

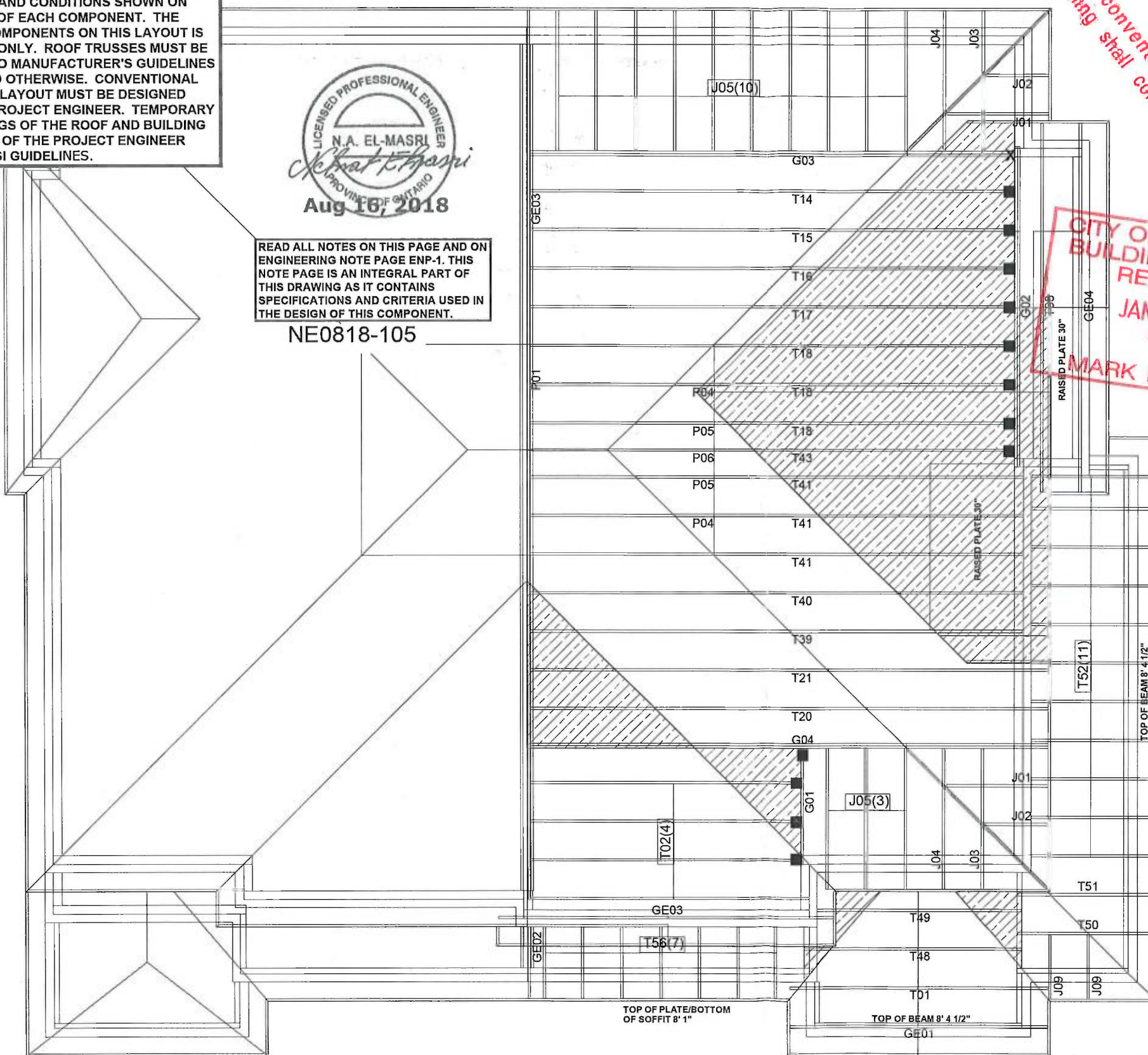
ROOF TRUSSES 18-411388 000 001R

THIS CERTIFICATION IS FOR THE ENGINEERING REVIEW OF STRUCTURAL COMPONENTS SHOWN ON THIS DRAWING AND IS LIMITED TO THE COMPONENTS SUPPLIED BY KOTT LUMBER FOR THE LOADS AND CONDITIONS SHOWN ON THE CALCULATION PAGE OF EACH COMPONENT. THE PLACEMENT OF THESE COMPONENTS ON THIS LAYOUT IS SHOWN FOR REFERENCE ONLY. ROOF TRUSSES MUST BE INSTALLED ACCORDING TO MANUFACTURER'S GUIDELINES AT 24" C/C UNLESS NOTED OTHERWISE. CONVENTIONAL FRAMING SHOWN ON THE LAYOUT MUST BE DESIGNED AND APPROVED BY THE PROJECT ENGINEER. TEMPORARY AND PERMANENT BRACINGS OF THE ROOF AND BUILDING ARE THE RESPONSIBILITY OF THE PROJECT ENGINEER AND TO CONFORM TO BCSI GUIDELINES.



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

NE0818-105



For conventional wood framing framing shall conform to OBC.9.23

CITY OF BRAMPTON
BUILDING DIVISION
REVIEWED
JAN 08 2019
BY
MARK DERKSEN

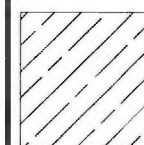
All work shall conform to the Ontario Building Code O. Reg. 332/12 as amended



DESIGN CRITERIA
SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3 PSF
BOT CH. LL = 0 PSF
DL = 7 PSF
TOTAL LOAD = 33.3 PSF
SPACING = 24" O/C.
THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010
THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

HANGER LEGEND:

▼ LUS24 ■ LJS26DS
● HGUS26 X HGUS26-2



CONVENTIONAL FRAMING BY OTHERS

SIZE AND LOCATION OF CONVENTIONAL FRAMING IS APPROXIMATE. ALL AREAS MAY NOT BE SHOWN. REFER TO ARCHITECTURAL PLANS FOR DETAILS.

ALL CONVENTIONAL FRAMING TO CONFORM WITH PART 9 OF THE O.B.C.
ROOF RAFTERS THAT CROSS MEET OVER TRUSSES TO BE 2x4 S.P.F. @ 24" O/C WITH A 2x4 VERTICAL POST TO THE TRUSS UNDERNEATH EACH CROSS POINT. VERTICAL POST LONGER THAN 6' TO HAVE LATERAL BRACING SO THAT THE DISTANCE BETWEEN END POINT AND BETWEEN ROWS OF BRACING DOES NOT EXCEED 6'.

