


REVIEW OF STRUCTURAL
DESIGN ONLY
Dec. 20, 2019

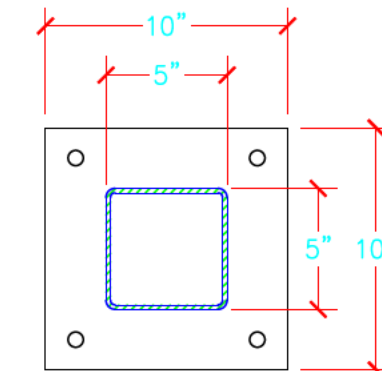
FRAMING PLAN-WITH ADDITION
SCALE: 1/4"=1'-0"



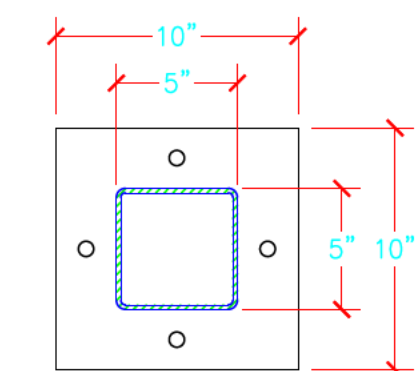
FRONT ELEVATION VIEW
SCALE: 1/4"=1'-0"



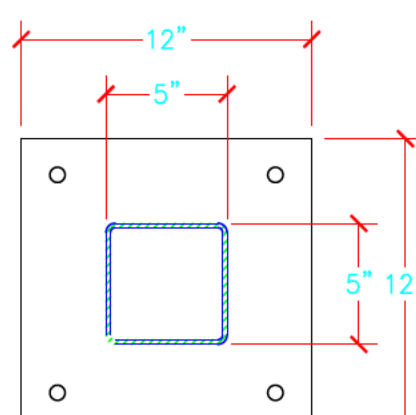
DETAIL 'A'
ALL 4"SQ
HSS COLUMN
BOLT PATTERN



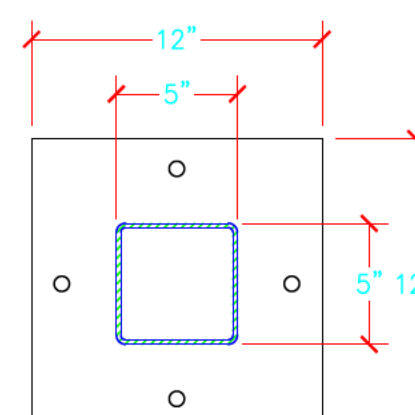
DETAIL 'B'
ALL PERIMETER
5"SQ HSS COLUMN
EXCEPT 'C2A' & 'C3A'
BOLT PATTERN



'C2A' & 'C3A'
NEW COLUMN
BOLT PATTERN



DETAIL 'C'
ALL INTERIOR
5"SQ HSS COLUMN
EXCEPT 'C4A'
BOLT PATTERN



'C4A'
NEW COLUMN
BOLT PATTERN

DESIGN SPECIFICATIONS:

1. FLOOR LOADING:
LIVE LOAD: 125 PSF
DECK LOAD: 6 PSF
DEAD LOAD: 15 PSF

2. STRUCTURE HAS BEEN DESIGNED FOR STRUCTURAL ADEQUACY IN ACCORDANCE WITH THE GENERAL REQUIREMENTS OF PART 4 OF THE ONTARIO BUILDING CODE (2012) & STEEL COMPONENTS TO BE DESIGNED TO MEET CAN/CSA S16-14.

