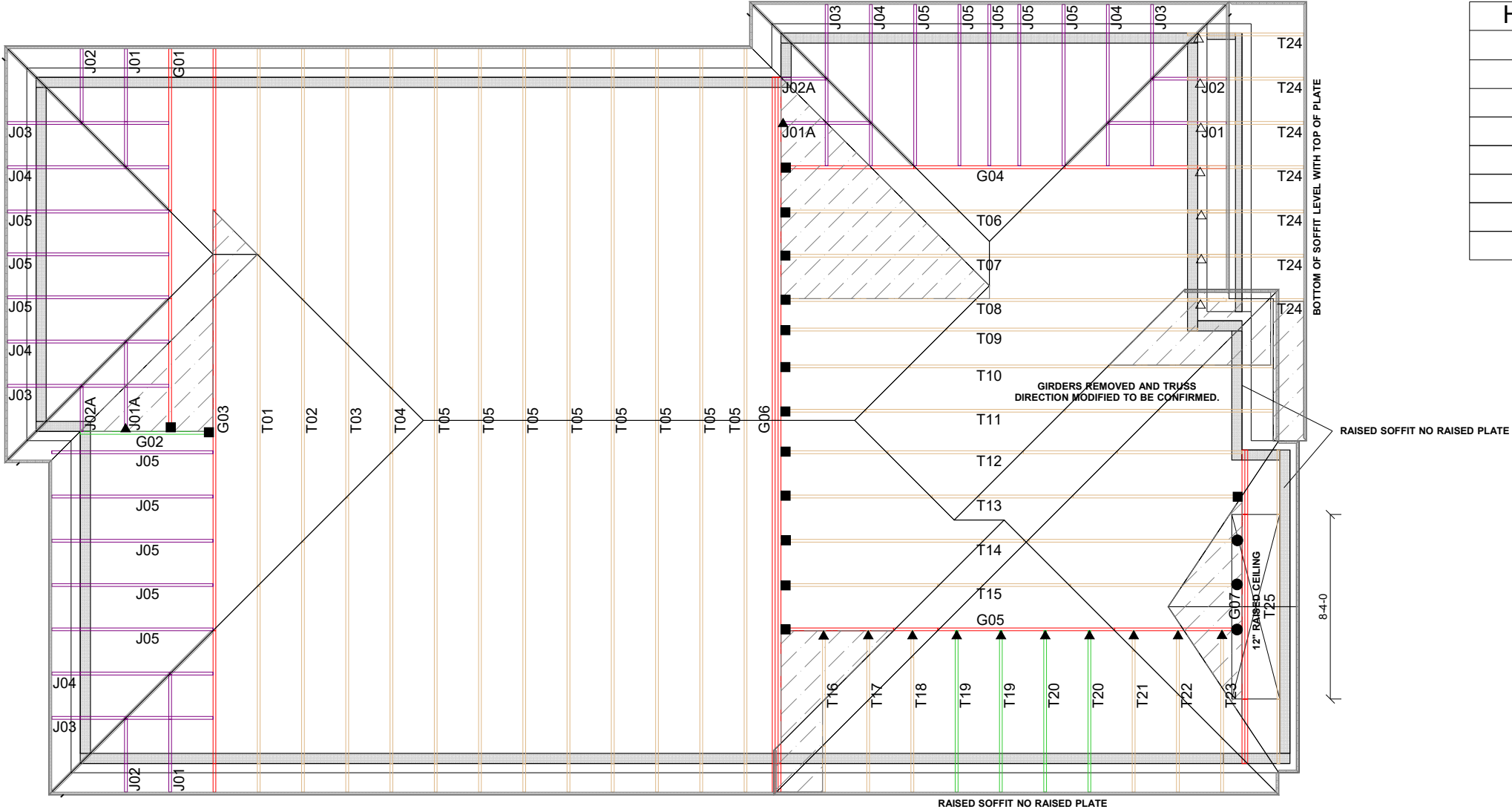


MHP 23030



Hanger Name	Symbol	QTY
LUS24	▲	12
LJS26DS	■	15
HGUS26	●	3
	◆	0
H2.5A	△	7
	□	0
	◐	0
	○	0

JOB INFORMATION

Customer	GREENPARK HOMES
Job #	23-00117R0
Address	ZADORRA ESTATES ROSE 6 EL 3 OSHAWA,ON
Model	ROSE 6 EL 3
Sales Rep	RALPH MIRIGELLO
Designer	BB
Date	6/7/2023
Path	S:\DESIGN\KLU\CUSTOMERS\GREENPARK\ZADORRA ESTATES\MODELS\ROSE 6\ROSE 6-3\T-ROSE

DESIGN INFORMATION

Code	NBCC 2015
Bldg	Residential - HSB (NBCC Part 9)
TC LL	34.8 lb/ft²
TC DL	6.0 lb/ft²
BC LL	0.0 lb/ft²
BC DL	7.3 lb/ft²
Deflection	LL=L/360 TL=L/360
Spacing	24" O/C unless otherwise noted
Complies With	OBC 2012 (2019 Amendment) CSA O86-14 and TPIC 2014

IMPORTANT INFORMATION

Hangers and Fasteners to be installed as per manufacturer

Refer to truss drawings in the Truss Engineering Package for ply-to-ply attachment notes

For site-framed valleys: top chords of all roof trusses must be laterally supported using 2x4 continuous bracing @24 O/C - all bracing must be anchored at ends as per TPIC Installation Guidelines

Read all notes on this page in addition to those shown on the KOTT Truss Engineering package

Field erection, handling and bracing are not the responsibility of KOTT, or KOTT Engineering

Unless noted otherwise, hurricane ties are to be installed at the bearings of all trusses > 40 ft clear span, and any girder or beam supporting trusses with a clear span >40 ft. See hanger legend for type.

Unless noted otherwise, for Part 9 bldgs, all trusses are to be anchored to the top of supporting walls as follows: trusses with a clear span <40 ft use 3-1/4" nails @ each bearing; trusses with a clear span >40 ft use 3-1/4" nails @ each bearing in addition to the appropriate hurricane tie.



CONVENTIONAL FRAMING BY OTHERS

ALL CONVENTIONAL FRAMING TO CONFORM WITH PART 9 OF THE OBC. ROOF RAFTERS THAT CROSS OVER TRUSSES TO BE MIN. 2x4 SPF @ 24" C/C WITH A 2x4 VERTICAL POST TO THE TRUSS BELOW. VERTICAL POSTS TO BE Laterally BRACED SO THAT UNBRACED LENGTH DOES NOT EXCEED 6'. DESIGN OF CONVENTIONAL FRAMING IS THE RESPONSIBILITY OF THE PROJECT ENGINEER.

KOTT Inc.  
14 Anderson Blvd.  
Uxbridge, ON  
905.642.4400



PLEASE READ ALL NOTES PRIOR TO INSTALLATION OF THE COMPONENT

### RESPONSIBILITIES

THE UNDERSIGNED ENGINEER IS ONLY RESPONSIBLE FOR THE STRUCTURAL INTEGRITY OF THIS BUILDING COMPONENT FOR THE CONDITIONS AND LOADS SHOWN ON CALCULATION PAGE. THE STRUCTURAL INTEGRITY OF THE BUILDING AND THE VERIFICATION OF THE DIMENSIONS AND THE DESIGN LOADS USED ARE THE RESPONSIBILITY OF THE BUILDING DESIGNER. THE UNDERSIGNED ENGINEER DISCLAIMS ANY RESPONSIBILITY FOR DAMAGES AS A RESULT OF FAULTY OR INCORRECT INFORMATION, SPECIFICATION AND/OR DESIGNS FURNISHED TO THE ENGINEER.

IT IS THE RESPONSIBILITY OF KOTT Inc. TO ENSURE THAT TRUSSES ARE MANUFACTURED IN CONFORMANCE WITH THESE DESIGNS AND WITH THE SPECIFICATIONS OUTLINED BELOW. THE UNDERSIGNED ENGINEER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

### DESIGN INFORMATION

THIS DESIGN IS FOR AN INDIVIDUAL BUILDING COMPONENT AND HAS BEEN BASED ON INFORMATION PROVIDED BY KOTT DESIGN.

1. THE BUILDING USE AND OCCUPANCY TYPE IS AS INDICATED ON THE DRAWING.
2. GEOMETRY OF THE TRUSS AND DIMENSIONS INDICATED ON THE DRAWING ARE IDENTICAL TO THOSE OF THE INSTALLED TRUSS.
3. THE TRUSS LOADING INTENSITY AND DISTRIBUTION AS WELL AS LOAD TRANSFER MECHANISM IS THAT INDICATED ON THE DRAWING. NO BUILDINGS, TREES, PARAPETS OR OTHER PROJECTIONS HIGHER THAN THE ROOF FOR WHICH THE TRUSSES ARE USED ARE LOCATED WITHIN A DISTANCE LESS THAN TEN (10) TIMES THE DIFFERENCE IN HEIGHT, OR FIVE METERS (16 FT) WHICHEVER IS GREATER, UNLESS THE DRAWING INDICATES THAT THE SNOW DRIFTING HAS BEEN TAKEN INTO ACCOUNT.
4. THE TRUSSES ARE TO BE SUPPORTED AT THE BEARING POINTS INDICATED AND ANCHORED TO THE SUPPORTS WHERE CONSIDERED NECESSARY BY THE DESIGNER OF THE OVERALL STRUCTURE. BEARING SIZES SHOWN ARE THE MINIMUM REQUIRED TO PREVENT CRUSHING OF THE TRUSS MEMBERS AND DO NOT NECESSARILY TAKE INTO ACCOUNT STABILITY OF THE OVERALL BUILDING STRUCTURE. ELEVATION OF BEARINGS MUST BE CAREFULLY CHECKED AND SHIMMED TO ALIGNMENT FOR SOLID BEARINGS. ADEQUATE WOOD TRUSS BEARING IS THE RESPONSIBILITY OF THE BUILDING DESIGNER.