18-411388 000 001R
Lot 11R

Model: **HEMLOCK 5C EL 2**

Customer: GREENPARK

Project: MINNISALE HOMES

Location: BRAMPTON

Date: 6/25/2018 Drawn by: BB

Architectural Drawing Info:
Date: MAY, 2018
Project number: 18012
Model: HEMLOCK 5C

ENGINEERING NOTE PAGE (ENP-1)
PLEASE READ PRIOR TO INSTALLATION

HEMLOCK SC-BL 2 - Lot 11 R

RESPONSIBILITIES

THIS DESIGN IS FOR AN INDIVIDUAL BUILDING COMPONENT AND HAS BEEN BASED ON INFORMATION PROVIDED BY THE DESIGN OFFICE OF KOTT LUMBER. THE UNDERSIGNED ENGINEER DISCLAIMS ANY RESPONSIBILITY FOR DAMAGES AS A RESULT OF FAULTY OR INCORRECT INFORMATION, SPECIFICATION AND/OR DESIGNS FURNISHED TO THE ENGINEER. THE UNDERSIGNED ENGINEER IS ONLY RESPONSIBLE FOR THE STRUCTURAL INTEGRITY OF THIS BUILDING COMPONENT FOR THE CONDITIONS AND LOADS SHOWN ON THIS DRAWING. THE STRUCTURAL INTEGRITY OF THE BUILDING AND THE VERIFICATION OF THE DIMENSIONS AND THE DESIGN LOADS USED ARE THE RESPONSIBILITY OF THE BUILDING DESIGNER.

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

IT IS THE RESPONSIBILITY OF KOTT LUMBER 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.

USE AND OCCUPANCY

- The building is of the type indicated on the drawing

LOADING

- 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 metres (16 ft) whichever is greater, unless the drawing indicates that the snow drifting has been taken into account

HANDLING, INSTALLATION AND BRACING

- 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
- The compression chords are laterally braced by continuous rigid diaphragm sheathing or as specified on the drawing
- 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
- **It is recommended that a Professional Engineer's advice be obtained for the bracing of trusses spanning more than 12.37m (40'-7")**

SUPPORTS

- 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.

DIMENSIONS

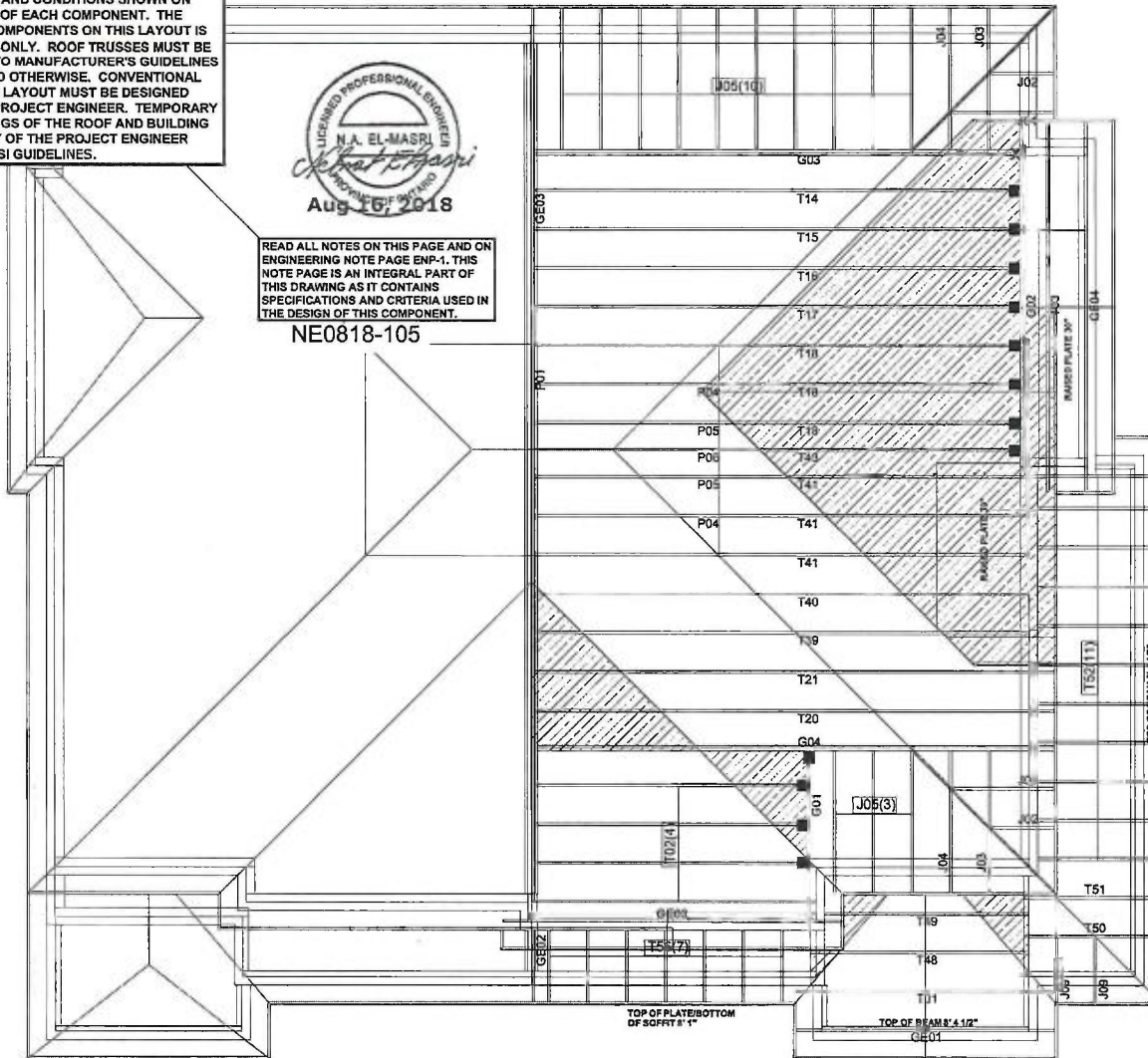
- Geometry of the truss and dimensions indicated on the drawing are identical to those of the installed truss.