3. MAXIMUM TRUSS DEFLECTION NOT TO EXCEED L/240 WHERE 'L' REPRESENTS THE LENGTH OF BEAM IN INCHES.

4. MAXIMUM HORIZONTAL DRIFT DUE TO WORKING LOADS NOT TO EXCEED H/240 WHERE 'H' REPRESENTS TOP OF FLOOR.

SEISMIC LOADS:

1. ALLOWANCE HAS BEEN MADE FOR SEISMIC LOADING (BURLINGTON, ON).

SEISMIC DATA:

So(0.2)=0.32; So(0.5)=0.170; So(1.0)=0.064; So(2.0)=0.022;
SITE CLASS 'D' (ASSUMED)

MATERIAL SPECIFICATIONS:

1. HOLLOW STRUCTURAL SECTIONS (H.S.S.): ASTM A500C.

2. MISC. STRUCTURAL C-SECTIONS, ANGLES, PLATES ETC: CAN/CSA C40.20-04/G40.21-04, GR 44W.

ASSEMBLY FASTENERS:

1. ALL COLUMNS TO BE FIXED TO THE EXISTING CONCRETE FLOOR WITH (4) 1/2" x 4 1/2" ANCHORS x 3/2" MIN. EMBEDMENT. TORQUE ANCHORS TO 40 FT-LBS.

2. STAIR STRINGER TO BE FIXED TO THE EXISTING CONCRETE FLOOR WITH (2) 1/2" x 4 1/2" ANCHORS x 3/2" MIN. EMBEDMENT. TORQUE ANCHORS TO 40 FT-LBS.

3. ALL STARTTREADS TO HAVE (4) 3/8" x 1" CARRIAGE BOLT SETS.

4. STAIRCASE NOSING TO BE FIXED TO STAIRSTRINGER'S SIDE CLIP(AT TOP OF STAIRCASE) WITH (2) 3/8" x 1" CARRIAGE BOLT SETS - 1 PER CLIP.

5. ALL TRUSS, TRUSS-COLUMN CONNECTIONS ARE MADE WITH 1/2" x 4 1/2" BOLT SETS GR.5 MIN. (3) BOLT SETS PER CONNECTION.

6. ALL GUARD RAIL PANELS TO BE FASTENED TO GUARD POSTS WITH (2) 1/2" x 4 1/2" GR.5 BOLT SETS - (1) PER END & (2) 1/4"-20 CONNECTOR BOLT-NUT - (1) PER END. TORQUE GR.5 BOLT TO 40 FT-LBS.

7. ALL CORNER BRACE ANGLES TO BE FASTENED TO THE WELDED TABS WITH (2) 1/2" x 2" GR.5 BOLT SETS - (1) PER END.

8. ALL 1/2" BOLT SETS CONSIST OF (1) HEX BOLT, (1) FLAT WASHERS & (1) HEAVY FLANGE NUT.

9. ALL BOLTS ARE TO BE INSTALLED TO A SNUG-TIGHT CONDITION. ENSURING ALL PILES ARE IN FIRM CONTACT. SNUG-TIGHT CONDITION IS ATTAINED WITH A FEW IMPACTS OF AN IMPACT WRENCH OR THE FULL EFFORT OF A PERSON USING AN ORDINARY SPUD WRENCH.

FLOOR INSTALLATION:

SEE INSTALLATION NOTES ON SHEET#2.

WELDING:

1. WELDING TO BE ACCORDING TO CSA W59.

SLAB-ON-GRADE:

1. THE OWNER IS RESPONSIBLE TO ENSURE THE CONCRETE SLAB-ON-GRADE AND SUBSURFACE SOIL CONDITIONS ARE ADEQUATE TO SUSTAIN PLATFORM LOADS AS SHOWN ON SHEET#2. THE OWNER IS REQUIRED TO TAKE ANY ACTION NECESSARY TO ENSURE ADEQUACY INCLUDING GEOTECHNICAL INVESTIGATIONS AND THE INSTALLATION OF FOOTINGS, IF REQUIRED.

FIRE RATING:

1. NO ALLOWANCE HAS BEEN MADE FOR FIRE RATING. SPRINKLERS, IF REQUIRED ARE TO BE DESIGNED AND INSTALLED BY THE OWNER, AND SHALL CONFORM TO APPLICABLE FIRE AND BUILDING CODES.