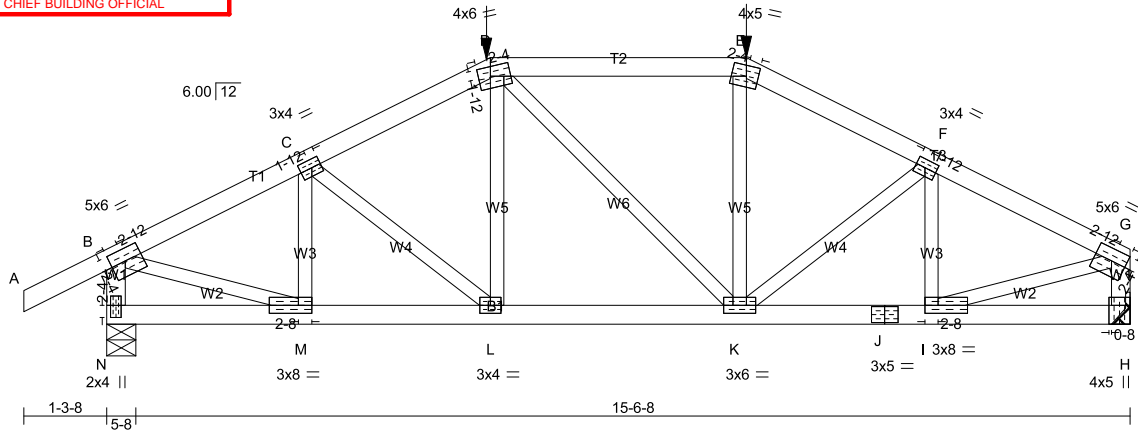
### CODE

TRUSSES ARE DESIGNED IN CONFORMANCE WITH THE RELEVANT SECTIONS OF THE NATIONAL BUILDING CODE OF CANADA OR THE CANADIAN CODE FOR FARM BUILDINGS, WHICHEVER APPLIES TO THE BUILDING TYPE INDICATED ON THE DRAWING, THE ONTARIO BUILDING CODE, TPIC AND CANADIAN STANDARDS ASSOCIATION GUIDELINES.

### HANDLING, INSTALLATION AND BRACING

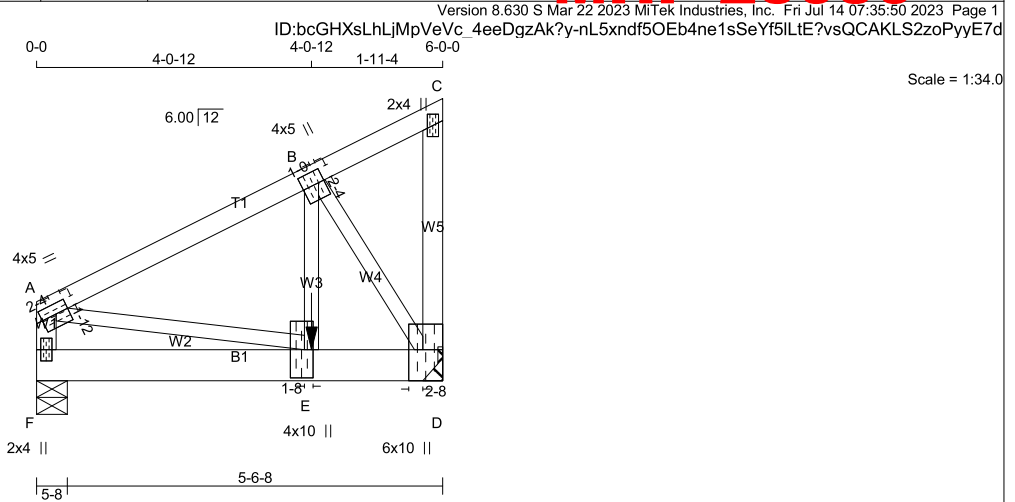
1. THE TRUSSES MUST BE HANDLED AND INSTALLED BY A QUALIFIED PROFESSIONAL AS PER THE SUPPLIED DOCUMENT TITLED INFORMATION FOR TRUSS INSTALLERS AND THE BCSI-B1 AND BCSI-B3 SUMMARY SHEETS.
2. THE COMPRESSION CHORDS ARE Laterally Braced by Continuous Rigid Diaphragm Sheathing or as Specified on the Drawing.
3. TEMPORARY AND PERMANENT BRACING MUST BE INSTALLED AS INDICATED ON THE TRUSS DRAWING AND ACCORDING TO THE BCSI-B1 AND BCSI-B3 SUMMARY SHEETS. BRACING FOR THE LATERAL STABILITY OF THE TRUSS IS TO BE PROVIDED BY THE BUILDING DESIGNER.
4. IT IS RECOMMENDED THAT A PROFESSIONAL ENGINEER'S ADVICE BE OBTAINED FOR THE BRACING OF TRUSSES SPANNING MORE THAN 12.37M (40'-7").

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME OF PERMIT PLANS Oct 30 2023 PER: <i>Chmara</i> CHIEF BUILDING OFFICIAL	1	1	TRUSS DESC.	<b>MHP 23030</b>

Version 8.630 S Mar 22 2023 MiTek Industries, Inc. Fri Jul 14 07:35:49 2023 Page 1  
ID:bcGHXsLhLjMpVeVc\_4eeDgzAk?y-J9YZZHeTdwTD9VSguw1QZXofbW4hjZA6oIPGzyyE7e

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME Oct 30 2023	1	1	TRUSS DESC.	<b>MHP 23030</b>

PER:   
CHIEF BUILDING OFFICIAL



TOTAL WEIGHT = 30 lb

**LUMBER**

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
F - A	2x4	DRY	No.2	SPF
A - C	2x4	DRY	No.2	SPF
D - C	2x4	DRY	No.2	SPF
F - D	2x6	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF
DRY: SEASONED LUMBER.				

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW-t	MT20	4.0	5.0	1.75	2.25
B	TMVW+t	MT20	4.0	5.0	2.25	1.00
C	TMV+p	MT20	2.0	4.0		
D	BMVW1+t	MT20	6.0	10.0	Edge	2.50
E	BMVW+t	MT20	4.0	10.0	5.00	1.50
F	BMV1+p	MT20	2.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER****BEARINGS**

	FACTORED	MAXIMUM FACTORED	INPUT	REQD
	GROSS REACTION	GROSS REACTION	BRG	BRG
JT	VERT	HORZ	DOWN	HORZ
F	1423	0	1423	0
D	1944	0	1944	0

A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED AT JOINT D. MINIMUM BEARING LENGTH AT JOINT D = 3-8.

**UNFACTORED REACTIONS**

JT	1ST LCASE	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
F	994	720 / 0	0 / 0	0 / 0	0 / 0	275 / 0	0 / 0
D	1359	983 / 0	0 / 0	0 / 0	0 / 0	376 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) F

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.53 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (4)

C H O R D S				W E B S			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX LC1 MAX CSI (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH
FR-TO		FROM	TO		FR-TO		
F-A	-1303 / 0	0.0	0.0	0.14 (1)	6.96	A-E	0 / 1319
A-B	-1414 / 0	-238.9	-238.9	0.58 (1)	4.53	E-B	0 / 1683
B-C	-73 / 0	-119.4	-119.4	0.47 (1)	6.25	B-D	-2280 / 0
D-C	0 / 47	0.0	0.0	0.01 (1)	10.00		
F-E	0 / 0	-36.5	-36.5	0.15 (1)	10.00		
E-D	0 / 1296	-18.2	-18.2	0.31 (1)	10.00		

**SPECIFIED CONCENTRATED LOADS (LBS)**

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE	HEEL	CONN.
E	4-0-12	-1385	-1385	---	FRONT	VERT	TOTAL	---	C1

**CONNECTION REQUIREMENTS**

1) C1: A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED.

**DESIGN CRITERIA**

\*\*\* SPECIAL LOADS ANALYSIS \*\*\*  
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.  
LOADS WERE DERIVED FROM USER INPUT  
NO FURTHER MODIFICATIONS WERE MADE

**SPECIFIED LOADS:**

TOP CH.	LL	=	34.8	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF	

**SPACING = 24.0 IN. C/C**

GIRDER TYPE: CPrimeHip  
SIDE SETBACK = 0-0  
END SETBACK = 6-0-0  
END WALL WIDTH = 0-0  
CORNER FRAMING TYPE: CONVENTIONAL  
END JACK TYPE: CONVENTIONAL  
APPLIED TO FRONT SIDE  
- ADDTL LOADS BASED ON 55 % OF GSL.  
LOADS APPLIED TO FIRST 4-0-12 OF SPAN MEASURED FROM THE LEFT.

**\*\*\* NON STANDARD GIRDER \*\*\***

ADDTL USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

**THIS DESIGN COMPLIES WITH:**

- PART 9 OF BCBC 2018, NBC-2019AE  
- PART 9 OF OBC 2012 (2019 AMENDMENT)  
- CSA 086-14  
- TPIC 2014

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.20")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.02")  
ALLOWABLE DEFL.(TL) = L/360 (0.20")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.04")

CSI: TC=0.58/0.97 (A-B:1), BC=0.31/0.97 (D-E:1), WB=0.50/0.97 (B-D:1), SSI=0.43/1.00 (A-B:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00  
COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**

PLATE	GRIP(DRY)	SHEAR	SECTION
(PSI)	(PLI)	(PLI)	(PLI)
MAX	MIN	MAX	MIN
MT20	650	371	1747

CONTINUED ON PAGE 2



JULY 14, 2023

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTES: TRUSSES. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.






JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS 02	1	1	TRUSS DESC.	<b>MHP 23030</b>

TRUSS NAME  
OF PERMIT PLANS

Oct 30 2023

PER:   
CHIEF BUILDING OFFICIAL

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ID:bcGHXsLhLjMpVeVc\_4eeDgzAk?y-nL5xndf5OEb4ne1sSeYf5ILtE?vsQCAKLS2zoPyyE7d

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.87 (A) (INPUT = 0.90 )

JSI METAL= 0.58 (E) (INPUT = 1.00 )



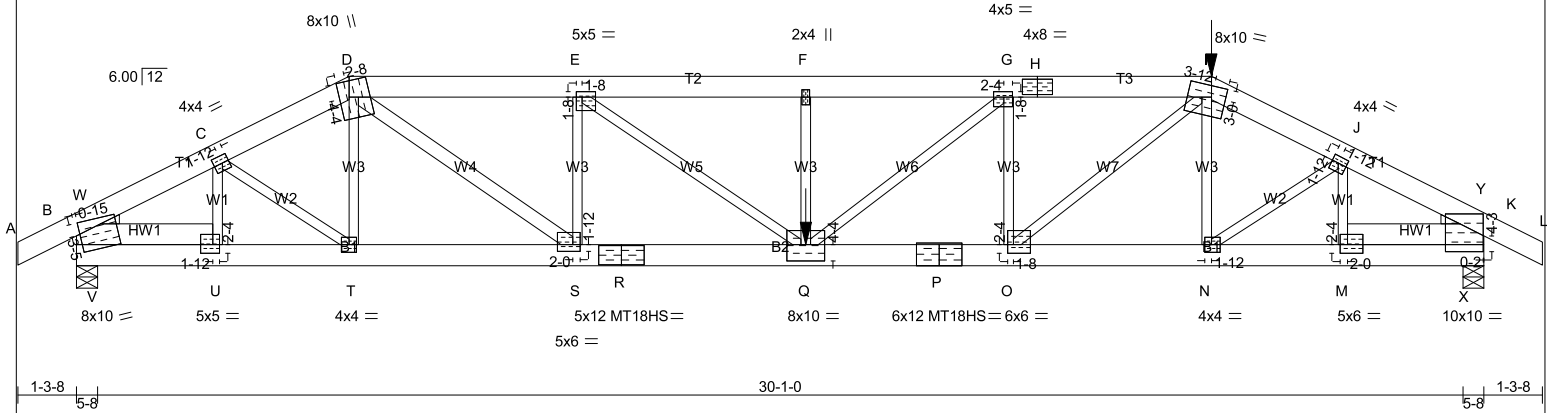
JULY 14, 2023

READ ALL NOTES ON THIS PAGE AND ON THE  
ENGINEERING NOTES: TRUSSES. THE NOTE PAGE  
IS AN INTEGRAL PART OF THIS DRAWING AS IT  
CONTAINS SPECIFICATIONS AND CRITERIA USED  
IN THE DESIGN OF THIS COMPONENT.



JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME	1	1	TRUSS DESC.	MHP 23030
Version 8.630 S Mar 22 2023 MiTek Industries, Inc. Fri Jul 14 07:35:51 2023 Page 1					
ID:bcGHXsLhLjMpVeVc_4eeDgzAk?y-GYfJ_zg9Yxpoc20L3ueyu5kOAa9YzTa6nWKryyE7c					
1-3-8	0-0	3-1-8	5-0-6	11-0-6	5-0-6
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	16-0-12
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	4-5-10
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	20-6-6
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	4-5-10
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	25-0-0
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	2-10-12
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	27-10-12
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	3-1-4
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	31-0-0
1-3-8	3-1-8	5-0-6	11-0-6	5-0-6	32-1-4

Scale = 1:50.8



TOTAL WEIGHT = 173 lb

**LUMBER**

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
A - D	2x6	DRY	2100F 1.8E	SPF
D - H	2x6	DRY	2100F 1.8E	SPF
H - I	2x6	DRY	2100F 1.8E	SPF
I - L	2x6	DRY	2100F 1.8E	SPF
B - R	2x6	DRY	2100F 1.8E	SPF
R - P	2x6	DRY	2100F 1.8E	SPF
P - K	2x6	DRY	2100F 1.8E	SPF

REINFORCING MEMBERS	CHORDS	SIZE	LUMBER	DESCR.
HW1	2x6	DRY	No.2	SPF
HW2	2x6	DRY	No.2	SPF

ALL WEBS EXCEPT	CHORDS	SIZE	LUMBER	DESCR.
D - S	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
B	TMBMW1-m	MT20	8.0	10.0	3.25	1.00
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TTWW+m	MT20	8.0	10.0	4.25	2.50
E	TMWW-t	MT20	5.0	5.0	1.50	1.50
F	TMW+w	MT20	2.0	4.0		
G	TMWW-t	MT20	4.0	5.0	1.50	2.25
H	TS-t	MT20	4.0	8.0		
I	TTWW-m	MT20	8.0	10.0	3.00	3.75
J	TMWW-t	MT20	4.0	4.0	1.75	1.75
K	TMBMW1-l	MT20	10.0	10.0	4.25	0.25
M	BMWW-t	MT20	5.0	6.0	2.25	2.00
N	BMWW-t	MT20	4.0	4.0	2.00	1.75
O	BMWW-t	MT20	6.0	6.0	2.25	1.50
P	BS-t	MT18HS	6.0	12.0		
Q	BMWW-t	MT20	8.0	10.0	4.25	5.00
R	BS-t	MT18HS	5.0	12.0		
S	BMWW-t	MT20	5.0	6.0	1.75	2.00
T	BMWW-t	MT20	4.0	4.0		
U	BMWW-t	MT20	5.0	5.0	2.25	1.75

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY****BUILDING DESIGNER****BEARINGS**

	FACTORED GROSS REACTION	MAXIMUM FACTORED GROSS REACTION	INPUT BRG	REQD BRG	HEEL WEDGE
JT	VERT	HORZ	DOWN	HORZ	UPLIFT
B	3719	0	3719	0	0
K	4551	0	4551	0	0

**UNFACTORED REACTIONS**

	1ST LCASE	MAX./MIN. COMPONENT REACTIONS					
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
B	2596	1897 / 0	0 / 0	0 / 0	0 / 0	699 / 0	0 / 0
K	3180	2303 / 0	0 / 0	0 / 0	0 / 0	877 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) B, K  
BEARING SIZE FACTOR = 1.15 AT JNT(S) B, K ( BASED ON SUPPORT DEPTH = 1-8 )

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.11 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (4)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. LC1 (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. LC1 (LC)	
FR-TO		FROM TO	LENGTH	FR-TO			
A-B	0 / 0	-119.4 -119.4	0.05 (1)	10.00	U-C	-954 / 0	0.16 (1)
B-W	-3926 / 0	-119.4 -119.4	0.09 (1)	5.12	C-T	0 / 691	0.17 (1)
W-C	-5147 / 0	-119.4 -119.4	0.11 (1)	4.58	T-D	-267 / 0	0.07 (1)
C-D	-5735 / 0	-119.4 -119.4	0.12 (1)	4.38	D-S	0 / 4034	0.71 (1)
D-E	-8371 / 0	-119.4 -119.4	0.27 (1)	3.61	S-E	-2259 / 0	0.55 (1)
E-F	-10531 / 0	-119.4 -119.4	0.35 (1)	3.17	E-Q	0 / 2683	0.66 (1)
F-G	-10531 / 0	-225.2 -225.2	0.41 (1)	3.11	Q-F	-690 / 0	0.17 (1)
G-H	-9245 / 0	-225.2 -225.2	0.35 (1)	3.36	Q-G	0 / 1672	0.41 (1)
H-I	-9245 / 0	-225.2 -225.2	0.35 (1)	3.36	O-G	-2190 / 0	0.54 (1)
I-J	-7174 / 0	-119.4 -119.4	0.16 (1)	3.94	O-I	0 / 3681	0.91 (1)
J-Y	-6383 / 0	-119.4 -119.4	0.15 (1)	4.16	N-I	-304 / 46	0.07 (1)
Y-K	-4862 / 0	-119.4 -119.4	0.12 (1)	4.68	N-J	0 / 932	0.23 (1)
K-L	0 / 0	-119.4 -119.4	0.05 (1)	10.00	M-J	-1165 / 0	0.20 (1)
					V-W	0 / 53	0.00 (1)
B-V	0 / 1763	-18.2 -18.2	0.09 (1)	10.00	W-U	0 / 2953	0.38 (1)
V-U	0 / 1763	-18.2 -18.2	0.13 (1)	10.00	M-Y	0 / 3674	0.48 (1)
U-T	0 / 4572	-18.2 -18.2	0.28 (1)	10.00	X-Y	0 / 100	0.00 (1)
T-S	0 / 5119	-18.2 -18.2	0.30 (1)	10.00			
S-R	0 / 8371	-18.2 -18.2	0.54 (1)	10.00			
R-Q	0 / 8371	-18.2 -18.2	0.54 (1)	10.00			
Q-P	0 / 9244	-34.4 -34.4	0.60 (1)	10.00			
P-O	0 / 9244	-34.4 -34.4	0.60 (1)	10.00			
O-N	0 / 6407	-34.4 -34.4	0.39 (1)	10.00			
N-M	0 / 5669	-34.4 -34.4	0.35 (1)	10.00			
M-X	0 / 2173	-34.4 -34.4	0.16 (1)	10.00			
X-K	0 / 2173	-34.4 -34.4	0.11 (1)	10.00			

**SPECIFIED CONCENTRATED LOADS (LBS)**

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE	HEEL	CONN.
I	25-0-0	-367	-367	---	FRONT	VERT	TOTAL	---	C1
Q	16-0-12	-1359	-1359	---	FRONT	VERT	TOTAL	---	C1

**CONNECTION REQUIREMENTS**

1) C1: A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED.