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NE0818-105



DESIGN CRITERIA
SPECIFIED LOADS:
TOP CH. LL = 33.3 PSF
DL = 3 PSF
BOT CH. LL = 0 PSF
DL = 7 PSF
TOTAL LOAD = 33.3 PSF
SPACING = 24" O.C.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
• PART 9 OF OBC 2012, CBC 2012, ABC 2014
• CSA 085-09
• TPC 2011

HANGER LEGEND:

▼ LUS24 ■ LJS26DS
● HGUS26 ✕ HGUS26-2



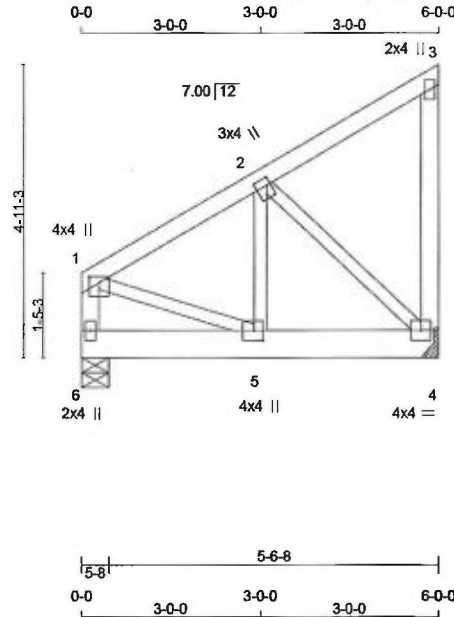
CONVENTIONAL FRAMING BY OTHERS

SIZE AND LOCATION OF CONVENTIONAL FRAMING IS APPROXIMATE. ALL AREAS MAY NOT BE SHOWN. REFER TO ARCHITECTURAL PLANS FOR DETAILS.

ALL CONVENTIONAL FRAMING TO CONFORM WITH PART 9 OF THE O.B.C.
ROOF RAFTERS THAT CROSS MEET OVER TRUSSES TO BE 2x4 S.P.F. @ 24" O/C WITH A 2x4 VERTICAL POST TO THE TRUSS UNDERNEATH EACH CROSS POINT. VERTICAL POST LONGER THAN 6' TO HAVE LATERAL BRACING SO THAT THE DISTANCE BETWEEN END POINT AND BETWEEN ROWS OF BRACING DOES NOT EXCEED 6'.

Model: **HEMLOCK 5C EL 2**
Customer: **GREENPARK**
Project: **MINNISALE HOMES**
Location: **BRAMPTON**
Date: **6/25/2018** Drawn by: **BB**

Architectural Drawing Info:
Date: MAY, 2018
Project number: 18012
Model: HEMLOCK 5C



Scale = 1:37.0

TOTAL WEIGHT = 32 lb [M]

LUMBER					DESCR.	
N. L. G. A. RULES	CHORDS	SIZE	LUMBER		SPF	
6 - 1	2x4	DRY	No.2		SPF	
1 - 3	2x4	DRY	No.2		SPF	
4 - 3	2x4	DRY	No.2		SPF	
6 - 4	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
1	TMVW+p	MT20	4.0	4.0	1.25	2.00
2	TMWW+t	MT20	3.0	4.0	1.50	0.75
3	TMV+p	MT20	2.0	4.0		
4	BMVW1-t	MT20	4.0	4.0		
5	BMWW+t	MT20	4.0	4.0	2.00	1.75
6	BMV1+p	MT20	2.0	4.0		

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

BEARINGS		FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
JT	VERT	HORZ	GROSS REACTION	DOWN	HORZ	BRG	BRG	IN-SX	IN-SX
6	1106	0	1106	0	0	5-8	5-8		
4	1106	0	1106	0	0	MECHANICAL			

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 4 TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

JT	1ST LCASE	MAX/MIN. COMPONENT REACTIONS							
	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL		
6	776	543 / 0	0 / 0	0 / 0	0 / 0	233 / 0	0 / 0		
4	776	543 / 0	0 / 0	0 / 0	0 / 0	233 / 0	0 / 0		

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6

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)

CHORDS		FACTORED		WEBS		FACTORED	
MEMB.	FORCE (LBS)	VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MEMB.	FORCE (LBS)	MAX. UNBRAC LENGTH	MAX. FACTORED CSI (LC)
FR-TO		FROM TO		FR-TO			
6-1	-744 / 0	0.0	0.0 0.08 (1)	7.81	1-5	0 / 743	0.18 (1)
1-2	-801 / 0	-77.4	-77.4 0.12 (1)	6.25	5-2	0 / 781	0.19 (1)
2-3	-12 / 0	-77.4	-77.4 0.11 (1)	6.25	2-4	-958 / 0	0.26 (1)
4-3	-92 / 0	0.0	0.0 0.03 (1)	7.81			
6-5	0 / 0	-291.2	-291.2 0.17 (1)	10.00			
5-4	0 / 703	-291.2	-291.2 0.26 (1)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

GIRDER TYPE: CStdGirder
START DISTANCE = 0-0
START SPAN CARRIED = 14-0-0
END DISTANCE = 6-0-0
END SPAN CARRIED = 14-0-0
END WALL WIDTH = 5-8
APPLIED TO FRONT SIDE OF BOTTOM CHORD.
- ADDTL LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.20")
CALCULATED VERT. DEFL.(LL)= L/999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.20")
CALCULATED VERT. DEFL.(TL)= L/999 (0.02")

CSI: TC=0.12/1.00 (1-2:1), BC=0.26/1.00 (4-5:1), WB=0.26/1.00 (2-4:1), SS=0.34/1.00 (5-6:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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.
NE0818-105	G01	1	1	GREENPARK-MINNISALE HOMES-HEMLOCK 5C EL 2	PAGE 4 OF 49
TRUSS DESC.					

Version 8.210 S Mar 12 2018 MITek Industries, Inc. Thu Aug 16 18:08:02 2018 Page 2
ID:bWeJhNa3z9S0pbNXDmof4Dz3iPU-VUeMjjdzmWTXDpx8H51hHnS6BfWwwDWHEWvzVxynCmx

JSI GRIP= 0.90 (5) (INPUT = 0.90)
JSI METAL= 0.31 (2) (INPUT = 1.00)

READ ALL NOTES ON THIS PAGE AND ON
ENGINEERING NOTE PAGE ENP-1. THIS
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SPECIFICATIONS AND CRITERIA USED IN
THE DESIGN OF THIS COMPONENT.



PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVW+p	MT20	5.0	5.0	1.50	2.25
2	TMWW+t	MT20	5.0	5.0	1.50	1.75
3	TMVW+p	MT20	3.0	5.0	1.50	1.50
4	TMWW-t	MT20	4.0	5.0	1.50	1.25
5	TTW+p	MT20	3.0	5.0		
6	TMVW+p	MT20	5.0	5.0	1.75	2.25
7	BMV1+p	MT20	3.0	4.0		
8	BMWWW+t	MT20	6.0	8.0	3.25	3.00
9	BMWW+t	MT20	4.0	6.0	2.75	2.00
10	BVMWW+p	MT20	8.0	10.0	6.75	5.00
11	BMV+p	MT20	2.0	4.0		
12	BMWWW-t	MT20	6.0	8.0	2.50	3.00
13	BMV1+p	MT20	3.0	4.0		

HANGERS NOTES

- 1) SPECIAL HANGER(S) OR CONNECTION(S)
REQUIRED TO SUPPORT CONCENTRATED
LOAD(S) 2140.2 lbs FACTORED DOWN AT 4-9
ON BOTTOM CHORD. DESIGN FOR
UNSPECIFIED CONNECTION(S) IS DELEGATED
TO THE BUILDING DESIGNER.

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR	SECTION
(PSI)	(PLI)	(PLI)	
	MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

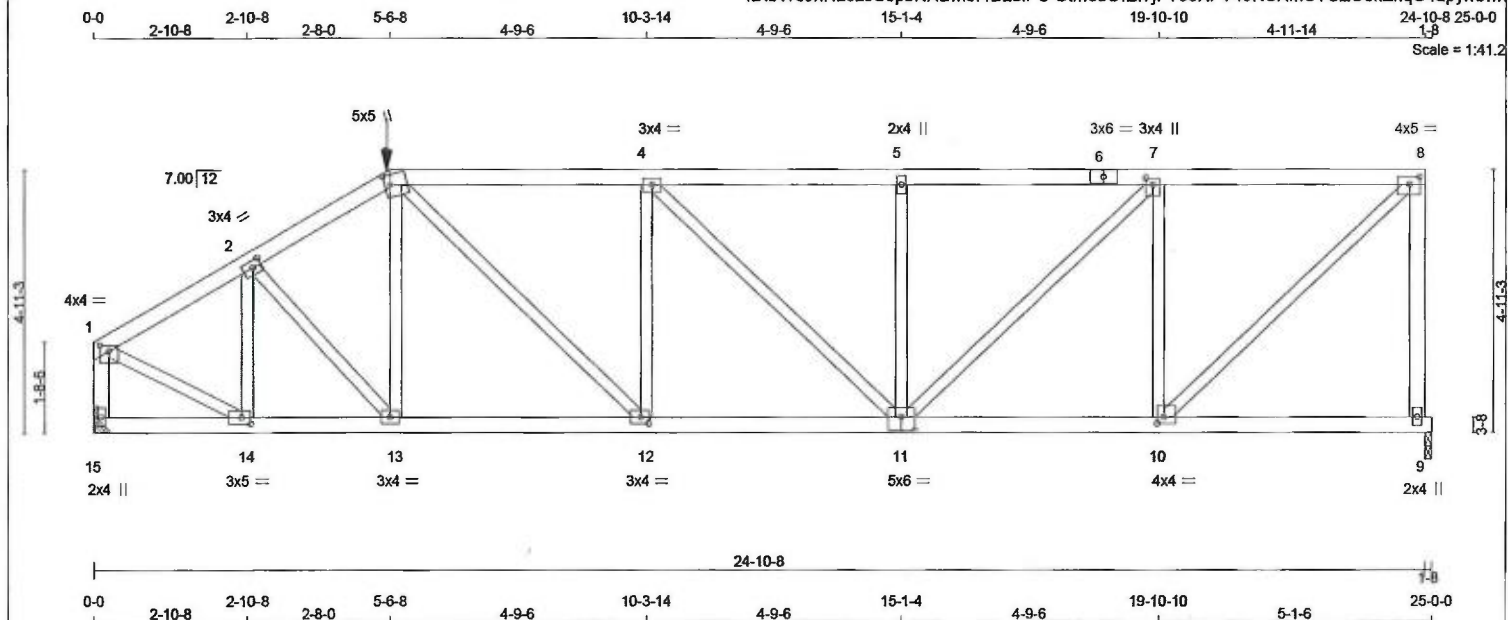
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (8) (INPUT = 0.90)

JSI METAL= 0.51 (2) (INPUT = 1.00)

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THE DESIGN OF THIS COMPONENT.**





LUMBER	N. L. G. A. RULES	CHORDS	SIZE	DRY	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2	SPF		
3 - 6	2x4	DRY	No.2	SPF		
6 - 8	2x4	DRY	No.2	SPF		
9 - 8	2x4	DRY	No.2	SPF		
15 - 1	2x4	DRY	No.2	SPF		
15 - 11	2x4	DRY	No.2	SPF		
11 - 9	2x4	DRY	No.2	SPF		

ALL WEBS 2x3 DRY No.2 SPF
EXCEPT

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		
1-3	12	SIDE(0.0)
3-6	12	SIDE(34.2)
6-8	12	SIDE(34.2)
8-9	12	TOP
15-1	12	TOP
BOTTOM CHORDS : (0.122"x3") SPIRAL NAILS		
15-11	12	SIDE(8.7)
11-9	12	SIDE(8.7)
WEBS : (0.122"x3") SPIRAL NAILS		
2x3	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 TRANSFERRING. 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	REQD BRG
JT	VERT	HORZ	DOWN	HORZ
9	2254	0	2254	0
15	2137	0	2137	0

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 15 TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

1ST LCASE	MAX/MIN	COMPONENT REACTIONS
JT	COMBINED	SNOW LIVE PERM.LIVE WIND DEAD SOIL
9	1581	1110 / 0 0 / 0 0 / 0 0 / 0 471 / 0 0 / 0
15	1502	1040 / 0 0 / 0 0 / 0 0 / 0 462 / 0 0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 9