2. ALL OTHER CONCERNS IN A NON-STRUCTURAL NATURE INCLUDING BUT NOT LIMITED TO: LIGHTING, SMOKE BAFLES, FLUE SPACES, SPRINKLER HEAD CLEARANCES, FIRE EXTINGUISHERS, 'NO SMOKING' SIGNS ETC., SHALL BE THE RESPONSIBILITY OF THE OWNER AND CONFORM TO APPLICABLE FIRE AND BUILDING CODES.

GUARD RAIL:

1. THE GUARD RAIL HAS BEEN DESIGNED IN ACCORDANCE WITH THE ALBERTA BUILDING CODE 2014 AS FOLLOWS:

a. LOADING ON HANDRAIL: A CONCENTRATED LOAD OF 225 LB APPLIED AT ANY POINT (INWARD OR OUTWARD) PER §4.1.5.14.(1).(C).

b. LOADING ON PICKETS: A CONCENTRATED LOAD OF 113 LB AT ANY POINT IN THE ELEMENT PER §4.1.5.14.(2).

c. OPENINGS BETWEEN PICKETS NOT TO EXCEED THE LIMIT OF 200 MM (7 7/8") FOR INDUSTRIAL OCCUPANCY PER.

d. ALL GUARD RAILS TO HAVE A 5" KICK PLATE PER.

PERMITS:

1. ALL PERMITS REQUIRED SHALL BE THE RESPONSIBILITY OF THE OWNER.

CAPACITY PLAQUE:

1. LOAD CAPACITY PLAQUE INDICATING DESIGN LOADS SHALL BE INSTALLED IN A PROMINENT UNOBSTRUCTED VIEWING POSITION.

COLOUR(S) & FINISH:

1. ALL NEW COMPONENTS TO RECEIVE 2-3 MILS BAKED-ON POLYESTER POWDER COAT PAINT IN THE FOLLOWING COLOUR(S):

A. COLUMNS, BEAMS, STAIR STRINGERS, GUARD RAIL POSTS, GUARD RAIL PANELS : SA ROYAL BLUE.

B. STAIR TREADS : SA MEDIUM BLACK.

C. 20ga STEEL CORRUGATED DECK: GALVANIZED FINISH.

D. TREDEX EXTRA WOOD: NANOTEX GREY.

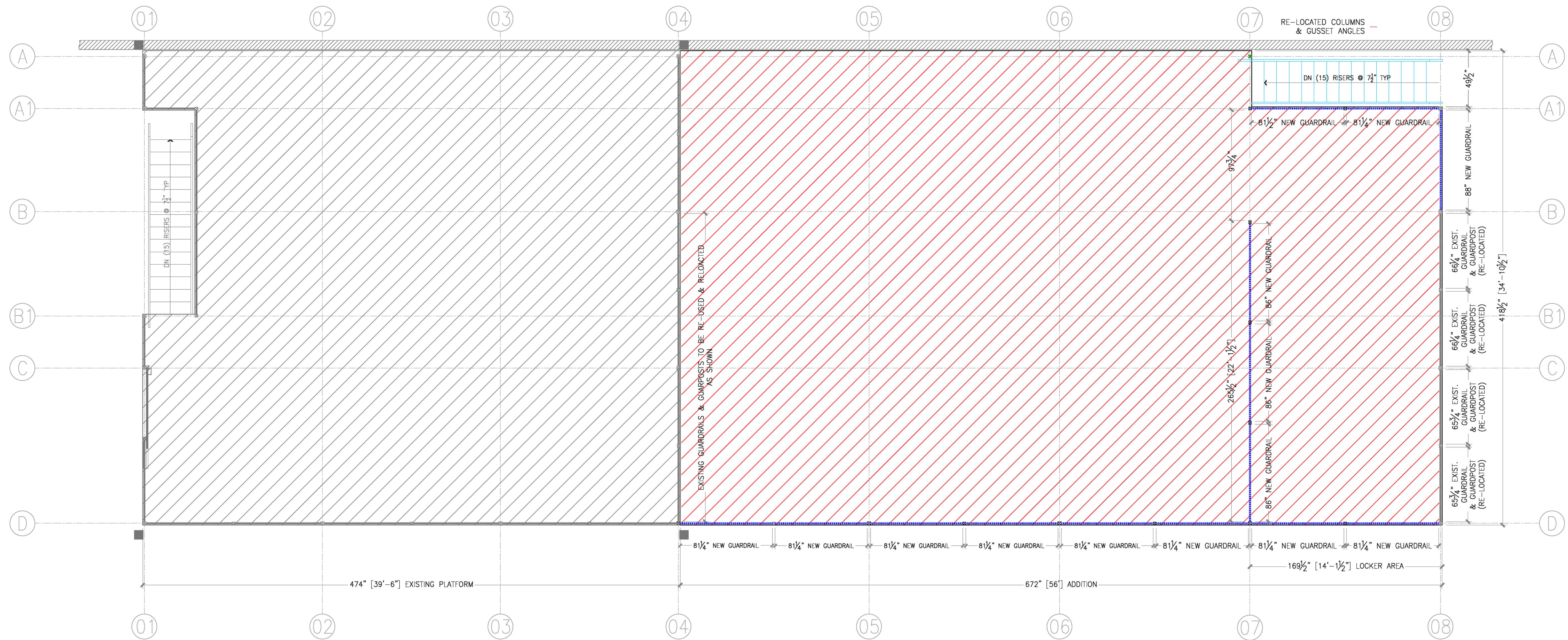
REV	DESCRIPTION	DATE
1	ADDED (4) GUARDDPOSTS AND 22' OF 42"H GUARDRAIL AS PER CUSTOMER REQUEST (ALONG GRID 7).	NOV. 12/19

CUSTOMER:

PROJECT:

DRAWING TITLE: EXISTING & ADDITION FRAMING PLAN

DETAIL SYMBOL NUMBER	SCALE: AS NOTED	DWG NO: 2019-M62	REV: 1
DRN. BY: M.C.	DATE: DEC. 3/19	JOB NO:	SHEET 1/3



— DENOTES 42"H RAILING —VERTICAL PICKET STYLE.

— DENOTES 3/4" TRED extra WOOD PANELS OVERLAYED ON 20GA STEEL FLOOR DECK PAINTED WHITE UNDERSIDE. (SUPPLIED BY M&P TOOL INC.)

FLOOR INSTALLATION AT ELEVATION 102" FROM TH ETOP FO THE FOOTPAD:

- CORRUGATED STEEL DECK SHALL BE 1 1/4" DEEP X 20GA WITH A MIN. OF 3 CONTINUOUS SPANS.