**DESIGN CRITERIA**

\*\*\* SPECIAL LOADS ANALYSIS \*\*\*  
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.  
LOADS WERE DERIVED FROM USER INPUT  
NO FURTHER MODIFICATIONS WERE MADE

**SPECIFIED LOADS:**

TOP CH.	LL	=	34.8	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF	

**SPACING = 24.0 IN./C**

LOADING IN FLAT SECTION BASED ON A  
SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip  
SIDE SETBACK = 6-0-0  
END SETBACK = 6-0-0  
END WALL WIDTH = 5-8  
CORNER FRAMING TYPE: CONVENTIONAL  
END JACK TYPE: CONVENTIONAL  
APPLIED TO FRONT SIDE  
- ADDTL LOADS BASED ON 55 % OF GSL.  
LOADS APPLIED TO FIRST 14-11-4 OF SPAN  
MEASURED FROM THE RIGHT.

**\*\*\* NON STANDARD GIRDER \*\*\***

ADDTL USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.  
THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

THIS DESIGN COMPLIES WITH:  
- PART 9 OF BCBC 2018, NBC-2019AE  
- PART 9 OF OBC 2012 (2019 AMENDMENT)  
- CSA 086-14  
- TPIC 2014

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.03")  
CALCULATED VERT. DEFL.(LL)= L/999 (0.32")  
ALLOWABLE DEFL.(TL)= L/360 (1.03")  
CALCULATED VERT. DEFL.(TL)= L/678 (0.55")

CSI: TC=0.41/0.97 (F-G:1), BC=0.60/0.97 (O-Q:1)  
, WB=0.91/0.97 (I-O:1), SSI=0.38/1.00 (F-G:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00  
COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING .

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON THE  
ENGINEERING NOTES: TRUSSES. THE NOTE PAGE  
IS AN INTEGRAL PART OF THIS DRAWING AS IT  
CONTAINS SPECIFICATIONS AND CRITERIA USED  
IN THE DESIGN OF THIS COMPONENT.



JULY 14, 2023

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME	1	1	TRUSS DESC.	<b>MHP 23030</b>

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ID:bcGHXsLhLjMpVeVc\_4eeDgzAk?y-GYfJ\_zgj9YixPoc20L3ueyu5kOAa9YzTa6nWKryyE7c

PER:   
CHIEF BUILDING OFFICIAL

NAIL VALUES  
 PLATE GRIP(DRY) SHEAR SECTION  
 (PSI) (PLI) (PLI)  
 MAX MIN MAX MIN MAX MIN  
 MT20 650 371 1747 788 1987 1873  
 MT18HS 586 403 2455 1382 3163 3004

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

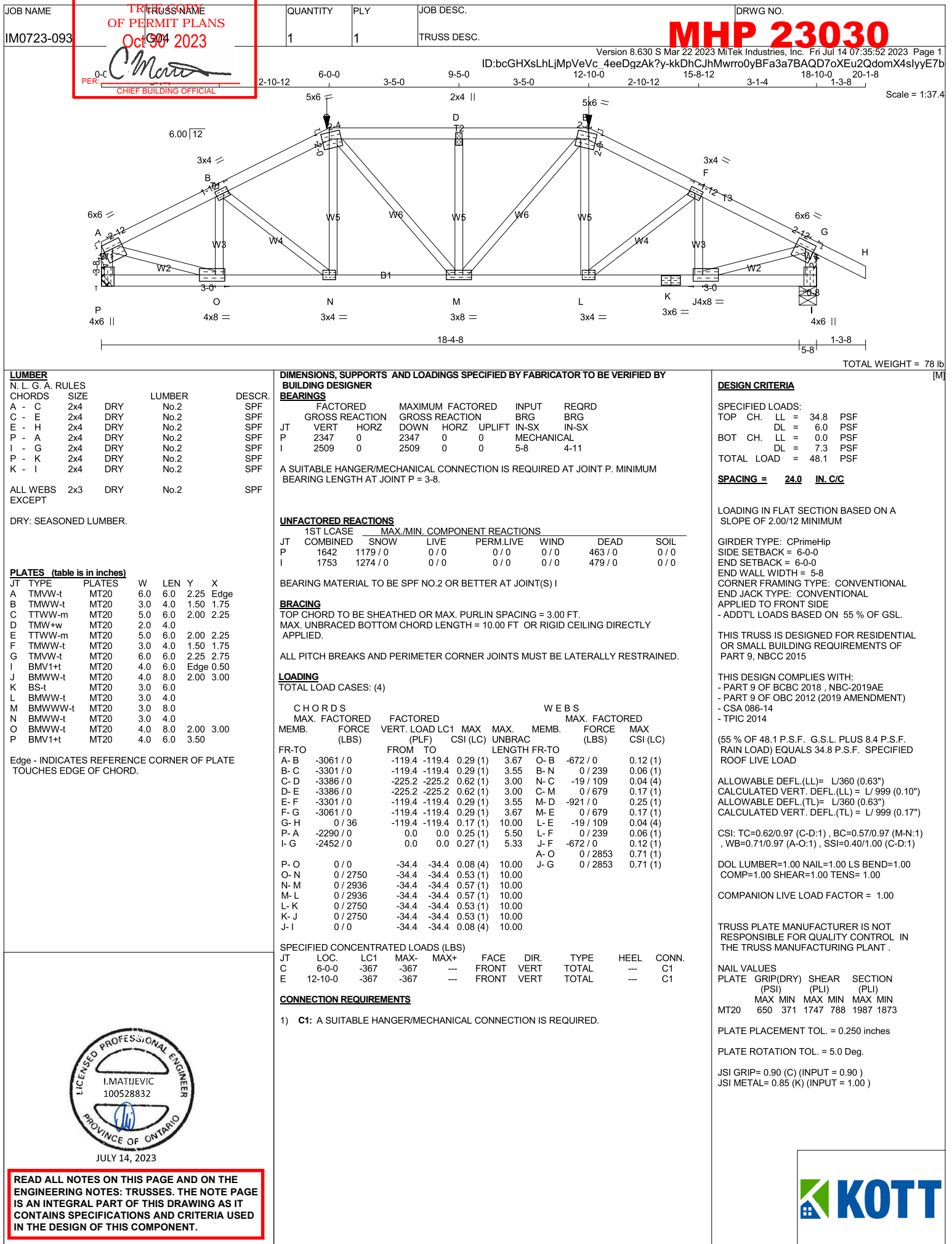
JSI GRIP= 0.90 (U) (INPUT = 0.90 )  
 JSI METAL= 0.98 (R) (INPUT = 1.00 )



JULY 14, 2023

READ ALL NOTES ON THIS PAGE AND ON THE  
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 CONTAINS SPECIFICATIONS AND CRITERIA USED  
 IN THE DESIGN OF THIS COMPONENT.







**CORPORATION OF THE CITY OF OSHAWA**

**TRUSS NAME**

**OF PERMIT PLANS**

**Oct 30 2023**

**PER: [Signature]**

**CHIEF BUILDING OFFICIAL**

**IM0723-093**

**QUANTITY** 1 **PLY** 1 **JOB DESC.** TRUSS DESC.

**DRWG NO.** **MHP 23030**

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ID:3suF8DUMbbxFEOWsk3nNlzlALn9-Cwn4Pfh\_h9zfe6mR7m5MjNzZMUCqddVYm1PGdPkyyE7a

6.00-12 2-0-0 7-1-0 4-4-12 11-5-12 3-7-4 15-1-0 2-9-4 17-10-4 2-11-12 20-10-0

Scale = 1:44.5

TOTAL WEIGHT = 107 lb

**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
Q - A	2x4	DRY	No.2 SPF
A - C	2x4	DRY	No.2 SPF
C - D	2x4	DRY	No.2 SPF
D - F	2x4	DRY	No.2 SPF
F - H	2x6	DRY	No.2 SPF
I - H	2x4	DRY	No.2 SPF
Q - K	2x4	DRY	No.2 SPF
K - I	2x4	DRY	No.2 SPF

BEARING BLOCKS

BL1	SIZE	LUMBER	DESCR.
BL1	2x6	DRY	No.2 SPF

ALL WEBS EXCEPT

J - H	SIZE	LUMBER	DESCR.
J - H	2x4	DRY	No.2 SPF

DRY: SEASONED LUMBER.

BEARING NOTE: GAP BETWEEN INSIDE OF TOP CHORD BEARING AND FIRST DIAGONAL OR VERTICAL WEB SHALL NOT EXCEED 0.5 INCHES.

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

**BEARINGS**

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG	REQRD BRG
	VERT	HORZ	DOWN	HORZ		
Q	2677	0	2677	0	MECHANICAL	
S(H)	2612	0	2612	0	MECHANICAL	

(\*\* SEE "BEARING NOTE" \*\*)

A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED AT JOINT Q, S(H). MINIMUM BEARING LENGTH AT JOINT Q = 3-8, JOINT S(H) = 5-0.

**UNFACTORED REACTIONS**

JT	1ST LCASE		MAX./MIN. COMPONENT REACTIONS		WIND	DEAD	SOIL
	COMBINED	SNOW	LIVE	PERM.LIVE			
Q	1871	1353 / 0	0 / 0	0 / 0	0 / 0	517 / 0	0 / 0
S(H)	1826	1321 / 0	0 / 0	0 / 0	0 / 0	505 / 0	0 / 0

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.53 FT.

MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (4)

MEMB.	C H O R D S		FACTORED		W E B S	FACTORED	
	MAX. FORCE (LBS)	VERT. LOAD (PLF)	LC1 MAX	UNBRACED LENGTH		MAX. FORCE (LBS)	MAX. CSI (LC)
FR-TO							
Q-A	-2535 / 0	0.0	0.0	0.71 (1)	5.25	A-P	0 / 2884
A-B	-1582 / 0	-119.4	-119.4	0.14 (1)	5.05	P-B	-1980 / 0
B-C	-2607 / 0	-119.4	-119.4	0.19 (1)	4.05	B-O	0 / 1926
C-D	-2888 / 0	-119.4	-119.4	0.20 (1)	3.87	O-C	-1429 / 0
D-E	-2877 / 0	-119.4	-119.4	0.49 (1)	3.53	C-N	-131 / 0
E-F	-2876 / 0	-119.4	-119.4	0.46 (1)	3.53	N-D	0 / 643
F-G	-2569 / 0	-119.4	-119.4	0.11 (1)	5.03	D-M	0 / 418
G-H	-2158 / 0	-119.4	-119.4	0.08 (1)	5.41	M-E	-538 / 0
I-R	0 / 139	0.0	0.0	0.42 (1)	10.00	M-F	0 / 1004
R-H	0 / 139	0.0	0.0	0.42 (1)	10.00	L-F	0 / 49
Q-P	0 / 0	-140.2	-140.2	0.14 (1)	10.00	L-G	0 / 525
P-O	0 / 1582	-140.2	-140.2	0.42 (1)	10.00	J-G	-954 / 0
O-N	0 / 2646	-140.2	-140.2	0.71 (1)	10.00	J-H	0 / 2125
N-M	0 / 2597	-140.2	-140.2	0.74 (1)	10.00	H-S	-2663 / 0
M-L	0 / 2276	-140.2	-140.2	0.68 (1)	10.00	R-S	0 / 516
L-K	0 / 1935	-140.2	-140.2	0.49 (1)	10.00		
K-J	0 / 1935	-140.2	-140.2	0.49 (1)	10.00		
J-I	0 / 308	-140.2	-140.2	0.20 (1)	10.00		

**DESIGN CRITERIA**

SPECIFIED LOADS:

TOP CH. LL = 34.8 PSF

DL = 6.0 PSF

BOT CH. LL = 0.0 PSF

DL = 7.3 PSF

TOTAL LOAD = 48.1 PSF

**SPACING = 24.0 IN. C/C**

LOADING IN ALL FLAT SECTIONS BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CStdGirder

START DISTANCE = 0-0

START SPAN CARRIED = 6-0-0

END DISTANCE = 20-10-0

END SPAN CARRIED = 6-0-0

END WALL WIDTH = 5-8

APPLIED TO FRONT SIDE OF BOTTOM CHORD.

- ADD'L LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

THIS DESIGN COMPLIES WITH:

- PART 9 OF CBC 2018, NBC-2019AE

- PART 9 OF OBC 2012 (2019 AMENDMENT)

- CSA 086-14

- TPIC 2014

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.68")

CALCULATED VERT. DEFL.(LL) = L/ 999 (0.11")

ALLOWABLE DEFL.(TL)= L/360 (0.68")

CALCULATED VERT. DEFL.(TL) = L/ 999 (0.20")

CSI: TC=0.71/0.97 (A-Q:1), BC=0.74/0.97 (M-N:1), WB=0.71/0.97 (A-P:1), SSI=0.27/1.00 (D-E:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS=1.00

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE LEFT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR	SECTION
(PSI)	(PLI)	(PLI)	(PLI)
MT20	650	371	1747
	788	1987	1873

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (A) (INPUT = 0.90 )

JSI METAL= 0.70 (P) (INPUT = 1.00 )

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW+p	MT20	5.0	6.0	2.25	1.75
B	TMWW+t	MT20	4.0	5.0	2.00	1.50
C	TTWW+m	MT20	5.0	6.0	3.00	2.00
D	TTWW-m	MT20	5.0	6.0	2.50	2.25
E	TMW+w	MT20	2.0	4.0		
F	TTWW-m	MT20	5.0	6.0	2.00	1.75
G	TMWW+t	MT20	3.0	4.0	1.75	0.75
H	TMVWK1+w	MT20	12.0	12.0	Edge	5.50
I	BMV+p	MT20	2.0	4.0		
J	BMWW-t	MT20	4.0	5.0	1.75	1.50
K	BS-t	MT20	3.0	6.0		
L	BMWW-t	MT20	3.0	4.0		
M	BMWW-t	MT20	4.0	6.0	1.75	1.50
N	BMWW+t	MT20	3.0	4.0		
O	BMWW+t	MT20	4.0	5.0	2.00	1.50
P	BMWW+t	MT20	4.0	6.0	1.50	1.50
Q	BMV1+t	MT20	4.0	6.0	3.50	
R	KP-p	MT20	3.0	6.0		3.00

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

**READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTES: TRUSSES. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.**

**LICENSED PROFESSIONAL ENGINEER**


**I.MATJJEVIC**

**100528832**

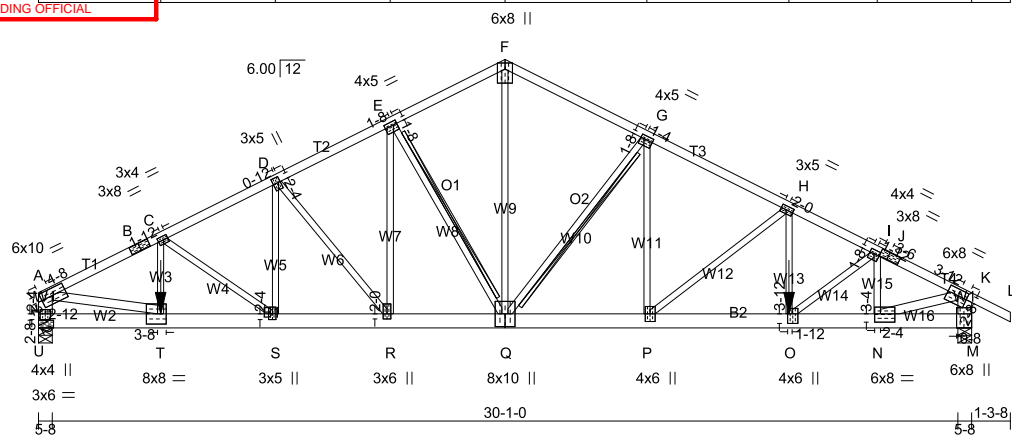
**PROVINCE OF ONTARIO**

**JULY 14, 2023**

**KOTT**

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME OF PERMIT PLANS Oct 30 2023 PER:  CHIEF BUILDING OFFICIAL	1	3	TRUSS DESC.	MHP 23030

Version 8.630 S Mar 22 2023 MiTek Industries, Inc. Fri Jul 14 07:35:54 2023 Page 1  
ID:bcGHXsLhLmPvVeVc\_4eeDgzAk?y-g7LSc?icST5WGGLdhUdbGbWXVc5UMwzvG30AxAyyE7Z  
3-9-12 7-10-8 3-9-12 11-8-4 3-9-12 15-6-0 4-8-10 20-2-10 4-8-10 24-11-4 27-10-6 31-0-0 32-3-8 3-1-10 1-3-8  
Scale = 1:76.5



TOTAL WEIGHT = 3 X 160 = 481 lb

LUMBER			
N. L. G. A. RULES	CHORDS	SIZE	LUMBER
A - B	2x4	DRY	No.2
B - F	2x4	DRY	No.2
F - J	2x4	DRY	No.2
J - L	2x4	DRY	No.2
U - A	2x6	DRY	No.2
M - K	2x6	DRY	No.2
Q - Q	2x6	DRY	No.2
U - M	2x6	DRY	No.2
ALL WEBS	2x3	DRY	No.2
EXCEPT			
A - T	2x4	DRY	No.2
N - K	2x4	DRY	No.2

DRY: SEASONED LUMBER.

DESIGN CONSISTS OF 3 TRUSSES BUILT SEPARATELY THEN FASTENED TOGETHER AS FOLLOWS:

CHORDS #ROWS	SURFACE SPACING (IN)	LOAD (PLF)
TOP CHORDS : (0.122"x3") SPIRAL NAILS		
A - B	12	SIDE(71.2)
B - F	12	SIDE(71.2)
F - J	12	TOP
J - L	12	TOP
U - A	2	TOP
M - K	2	TOP
BOTTOM CHORDS : (0.122"x3") SPIRAL NAILS		
U - Q	5	SIDE(758.4)
Q - M	2	SIDE(867.5)
WEBS : (0.122"x3") SPIRAL NAILS		
2x3	1	6
2x4	1	6

STAGGER NAILS BY HALF THE SURFACE SPACING IN ADJACENT PLIES.

GIRDER NAILING ASSUMES NAILED HANGERS ARE FASTENED WITH MIN. 3-0 INCH NAILS.

TOP - COMPONENTS ARE LOADED FROM THE TOP AND MUST BE PLACED ON TOP EDGE OF ALL PLIES FOR THE LOAD TO BE TRANSFERRED TO EACH PLY.

SIDE - PLF SHOWN IS THE EQUIVALENT UDL APPLIED TO ONE SIDE THAT THE CORRESPONDING NAILING PATTERN SHALL BE CAPABLE OF TRANSFERING. REMAINING PLF MUST BE APPLIED ON THE OPPOSITE SIDE OR ON THE TOP.

DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER			
BEARINGS			
FACTORED	MAXIMUM FACTORED	INPUT	REQD
GROSS REACTION	GROSS REACTION	BRG	BRG
JT VERT	HORZ	DOWN	HORZ
U	11948	0	11948
M	10982	0	10982

UNFACTORED REACTIONS			
1ST LCASE	MAX./MIN. COMPONENT REACTIONS		
JT COMBINED	SNOW	LIVE	PERM.LIVE
U	8350	6042 / 0	0 / 0
M	7672	5565 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) U, M  
BEARING SIZE FACTOR = 1.15 AT JNT(S) U, M ( BASED ON SUPPORT DEPTH = 1-8 )

BRACING  
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 2.28 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

2x6 DRY SPF No.2 T-BRACE AT E-Q, G-Q

FASTEN T AND I-BRACES TO NARROW EDGE OF WEB WITH ONE ROW PER PLY OF 3" COMMON WIRE NAILS @ 6" O.C. WITH 3" MINIMUM END DISTANCE. BRACE MUST COVER 90% OF WEB LENGTH.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING			
TOTAL LOAD CASES: (4)			
CHORDS		WEBS	
MEMB.	FORCE (LBS)	MEMB.	FORCE (LBS)
FR-TO	MAX. FACTORED	FR-TO	MAX. FACTORED
A-B	-18327 / 0	T-C	0 / 127
B-C	-18327 / 0	C-S	-840 / 0
C-D	-17599 / 0	S-D	0 / 2955
D-E	-15408 / 0	D-R	-3095 / 0
E-F	-12698 / 0	R-E	0 / 4957
F-G	-12716 / 0	E-Q	-4873 / 0
G-H	-16357 / 0	Q-F	0 / 10907
H-I	-18608 / 0	Q-G	-5410 / 0
I-J	-15560 / 0	P-G	0 / 5305
J-K	-15560 / 0	P-H	-2594 / 0
K-L	0 / 36	O-H	0 / 2167
U-A	-11779 / 0	O-I	0 / 3521
M-K	-10757 / 0	N-I	-3879 / 0
		A-T	0 / 16703
		N-K	0 / 14329

SPECIFIED CONCENTRATED LOADS (LBS)			
JT	LOC.	LC1	MAX.
O	24-11-4	-1890	-1890
T	4-0-12	-1642	-1642


CONNECTION REQUIREMENTS			
1)	C1:	A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED.	

DESIGN CRITERIA			
*** SPECIAL LOADS ANALYSIS ***			
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.			
LOADS WERE DERIVED FROM USER INPUT			
NO FURTHER MODIFICATIONS WERE MADE			
SPECIFIED LOADS:			
TOP CH.	LL	=	34.8 PSF
	DL	=	6.0 PSF
BOT CH.	LL	=	0.0 PSF
	DL	=	7.3 PSF
TOTAL LOAD		=	48.1 PSF
SPACING = 24.0 IN./C			
GIRDER TYPE: CPrimeHip			
SIDE SETBACK = 0-0			
END SETBACK = 6-0-0			
END WALL WIDTH = 0-0			
CORNER FRAMING TYPE: CONVENTIONAL			
END JACK TYPE: CONVENTIONAL			
APPLIED TO FRONT SIDE			
- ADDTL LOADS BASED ON 55 % OF GSL.			
LOADS APPLIED TO FIRST 4-0-12 OF SPAN			
MEASURED FROM THE LEFT.			
GIRDER TYPE: CStdGirder			
START DISTANCE = 4-0-12			
START SPAN CARRIED = 18-10-0			
END DISTANCE = 11-6-4			
END SPAN CARRIED = 18-10-0			
END WALL WIDTH = 5-8			
APPLIED TO FRONT SIDE OF BOTTOM CHORD.			
- ADDTL LOADS BASED ON 55 % OF GSL.			
GIRDER TYPE: CStdGirder			
START DISTANCE = 11-5-8			
START SPAN CARRIED = 20-10-0			
END DISTANCE = 24-11-4			
END SPAN CARRIED = 20-10-0			
END WALL WIDTH = 0-0			
APPLIED TO FRONT SIDE OF BOTTOM CHORD.			
- ADDTL LOADS BASED ON 55 % OF GSL.			
*** NON STANDARD GIRDER ***			
ADDTL USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.			
THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015			
THIS DESIGN COMPLIES WITH:			
- PART 9 OF BCBC 2018, NBC-2019AE			
- PART 9 OF OBC 2012 (2019 AMENDMENT)			
- CSA 086-14			
- TPIC 2014			
(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD			
ALLOWABLE DEFL.(LL)= L/360 (1.03")			
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.27")			
ALLOWABLE DEFL.(TL)= L/360 (1.03")			
CALCULATED VERT. DEFL.(TL) = L/ 794 (0.47")			
CSI: TC=0.76/0.97 (A-C:1) , BC=0.97/0.97 (O-P:1) , WB=0.89/0.97 (A-T:1) , SSI=0.38/1.00 (P-Q:1)			

CONTINUED ON PAGE 2

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTES: TRUSSES. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

LICENSED PROFESSIONAL ENGINEER  
I.MATJJEVIC  
100528832  
PROVINCE OF ONTARIO  
JULY 14, 2023



JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME OF PERMIT PLANS Oct 30 2023	1	3	TRUSS DESC.	<b>MHP 23030</b>

Version 8.630 S Mar 22 2023 MiTek Industries, Inc. Fri Jul 14 07:35:54 2023 Page 2

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PER:   
CHIEF BUILDING OFFICIAL**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW-t	MT20	6.0	10.0	2.75	4.50
B	TS-t	MT20	3.0	8.0		
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TMWW+t	MT20	3.0	5.0	2.25	0.75
E	TMWW-t	MT20	4.0	5.0	1.50	1.50
F	TTW+p	MT20	6.0	8.0	Edge	
G	TMWW-t	MT20	4.0	5.0	1.50	1.25
H	TMWW-t	MT20	3.0	5.0	1.50	2.00
I	TMWW-t	MT20	4.0	4.0	1.50	1.75
J	TS-t	MT20	3.0	8.0	1.50	3.25
K	TMVW-t	MT20	6.0	8.0	2.50	3.75
M	BMV1+t	MT20	6.0	8.0	Edge	0.50
N	BMWW-t	MT20	6.0	8.0	3.25	2.25
O	BMWW+t	MT20	4.0	6.0	3.75	1.75
P	BMWW+t	MT20	4.0	6.0		
Q	BSWWW+t	MT20	8.0	10.0		
R	BMWW+t	MT20	3.0	6.0	2.00	1.50
S	BMWW+t	MT20	3.0	5.0	2.25	1.50
T	BMWW-t	MT20	8.0	8.0	4.00	3.50
U	BMV1+p	MT20	4.0	4.0	2.25	2.00
U	TP-t	MT20	3.0	6.0	2.50	2.75

Edge - INDICATES REFERENCE CORNER OF PLATE  
TOUCHES EDGE OF CHORD.DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT  
RESPONSIBLE FOR QUALITY CONTROL IN  
THE TRUSS MANUFACTURING PLANT .

## NAIL VALUES

PLATE	GRIP(DRY)	SHEAR	SECTION
	(PSI)	(PLI)	(PLI)
	MAX MIN	MAX MIN	MAX MIN
MT20	650 371	1747 788	1987 1873

PLATE PLACEMENT TOL. = 0.250 inches

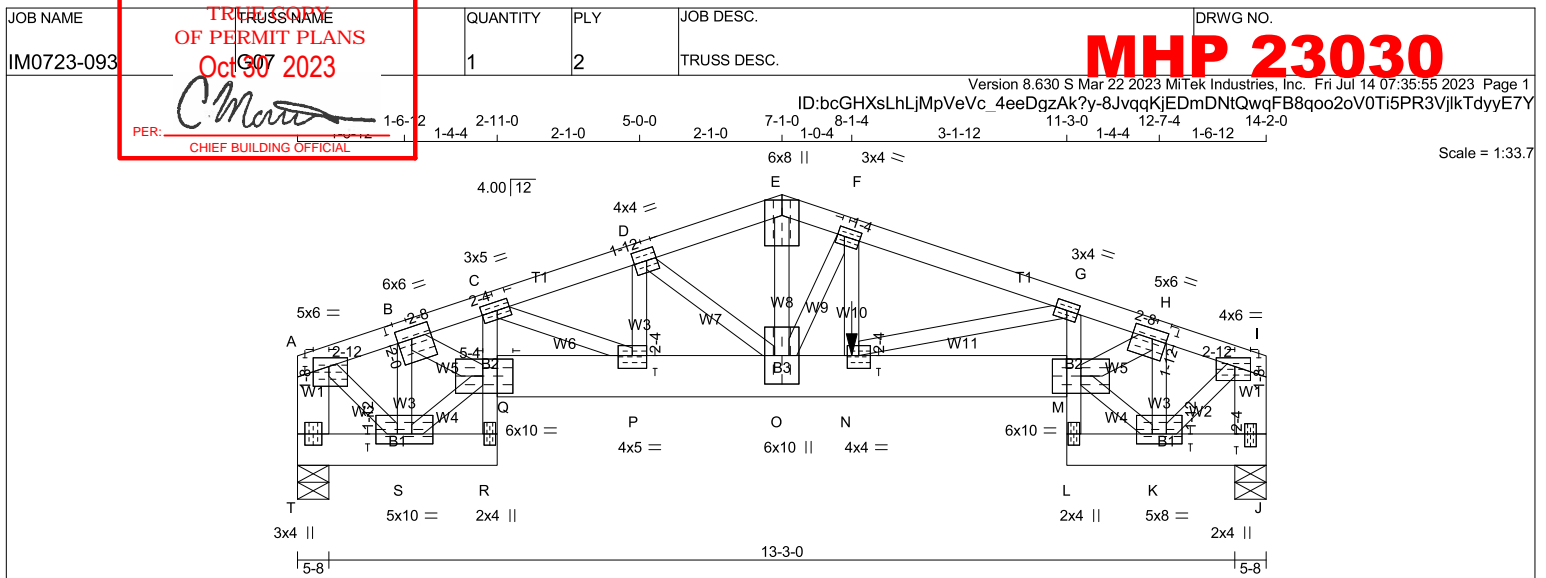
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (P) (INPUT = 0.90 )  
JSI METAL= 0.93 (K) (INPUT = 1.00 )