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.93 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	MAX. FACTORED	FACTORED	VERT. LOAD	LC1	MAX	CS1 (LC)	UNBRAC	MEMB.	MAX. FORCE	MAX	CS1 (LC)
MEMB.	FORCE (LBS)	FROM TO	PLF				LENGTH	FR-TO	(LBS)		
FR-TO											
1-2	-2163 / 0	-77.4	-77.4	0.06 (1)	5.99	14-2	-825 / 0	0.09 (1)			
2-3	-2573 / 0	-77.4	-77.4	0.06 (1)	5.61	2-13	0 / 496	0.06 (1)			
3-4	-3071 / 0	-145.9	-145.9	0.31 (1)	4.93	13-3	-230 / 53	0.04 (1)			
4-5	-2960 / 0	-145.9	-145.9	0.33 (1)	5.01	3-12	0 / 1206	0.15 (1)			
5-6	-2960 / 0	-145.9	-145.9	0.33 (1)	4.98	12-4	-679 / 0	0.13 (1)			
6-7	-2960 / 0	-145.9	-145.9	0.33 (1)	4.98	4-11	-154 / 0	0.06 (1)			
7-8	-2037 / 0	-145.9	-145.9	0.30 (1)	5.79	11-5	-642 / 0	0.12 (1)			
9-8	-2186 / 0	0.0	0.0	0.45 (1)	7.53	11-7	0 / 1287	0.16 (1)			
15-1	-2090 / 0	0.0	0.0	0.12 (1)	7.66	10-7	-1711 / 0	0.32 (1)			
15-14	0 / 0	-33.0	-33.0	0.03 (4)	10.00	10-8	0 / 2782	0.34 (1)			
14-13	0 / 1876	-33.0	-33.0	0.20 (1)	10.00	10-9	0 / 2082	0.26 (1)			
13-12	0 / 2204	-33.0	-33.0	0.23 (1)	10.00						
12-11	0 / 3071	-33.0	-33.0	0.31 (1)	10.00						
11-10	0 / 2037	-33.0	-33.0	0.23 (1)	10.00						
10-9	0 / 0	-33.0	-33.0	0.10 (4)	10.00						

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
3	5-6-8	-322	-322	-	FRONT	VERT	TOTAL

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN./C/C

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

GIRDER TYPE: CPrimeHip
LEFT SETBACK = 5-6-8
RIGHT SETBACK = 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.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.83")
CALCULATED VERT. DEFL.(LL) = L/999 (0.06")
ALLOWABLE DEFL.(TL)= L/360 (0.83")
CALCULATED VERT. DEFL.(TL) = L/999 (0.12")

CSI: TC=0.45/1.00 (8-9:1), BC=0.31/1.00 (11-12:1), WB=0.34/1.00 (8-10:1), SSI=0.19/1.00 (7-8:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVW-p	MT20	4.0	4.0	1.25	2.00
2	TMWW-l	MT20	3.0	4.0	1.50	1.75
3	TTWW+m	MT20	5.0	5.0	2.25	1.25
4	TMWW-t	MT20	3.0	4.0		
5	TMW+w	MT20	2.0	4.0		
6	TS-t	MT20	3.0	6.0		
7	TMWW+t	MT20	3.0	4.0	1.50	1.50
8	TMVW-t	MT20	4.0	5.0	1.75	2.25
9	BMV1+p	MT20	2.0	4.0		
10	BMWW-l	MT20	4.0	4.0	1.50	1.50
11	BSWWW-l	MT20	5.0	6.0	3.00	3.00
12	BMWW-t	MT20	3.0	4.0	1.50	1.75
13	BMWW-t	MT20	3.0	4.0		
14	BMWW-t	MT20	3.0	5.0	1.50	2.00
15	BMV1+p	MT20	2.0	4.0		

HANGERS NOTES

- 1) SPECIAL HANGER(S) OR CONNECTION(S)
REQUIRED TO SUPPORT CONCENTRATED
LOAD(S) 321.5 lbs FACTORED DOWN AT 5-6-8
ON TOP CHORD. DESIGN FOR UNSPECIFIED
CONNECTION(S) IS DELEGATED TO THE
BUILDING DESIGNER.

PLATE PLACEMENT TOL. = 0.250 inches

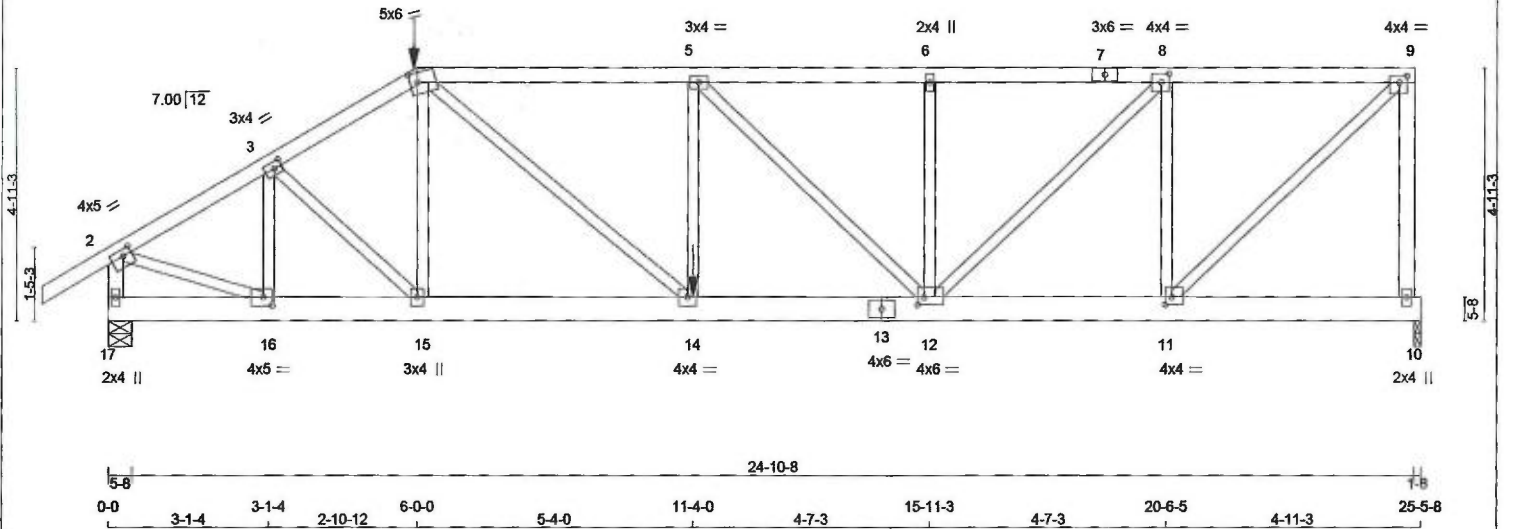
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (12) (INPUT = 0.90)
JSI METAL= 0.38 (10) (INPUT = 1.00)