- DECK SHALL OVERLAP A MIN. OF 6" AT ALL END JOINTS AND HAVE A MIN. BEARING LENGTH OF 2" ON ALL BEAMS.
- CORRUGATED STEEL DECK HAS BEEN DESIGNED FOR DIAPHRAGM ACTION AND SHALL BE FASTENED TO STRUCTURE WITH #12 X 1 1/2" TEK SCREWS SPACED @ 12" O/C (EVERY 2ND FLUTE) AND AT SIDE LAPS. INSTALLER TO ENSURE CORRUGATED STEEL DECK OVERLAPS AT SIDE LAP LOCATIONS.
- TRED—EXTRA PANELS TO BE FASTENED TO TOP FLUTE OF CORRUGATED STEEL DECK WITH #10 X 2" SELF-DRILLING SCREWS SPACED @ 24" O/C IN LONG DIRECTION AND 16" O/C IN SHORT DIRECTION (20 SCREWS PER 4' X 8' SHEET) NOTE: SCREWS SHALL BE LOCATED AT LEAST 1" FROM EDGE OF SHEET.
- INSTALL TRED—EXTRA PANELS AS PER MANUFACTURER INSTRUCTIONS ALLOWING A 1/8" EXPANSION GAP BETWEEN PANEL JOINTS.
- STAGGER TRED—EXTRA PANELS SO THAT PANEL JOINTS BREAK ON DIFFERENT STEEL CORRUGATED DECK FLUTES.
- INSTALLER TO ENSURE THAT ALL TRED—EXTRA PANELS JOINTS BREAK OVER TOP FLUTE OF STEEL CORRUGATED DECK (FIGURE A). WHERE DECK PANEL JOINTS BREAK OVER A VALLEY (FIGURE B), INSTALL 20GA X 6" WIDE SHIMS UNDERNEATH DECK PANELS (SHIMS BY OTHERS).