JULY 14, 2023

READ ALL NOTES ON THIS PAGE AND ON THE  
ENGINEERING NOTES: TRUSSES. THE NOTE PAGE  
IS AN INTEGRAL PART OF THIS DRAWING AS IT  
CONTAINS SPECIFICATIONS AND CRITERIA USED  
IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 2 X 75 = 150 lb

## LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
A - E	2x4	DRY	2100F 1.8E	SPF
E - I	2x4	DRY	2100F 1.8E	SPF
T - A	2x6	DRY	No.2	SPF
J - I	2x6	DRY	No.2	SPF
T - R	2x6	DRY	2100F 1.8E	SPF
R - C	2x3	DRY	No.2	SPF
Q - M	2x8	DRY	No.2	SPF
L - G	2x3	DRY	No.2	SPF
L - J	2x6	DRY	2100F 1.8E	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF
B - Q	2x4	DRY	No.2	SPF
M - H	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

DESIGN CONSISTS OF 2 TRUSSES BUILT SEPARATELY THEN FASTENED TOGETHER AS FOLLOWS:

CHORDS #ROWS	SURFACE SPACING (IN)	LOAD(PLF)
TOP CHORDS : (0.122"x3") SPIRAL NAILS		
A - E	12	TOP
E - I	12	TOP
T - A	12	TOP
J - I	12	TOP
BOTTOM CHORDS : (0.122"x3") SPIRAL NAILS		
T - R	8	SIDE(324.1)
L - J	12	TOP
R - C	12	TOP
G - L	12	TOP
Q - M	8	SIDE(324.1)
WEBS : (0.122"x3") SPIRAL NAILS		
2x3	6	
2x4	6	

NAILS TO BE DRIVEN FROM ONE SIDE ONLY.

GIRDER NAILING ASSUMES NAILED HANGERS ARE FASTENED WITH MIN. 3-0 INCH NAILS.

TOP - COMPONENTS ARE LOADED FROM THE TOP AND MUST BE PLACED ON TOP EDGE OF ALL PLIES FOR THE LOAD TO BE TRANSFERRED TO EACH PLY.

SIDE - PLF SHOWN IS THE EQUIVALENT UDL APPLIED TO ONE SIDE THAT THE CORRESPONDING NAILING PATTERN SHALL BE CAPABLE OF TRANSFERING. REMAINING PLF MUST BE APPLIED ON THE OPPOSITE SIDE OR ON THE TOP.

## DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

## BEARINGS

	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION			INPUT BRG	REQRD BRG
JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
T	5844	0	5844	0	0	5-8	2-12
J	3973	0	3973	0	0	5-8	1-14

## UNFACTORED REACTIONS

	1ST LCASE	MAX./MIN. COMPONENT REACTIONS					
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
T	4084	2955 / 0	0 / 0	0 / 0	0 / 0	1129 / 0	0 / 0
J	2776	2009 / 0	0 / 0	0 / 0	0 / 0	768 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) T, J  
BEARING SIZE FACTOR = 1.15 AT JNT(S) T, J (BASED ON SUPPORT DEPTH = 1-8)

## BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.25 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 7.81 FT. OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

## LOADING

TOTAL LOAD CASES: (4)

CHORDS	MAX. FACTORED	FACTORED	W E B S	MAX. FACTORED
MEMB.	FORCE (LBS)	VERT. LOAD LC1	MAX. UNBRACED LENGTH	MEMB. FORCE (LBS)
FR-TO				
A - B	-4711 / 0	-119.4 -119.4	0.15 (1)	5.16
B - C	-12584 / 0	-119.4 -119.4	0.29 (1)	3.25
C - D	-10880 / 0	-119.4 -119.4	0.24 (1)	3.55
D - E	-9353 / 0	-119.4 -119.4	0.13 (1)	3.92
E - F	-9330 / 0	-119.4 -119.4	0.13 (1)	3.92
F - G	-9950 / 0	-119.4 -119.4	0.23 (1)	3.72
G - H	-10137 / 0	-119.4 -119.4	0.20 (1)	3.70
H - I	-3441 / 0	-119.4 -119.4	0.11 (1)	5.87
T - A	-5168 / 0	0.0 0.0	0.19 (1)	6.34
J - I	-3806 / 0	0.0 0.0	0.14 (1)	7.16
T - S	0 / 0	-666.5 -666.5	0.07 (1)	10.00
S - R	0 / 181	-666.5 -666.5	0.06 (1)	10.00
R - Q	0 / 611	0.0 0.0	0.36 (1)	10.00
Q - C	0 / 1273	0.0 0.0	0.44 (1)	10.00
Q - P	0 / 12123	-666.5 -666.5	0.84 (1)	10.00
P - O	0 / 10348	-666.5 -666.5	0.71 (1)	10.00
O - N	0 / 9435	-666.5 -666.5	0.76 (1)	10.00
N - M	0 / 9796	-18.2 -18.2	0.78 (1)	10.00
L - M	0 / 201	0.0 0.0	0.25 (1)	10.00
M - G	-215 / 0	0.0 0.0	0.23 (1)	7.81
L - K	0 / 143	-18.2 -18.2	0.05 (1)	10.00
K - J	0 / 0	-18.2 -18.2	0.05 (1)	10.00

## SPECIFIED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE	HEEL	CONN.
N	8-14	-1826	-1826	---	FRONT	VERT	TOTAL	---	C1

## CONNECTION REQUIREMENTS

1) C1: A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED.

## DESIGN CRITERIA

\*\*\* SPECIAL LOADS ANALYSIS \*\*\*  
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.  
LOADS WERE DERIVED FROM USER INPUT  
NO FURTHER MODIFICATIONS WERE MADE

## SPECIFIED LOADS:

TOP CH. LL	=	34.8	PSF
DL	=	6.0	PSF
BOT CH. LL	=	0.0	PSF
DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF

## SPACING = 24.0 IN./C

GIRDER TYPE: CStd Girder  
START DISTANCE = 0-0  
START SPAN CARRIED = 20-10-0  
END DISTANCE = 8-1-4  
END SPAN CARRIED = 20-10-0  
END WALL WIDTH = 0-0  
APPLIED TO FRONT SIDE OF BOTTOM CHORD.  
- ADDTL LOADS BASED ON 55 % OF GSL.

## \*\*\* NON STANDARD GIRDER \*\*\*

ADDTL USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

## THIS DESIGN COMPLIES WITH:

- PART 9 OF BCBC 2018 , NBC-2019AE  
- PART 9 OF OBC 2012 (2019 AMENDMENT)  
- CSA 086-14  
- TPIC 2014

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.47")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.12")  
ALLOWABLE DEFL.(TL) = L/360 (0.47")  
CALCULATED VERT. DEFL.(TL) = L/817 (0.21")

CSI: TC=0.29/0.97 (B-C:1) , BC=0.84/0.97 (P-Q:1)  
WB=0.75/0.97 (B-Q:1) , SSI=0.56/1.00 (N-O:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00  
COMP=1.00 SHEAR=1.00 TENS=1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

## NAIL VALUES

PLATE	GRIP(DRY) (PSI)		SHEAR (PLI)		SECTION (PLI)	
	MAX	MIN	MAX	MIN	MAX	MIN
MT20	650	371	1747	788	1987	1873

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTES: TRUSSES. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.



JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME	1	2	TRUSS DESC.	MHP 23030

OF PERMIT PLANS

Oct 30 2023

PER:   
CHIEF BUILDING OFFICIAL

Version 8.630 S Mar 22 2023 MiTek Industries, Inc. Fri Jul 14 07:35:55 2023 Page 2

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## PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW-p	MT20	5.0	6.0	1.50	2.75
B	TMWW-t	MT20	6.0	6.0	2.00	2.50
C	TMVW-t	MT20	3.0	5.0	1.50	2.25
D	TMWW-t	MT20	4.0	4.0	2.00	1.75
E	TTW+p	MT20	6.0	8.0	Edge	
F	TMWW-t	MT20	3.0	4.0	1.50	1.25
G	TMVW-t	MT20	3.0	4.0		
H	TMWW-t	MT20	5.0	6.0	1.75	2.50
I	TMVW-p	MT20	4.0	6.0	1.50	2.75
J	BMV1+p	MT20	2.0	4.0	2.25	1.00
K	BMWWW-t	MT20	5.0	8.0	1.75	4.00
L	BMV+p	MT20	2.0	4.0		
M	BVMWW-l	MT20	6.0	10.0		
N	BMWW-t	MT20	4.0	4.0	2.25	2.00
O	BMWWW+t	MT20	6.0	10.0		
P	BMWW-t	MT20	4.0	5.0	2.25	2.50
Q	BVMWW-l	MT20	6.0	10.0	3.00	5.25
R	BMV+p	MT20	2.0	4.0		
S	BMWWW-t	MT20	5.0	10.0	1.75	5.00
T	BMV1+p	MT20	3.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE  
TOUCHES EDGE OF CHORD.JSI GRIP= 0.89 (B) (INPUT = 0.90 )  
JSI METAL= 0.90 (B) (INPUT = 1.00 )

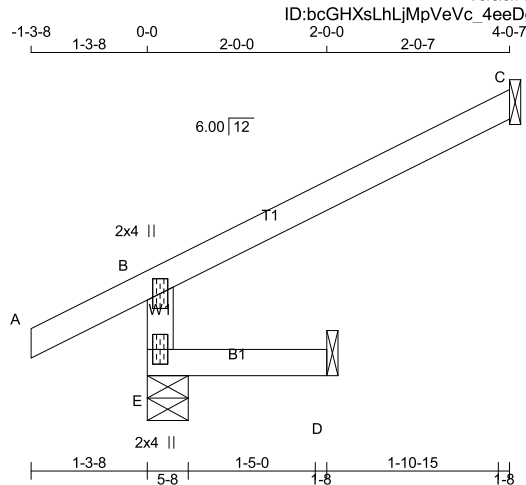
JULY 14, 2023

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IN THE DESIGN OF THIS COMPONENT.



JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME	3	1	TRUSS DESC.	MHP 23030

PER:   
CHIEF BUILDING OFFICIAL



Scale = 1:25.7

TOTAL WEIGHT = 3 X 10 = 30 lb

**LUMBER**

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
E - B	2x4	DRY	No.2	SPF
A - C	2x4	DRY	No.2	SPF
E - D	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
B	TMV+p	MT20	2.0	4.0		
E	BMV1+p	MT20	2.0	4.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER****BEARINGS**

	FACTORED GROSS REACTION	MAXIMUM FACTORED GROSS REACTION	INPUT BRG	REQRD BRG
JT	VERT	HORZ	DOWN	HORZ
E	483	0	483	0
C	181	0	181	0
D	16	0	16	0

SEE MITEK STANDARD DETAIL MSD2015-H FOR CONNECTION TO JOINT(S) C, D

**UNFACTORED REACTIONS**

JT	1ST LCASE	MAX./MIN.	COMPONENT REACTIONS
JT	COMBINED	SNOW	LIVE
E	333	270 / 0	0 / 0
C	124	105 / 0	0 / 0
D	13	0 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) E

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (4)

MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH
FR-TO		FROM	TO		FR-TO		
E-B	-463 / 0	0.0	0.0	0.01 (4)	7.81		
A-B	0 / 36	-119.4	-119.4	0.16 (1)	10.00		
B-C	-27 / 0	-119.4	-119.4	0.33 (1)	6.25		
E-D	0 / 0	-18.2	-18.2	0.02 (4)	10.00		

**DESIGN CRITERIA****SPECIFIED LOADS:**

TOP CH.	LL	=	34.8	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF	

**SPACING = 24.0 IN. C/C**

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

**THIS DESIGN COMPLIES WITH:**

- PART 9 OF BCBC 2018, NBC-2019AE
- PART 9 OF OBC 2012 (2019 AMENDMENT)
- CSA 086-14
- TPIC 2014

**DESIGN ASSUMPTIONS**

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.00")  
ALLOWABLE DEFL.(TL)= L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.00")

CSI: TC=0.33/0.97 (B-C:1), BC=0.02/0.97 (D-E:4), WB=0.00/0.97 (n/a:0), SSI=0.21/1.00 (B-C:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**

PLATE	GRIP(DRY) (PSI)	SHEAR (PLI)	SECTION (PLI)
	MAX	MIN	MAX
MT20	650	371	1747

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.26 (B) (INPUT = 0.90 )  
JSI METAL= 0.19 (B) (INPUT = 1.00 )



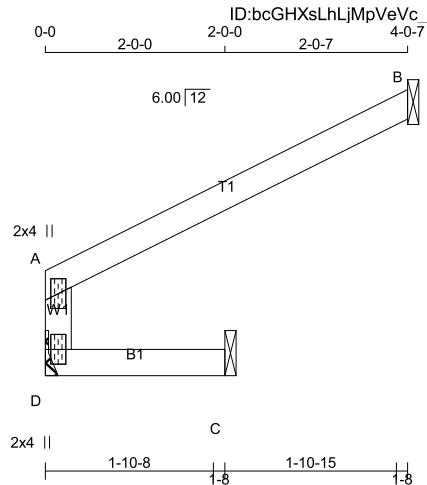
JULY 14, 2023

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JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	JO A	2	1	TRUSS DESC.	<b>MHP 23030</b>

PER:   
CHIEF BUILDING OFFICIAL



Scale = 1:25.7

TOTAL WEIGHT = 2 X 8 = 17 lb

LUMBER				
N. L. G. A. RULES	SIZE	LUMBER	DESCR.	SPF
D - A	2x4	DRY	No.2	SPF
A - B	2x4	DRY	No.2	SPF
D - C	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
A	TMV+p	MT20	2.0	4.0		
D	BMV1+p	MT20	2.0	4.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER****BEARINGS**

JT	FACTORED GROSS REACTION	MAXIMUM FACTORED GROSS REACTION	INPUT BRG	REQRD BRG
	VERT	HORZ	DOWN	HORZ
D	229	0	229	0
B	212	0	212	0
C	78	0	78	0

A SUITABLE HANGER/MECHANICAL CONNECTION IS REQUIRED AT JOINT D. MINIMUM BEARING LENGTH AT JOINT D = 1-8.

SEE MITEK STANDARD DETAIL MSD2015-H FOR CONNECTION TO JOINT(S) B , C

**UNFACTORED REACTIONS**

JT	1ST LCASE COMBINED	MAX./MIN. SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
D	159	123 / 0	0 / 0	0 / 0	0 / 0	36 / 0	0 / 0
B	145	123 / 0	0 / 0	0 / 0	0 / 0	22 / 0	0 / 0
C	55	35 / 0	0 / 0	0 / 0	0 / 0	20 / 0	0 / 0

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (4)

C H O R D S				W E B S			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX LC1 (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH
FR-TO					FR-TO		
D-A	-270 / 0	0.0	0.0	0.14 (1)	7.81		
A-B	-13 / 0	-119.4	-119.4	0.24 (1)	6.25		
D-C	0 / 0	-18.2	-18.2	0.16 (1)	10.00		

**DESIGN CRITERIA****SPECIFIED LOADS:**

TOP CH.	LL	=	34.8	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF	

**SPACING = 24.0 IN. C/C**

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

**THIS DESIGN COMPLIES WITH:**

- PART 9 OF BCBC 2018 , NBC-2019AE
- PART 9 OF OBC 2012 (2019 AMENDMENT)
- CSA 086-14
- TPIC 2014

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.00")  
ALLOWABLE DEFL.(TL)= L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.01")

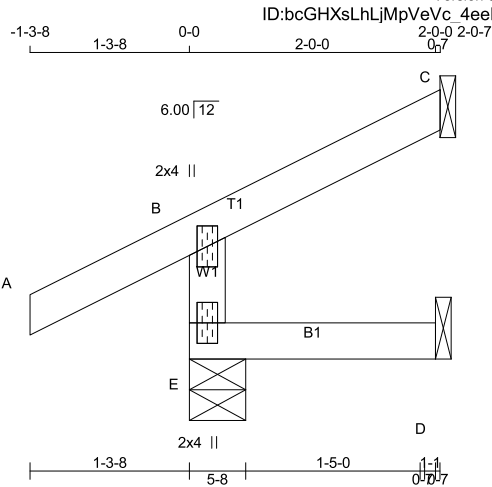
CSI: TC=0.24/0.97 (A-B:1) , BC=0.16/0.97 (C-D:1) ,  
WB=0.00/0.97 (n/a:0) , SSI=0.19/1.00 (A-B:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
IM0723-093	TRUSS NAME	3	1	TRUSS DESC.	MHP 23030

PER:   
CHIEF BUILDING OFFICIAL



Scale = 1:18.7

TOTAL WEIGHT = 3 X 7 = 22 lb

**LUMBER**

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
E - B	2x4	DRY	No.2	SPF
A - C	2x4	DRY	No.2	SPF
E - D	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
B	TMV+p	MT20	2.0	4.0		
E	BMV1+p	MT20	2.0	4.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER****BEARINGS**

	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION			INPUT BRG	REQRD BRG
JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
E	334	0	334	0	0	5-8	1-8
C	92	0	92	0	0	1-8	1-8
D	16	0	18	0	0	1-8	1-8

SEE MITEK STANDARD DETAIL MSD2015-H FOR CONNECTION TO JOINT(S) C , D

**UNFACTORED REACTIONS**

1ST LCASE	MAX./MIN. COMPONENT REACTIONS						
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
E	230	183 / 0	0 / 0	0 / 0	0 / 0	48 / 0	0 / 0
C	63	54 / 0	0 / 0	0 / 0	0 / 0	9 / 0	0 / 0
D	13	0 / 0	0 / 0	0 / 0	0 / 0	13 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) E

**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE Laterally RESTRAINED.

**LOADING**

TOTAL LOAD CASES: (5)

C H O R D S				W E B S			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH
FR-TO					FR-TO		
E-B	-313 / 0	0.0	0.0	0.01 (4)	7.81		
A-B	0 / 36	-119.4	-119.4	0.16 (1)	10.00		
B-C	-13 / 0	-119.4	-119.4	0.08 (1)	6.25		
E-D	0 / 0	-18.2	-18.2	0.02 (4)	10.00		

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN

PATTERN-LOADING CHECK APPLIED TO THIS TRUSS.

**DESIGN CRITERIA****SPECIFIED LOADS:**

TOP CH.	LL	=	34.8	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.3	PSF
TOTAL LOAD	=	48.1	PSF	

**SPACING = 24.0 IN. C/C**

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2015

**THIS DESIGN COMPLIES WITH:**

- PART 9 OF BCBC 2018 , NBC-2019AE
- PART 9 OF OBC 2012 (2019 AMENDMENT)
- CSA 086-14
- TPIC 2014

**DESIGN ASSUMPTIONS**

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 48.1 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 34.8 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(TL)= L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.00")

CSI: TC=0.16/0.97 (A-B:1) , BC=0.02/0.97 (D-E:4) ,  
WB=0.00/0.97 (n/a:0) , SSI=0.11/1.00 (A-B:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

**NAIL VALUES**

PLATE	GRIP(DRY)	SHEAR	SECTION
	(PSI)	(PLI)	(PLI)
	MAX	MIN	MAX
MT20	650	371	1747
	788	1987	1873

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.18 (B) (INPUT = 0.90 )  
JSI METAL= 0.13 (B) (INPUT = 1.00 )



JULY 14, 2023

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTES: TRUSSES. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