**READ ALL NOTES ON THIS PAGE AND ON
ENGINEERING NOTE PAGE ENP-1. THIS
NOTE PAGE IS AN INTEGRAL PART OF
THIS DRAWING AS IT CONTAINS
SPECIFICATIONS AND CRITERIA USED IN
THE DESIGN OF THIS COMPONENT.**



Scale = 1:42.8



LUMBER	N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY	No.2	SPF	
4 - 7	2x4	DRY	No.2	SPF	
7 - 9	2x4	DRY	No.2	SPF	
10 - 9	2x4	DRY	No.2	SPF	
17 - 2	2x4	DRY	No.2	SPF	
17 - 13	2x6	DRY	No.2	SPF	
13 - 10	2x6	DRY	No.2	SPF	

ALL WEBS 2x3 DRY No.2 SPF
EXCEPT

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		
1-4	12	SIDE(0.0)
4-7	12	SIDE(34.2)
7-9	12	TOP
9-10	12	TOP
17-2	12	TOP
BOTTOM CHORDS : (0.122"x3") SPIRAL NAILS		
17-13	12	SIDE(8.7)
13-10	12	TOP
WEBS : (0.122"x3") SPIRAL NAILS		
2x3	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	IN-SX	IN-SX
10	1943	0	1943	0	0	1-8	1-8		
17	2561	0	2561	0	0	5-8	5-8		

UNFACTORED REACTIONS

JT	1ST LCASE	MAX./MIN. COMPONENT REACTIONS	LIVE	PERM. LIVE	WIND	DEAD	SOIL
10	1363	958 / 0	0 / 0	0 / 0	0 / 0	405 / 0	0 / 0
17	1797	1258 / 0	0 / 0	0 / 0	0 / 0	539 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 10, 17

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.38 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. FACTORED CSI (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED CSI (LC)	
FR-TO		FROM TO		FR-TO			
1-2	0 / 27	-77.4 -77.4	0.06 (1)	10-00	16-3	-821 / 0	0.08 (1)
2-3	-2861 / 0	-77.4 -77.4	0.08 (1)	5-37	3-15	0 / 485	0.06 (1)
3-4	-3293 / 0	-77.4 -77.4	0.08 (1)	5-08	15-4	-99 / 108	0.02 (4)
4-5	-3986 / 0	-145.9 -145.9	0.38 (1)	4-38	4-14	0 / 1521	0.19 (1)
5-6	-3095 / 0	-77.4 -77.4	0.30 (1)	4-93	14-5	0 / 204	0.03 (4)
6-7	-3095 / 0	-77.4 -77.4	0.19 (1)	5-08	5-12	-1254 / 0	0.47 (1)
7-8	-3095 / 0	-77.4 -77.4	0.19 (1)	5-08	12-6	-269 / 0	0.05 (1)
8-9	-1851 / 0	-77.4 -77.4	0.16 (1)	6-22	12-8	0 / 1752	0.22 (1)
10-9	-1903 / 0	0.0 0.0	0.36 (1)	7-81	11-8	-1663 / 0	0.29 (1)
17-2	-2479 / 0	0.0 0.0	0.14 (1)	7-18	11-9	0 / 2552	0.32 (1)
				2-16	0 / 2613	0.32 (1)	
17-16	0 / 0	-33.0 -33.0	0.04 (1)	10-00			
16-15	0 / 2479	-33.0 -33.0	0.20 (1)	10-00			
15-14	0 / 2829	-33.0 -33.0	0.23 (1)	10-00			
14-13	0 / 3986	-17.5 -17.5	0.29 (1)	10-00			
13-12	0 / 3986	-17.5 -17.5	0.29 (1)	10-00			
12-11	0 / 1851	-17.5 -17.5	0.14 (1)	10-00			
11-10	0 / 0	-17.5 -17.5	0.02 (4)	10-00			

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
4	6-0-0	-348	-348		FRONT	VERT	TOTAL
14	11-4-0	-1106	-1106		FRONT	VERT	TOTAL

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 = 23.3	PSF
	DL = 3.0	PSF
BOT CH.	LL = 0.0	PSF
	DL = 7.0	PSF
TOTAL LOAD	= 33.3	PSF

SPACING = 24.0 IN./C/C

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

GIRDER TYPE: CPrimeHip
LEFT SETBACK = 6-0-0
RIGHT SETBACK = 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 11-4-0 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 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.84")
CALCULATED VERT. DEFL.(LL)= L/999 (0.07")
ALLOWABLE DEFL.(TL)= L/360 (0.84")
CALCULATED VERT. DEFL.(TL)= L/999 (0.12")

CSI: TC=0.38/1.00 (4-5:1), BC=0.29/1.00 (12-14:1), WB=0.47/1.00 (5-12:1), SSI=0.19/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMVW-t	MT20	4.0	5.0	1.50	2.00
3	TMWW-t	MT20	3.0	4.0	1.50	1.75
4	TTWW-m	MT20	5.0	6.0	2.25	1.75
5	TMWW-t	MT20	3.0	4.0		
6	TMW+w	MT20	2.0	4.0		
7	TS-t	MT20	3.0	6.0		
8	TMWW-t	MT20	4.0	4.0	2.00	1.75
9	TMVW-t	MT20	4.0	4.0	1.50	1.75
10	BMV1+p	MT20	2.0	4.0		
11	BMWW-t	MT20	4.0	4.0	1.75	1.50
12	BMWW-t	MT20	4.0	6.0	1.75	1.50
13	BS-t	MT20	4.0	6.0		
14	BMWW-t	MT20	4.0	4.0		
15	BMWW-t	MT20	3.0	4.0		
16	BMWW-t	MT20	4.0	5.0	2.00	2.00
17	BMV1+p	MT20	2.0	4.0		

HANGERS NOTES

- 1) SPECIAL HANGER(S) OR CONNECTION(S) REQUIRED TO SUPPORT CONCENTRATED LOAD(S) 348.1 lbs FACTORED DOWN AT 6'-0" ON TOP CHORD, AND 1105.7 lbs FACTORED DOWN AT 11'-4" ON BOTTOM CHORD. DESIGN FOR UNSPECIFIED CONNECTION(S) IS DELEGATED TO THE BUILDING DESIGNER.

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
MT20	618	354	1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (2) (INPUT = 0.90)
JSI METAL= 0.45 (2) (INPUT = 1.00)

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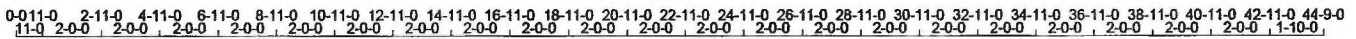


GABLE STUDS SPACED AT 2'-0" OC.