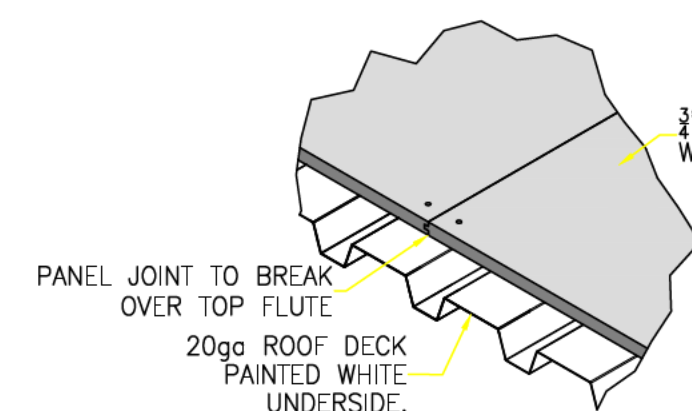


FIGURE A
SCALE: 1/2"=1'-0"

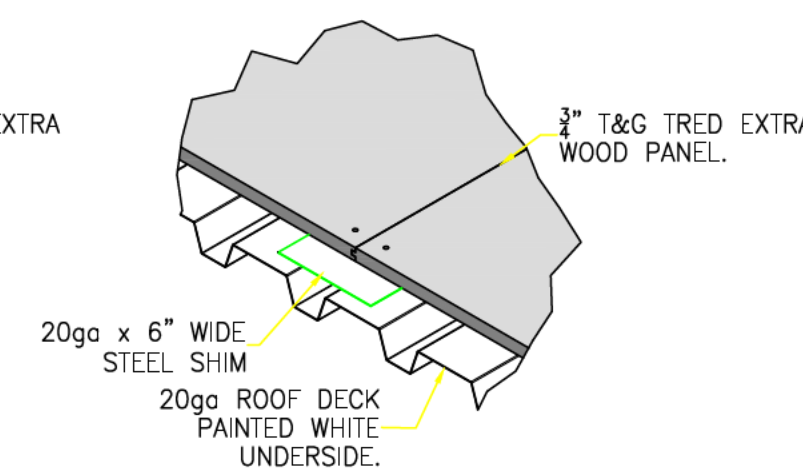