PLATE ROTATION TOL. = 5.0 Deg.



Scale = 1:75.5



TOTAL WEIGHT = 2 X 249 = 498 lb

ALL GABLE WEBS				
	2x3	DRY	No.2	SPF
EXCEPT				
ST1	2x4	DRY	No.2	SPF
ST2	2x4	DRY	No.2	SPF
ST3	2x4	DRY	No.2	SPF
ST4	2x4	DRY	No.2	SPF
ST5	2x4	DRY	No.2	SPF
ST6	2x4	DRY	No.2	SPF

GABLE STUDS SPACED AT 2'-0" OC.

PLATES (table is in inches)						
JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
3, 4, 5, 6, 7, 9, 10, 12, 13, 14, 15, 16, 18, 19, 20, 22, 23, 24, 25, 26						
3	TMW+w	MT20	2.0	4.0		
8	TSW+l	MT20	4.0	6.0		
11	TT-m	MT20	4.0	6.0		Edge 2.00
17	TTW+m	MT20	4.0	6.0		Edge 1.00

LOADING
TOTAL LOAD CASES: (4)

C H O R D S				W E B S				
MAX. FACTORED		FACTORED		MAX. FACTORED				
MEMB.	FORCE	VERT. LOAD	LC1 MAX	MAX.	MEMB.	FORCE	MAX	
	(LBS)	(PLF)	CSI (LC)	UNBRAC		(LBS)	CSI (LC)	
FR-TO		FROM TO		LENGTH	FR-TO			
1-2	0 / 27	-77.4	-77.4	0.10 (1)	10.00	36-17	-142 / 0	0.08 (1)
2-3	-37 / 0	-77.4	-77.4	0.10 (1)	6.25	37-16	-190 / 0	0.11 (1)
3-4	0 / 6	-77.4	-77.4	0.04 (1)	10.00	38-15	-166 / 0	0.10 (1)
4-5	0 / 5	-77.4	-77.4	0.04 (1)	10.00	39-14	-173 / 0	0.10 (1)
5-6	0 / 10	-77.4	-77.4	0.04 (1)	10.00	40-13	-152 / 0	0.08 (1)
6-7	0 / 12	-77.4	-77.4	0.04 (1)	10.00	41-12	-197 / 0	0.12 (1)
7-8	0 / 14	-77.4	-77.4	0.04 (1)	10.00	42-10	-164 / 0	0.12 (1)
8-9	0 / 14	-77.4	-77.4	0.04 (1)	10.00	44-9	-142 / 0	0.07 (1)
9-10	0 / 21	-77.4	-77.4	0.06 (1)	10.00	45-8	-156 / 0	0.18 (1)
10-11	0 / 0	-77.4	-77.4	0.05 (1)	10.00	46-7	-156 / 0	0.11 (1)
11-12	0 / 16	-84.9	-84.9	0.08 (1)	2.00	47-6	-153 / 0	0.07 (1)
12-13	0 / 15	-84.9	-84.9	0.08 (1)	2.00	48-5	-151 / 0	0.04 (1)
13-14	0 / 15	-84.9	-84.9	0.04 (1)	2.00	49-4	-164 / 0	0.03 (1)
14-54	0 / 15	-84.9	-84.9	0.04 (1)	2.00	50-3	-25 / 0	0.00 (1)
54-15	0 / 15	-84.9	-84.9	0.04 (1)	2.00	35-18	-175 / 0	0.11 (1)
15-16	0 / 15	-84.9	-84.9	0.05 (1)	2.00	34-19	-151 / 0	0.07 (1)
16-17	0 / 15	-84.9	-84.9	0.05 (1)	2.00	33-20	-154 / 0	0.14 (1)
17-18	0 / 10	-77.4	-77.4	0.04 (1)	10.00	32-22	-154 / 0	0.09 (1)
18-19	0 / 18	-77.4	-77.4	0.05 (1)	10.00	31-23	-153 / 0	0.06 (1)
19-20	0 / 14	-77.4	-77.4	0.04 (1)	10.00	30-24	-153 / 0	0.03 (1)
20-21	0 / 13	-77.4	-77.4	0.04 (1)	6.25	29-25	-153 / 0	0.02 (1)
21-22	0 / 13	-77.4	-77.4	0.04 (1)	6.25	28-26	-147 / 0	0.02 (1)
22-23	0 / 10	-77.4	-77.4	0.04 (1)	10.00	52-53	-34 / 5	0.00 (1)
23-24	0 / 8	-77.4	-77.4	0.04 (1)	10.00			
24-25	0 / 4	-77.4	-77.4	0.04 (1)	10.00			
25-26	-2 / 0	-77.4	-77.4	0.04 (1)	10.00			
26-53	-3 / 0	-77.4	-77.4	0.03 (1)	10.00			
53-27	-21 / 0	-77.4	-77.4	0.01 (4)	6.25			
51-2	-212 / 0	0.0	0.0	0.02 (1)	7.81			

51-50	0 / 0	-17.5	-17.5	0.01 (4)	10.00
50-49	-1 / 0	-17.5	-17.5	0.01 (4)	10.00
49-48	-5 / 0	-17.5	-17.5	0.01 (4)	10.00
48-47	-8 / 0	-17.5	-17.5	0.01 (4)	10.00
47-46	-11 / 0	-17.5	-17.5	0.01 (4)	6.25
46-45	-12 / 0	-17.5	-17.5	0.01 (4)	6.25
45-44	-13 / 0	-17.5	-17.5	0.01 (4)	6.25
44-43	-14 / 0	-17.5	-17.5	0.01 (4)	6.25

CONTINUED ON PAGE 2



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PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
21	TS-I	MT20	3.0	6.0		
27	TMB1-I	MT20	4.0	6.0	0.25	
28, 29, 30, 31, 32, 33, 34, 36, 37, 38, 39, 40, 41, 42, 44, 45, 46, 47, 48, 49, 50						
28	BMW1+w	MT20	2.0	4.0		
35	BSW1+I	MT20	4.0	6.0		
43	BS-I	MT20	3.0	6.0		
51	BMV1+p	MT20	2.0	4.0		