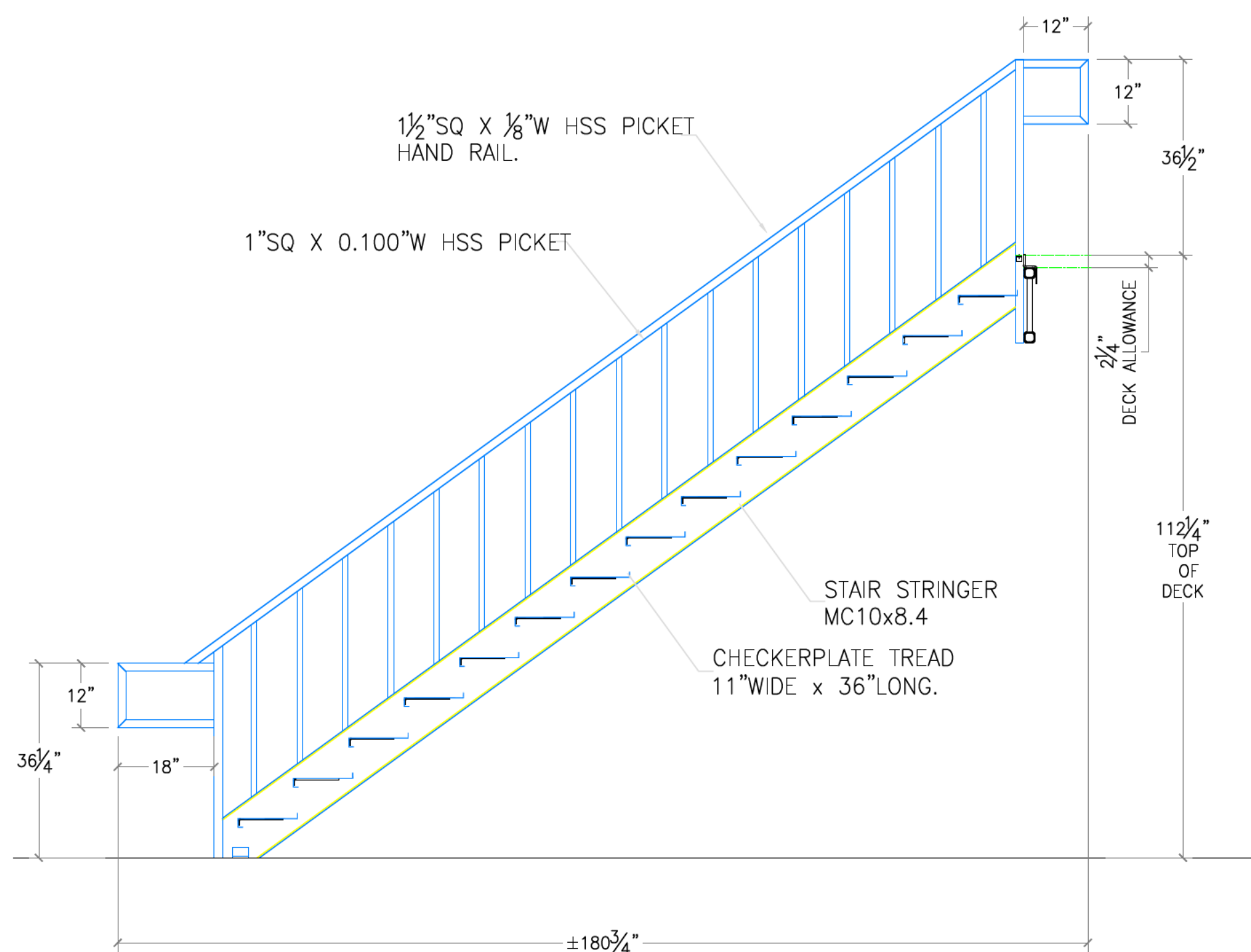
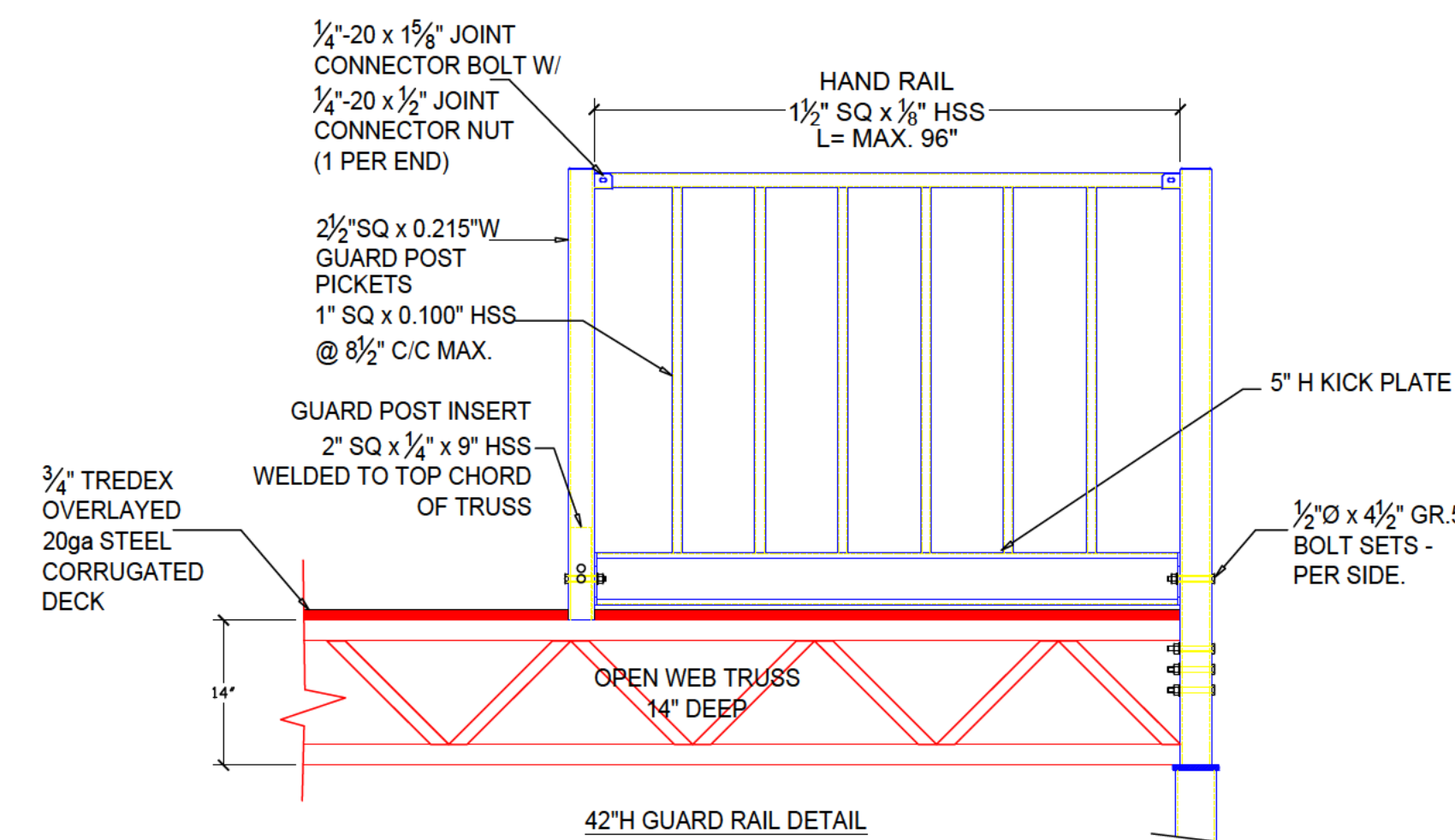


FIGURE B
SCALE: 1/2"=1'-0"

FLOOR PLAN—WITH ADDITION
SCALE: 1/2"=1'-0"



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



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

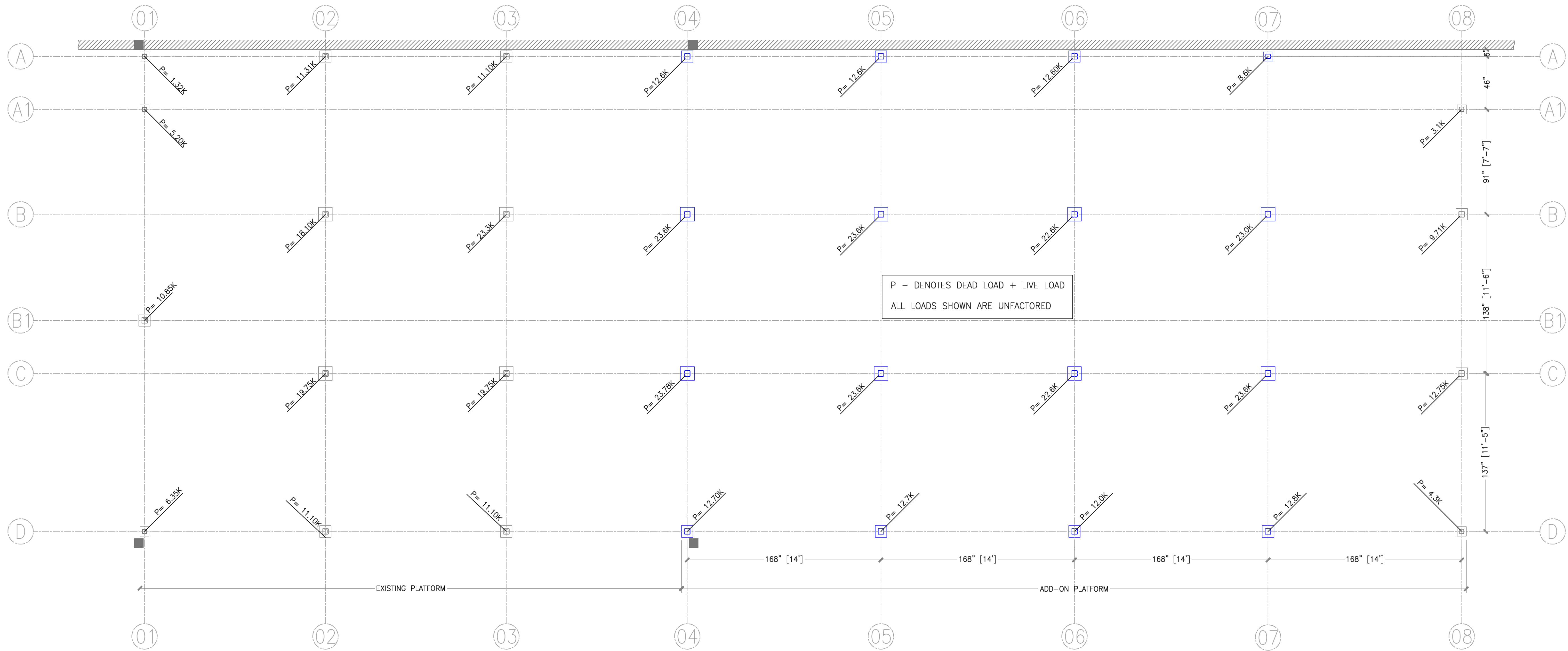


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CUSTOMER	
PROJECT	
DRAWING TITLE	EXISTING & ADDITION FRAMING PLAN

DETAIL SYMBOL	SCALE	DWG. NO.	REV.
AS NOTED	AS NOTED	2019-M62	1
DRN. BY	DATE	JOB NO.	SHEET
M.C.	DEC. 3/19		2/3



REVIEW OF STRUCTURAL
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REV	DESCRIPTION	DATE
1	ADDED (4) ADDITIONAL GUARDPOSTS AND 22" OF 42"H GUARDRAIL AS PER CUSTOMER REQUEST (ALONG GRID 7).	NOV. 12/19

CUSTOMER:	E.
PROJECT:	
DRAWING TITLE:	GROUND FLOOR PLAN VIEW.

DETAIL SYMBOL NUMBER	SCALE AS NOTED	DWG. NO. 2019-M62	REV. 1
DRN. BY M.C.	DATE DEC. 3/19	JOB NO.	SHEET 3/3

GROUND FLOOR PLAN
SCALE: 1/4"=1'-0"