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

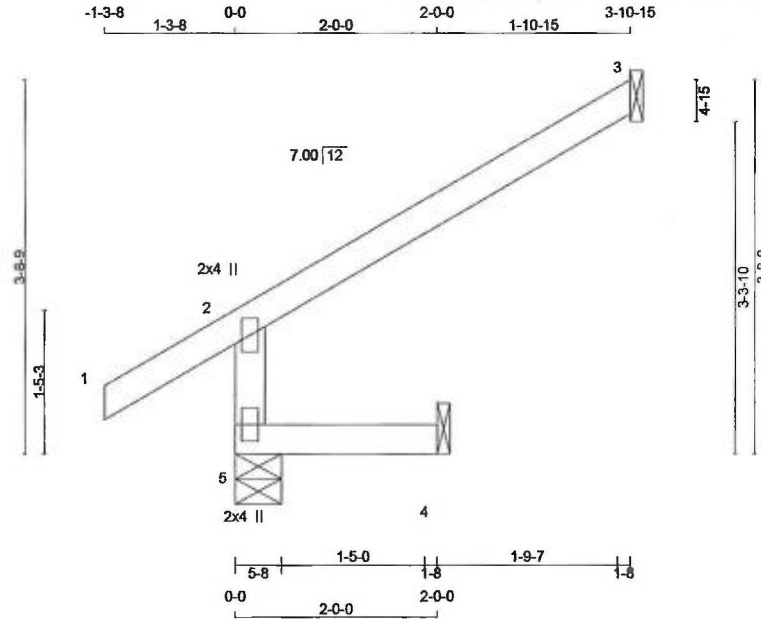
LOADING

TOTAL LOAD CASES: (4)

CHORDS				WEBS			
MAX. FACTORED	FACTORED			MAX. FACTORED	FACTORED		
MEMB.	FORCE (LBS)	VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MAX. UNBRAC	MEMB.	FORCE (LBS)	MAX. CSI (LC)
FR-TO		FROM TO		LENGTH	FR-TO		
43-42	-14 / 0	-17.5	-17.5 0.01 (4)	6.25			
42-41	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
41-40	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
40-39	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
39-38	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
38-37	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
37-36	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
36-35	-15 / 0	-17.5	-17.5 0.01 (4)	6.25			
35-34	-14 / 0	-17.5	-17.5 0.01 (4)	6.25			
34-33	-13 / 0	-17.5	-17.5 0.01 (4)	6.25			
33-32	-11 / 0	-17.5	-17.5 0.01 (4)	6.25			
32-31	-9 / 0	-17.5	-17.5 0.01 (4)	10.00			
31-30	-7 / 0	-17.5	-17.5 0.01 (4)	10.00			
30-29	-3 / 0	-17.5	-17.5 0.01 (4)	10.00			
29-28	0 / 2	-17.5	-17.5 0.01 (4)	10.00			
28-52	0 / 12	-17.5	-17.5 0.02 (1)	10.00			
52-27	0 / 12	-17.5	-17.5 0.02 (1)	10.00			

READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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 10 = 21 lb [M]

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
5 - 2	2x4	DRY	No.2	SPF
1 - 3	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
5	BMV1+p	MT20	2.0	4.0		

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

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG	REQD BRG
	VERT	HORZ	DOWN	HORZ		
5	314	0	314	0	5-8	5-8
3	114	0	114	0	1-8	1-8
4	16	0	18	0	1-8	1-8

SEE MITEK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

JT	1ST LCASE		MAX/MIN. COMPONENT REACTIONS		DEAD	SOIL
	COMBINED	SNOW	LIVE	PERM. LIVE		
5	216	177 / 0	0 / 0	0 / 0	38 / 0	0 / 0
3	77	68 / 0	0 / 0	0 / 0	9 / 0	0 / 0
4	13	0 / 0	0 / 0	0 / 0	13 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5

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)

CHORDS			WEBS				
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
FR-TO		FROM TO			FR-TO		
5-2	-295 / 0	0.0	0.0	0.01 (4)	7.81		
1-2	0 / 27	-77.4	-77.4	0.10 (1)	10.00		
2-3	-19 / 0	-77.4	-77.4	0.20 (1)	6.25		
5-4	0 / 0	-17.5	-17.5	0.02 (4)	10.00		

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 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=0.20/1.00 (2-3:1), BC=0.02/1.00 (4-5:4), WB=0.00/1.00 (n/a:0), SSI=0.13/1.00 (2-3:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
	MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

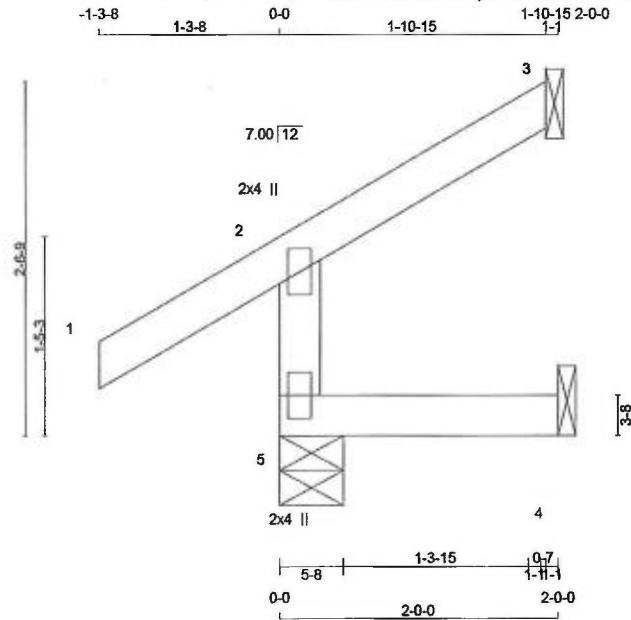
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.18 (2) (INPUT = 0.90)
JSI METAL= 0.07 (2) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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 8 = 16 lb

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
5 - 2	2x4	DRY	No.2	SPF
1 - 3	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
5	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	UPLIFT	IN-SX	
5	217	0	217	0	0	5-8	5-8
3	56	0	56	0	0	1-8	1-8
4	16	0	18	0	0	1-8	1-8

SEE MITEK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

JT	1ST LCASE		MAX/MIN. COMPONENT REACTIONS		WIND	DEAD	SOIL
	COMBINED	SNOW	LIVE	PERM. LIVE			
5	149	119/0	0/0	0/0	0/0	31/0	0/0
3	38	34/0	0/0	0/0	0/0	4/0	0/0
4	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) 5, 3

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00 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)

MEMB.	CHORDS		FACTORED		MAX. UNBRACED LENGTH	MEMB.	WEBS	
	MAX. FACTORED FORCE (LBS)	VERT. LOAD (PLF)	LC1 MAX (LC)	MAX. FACTORED FORCE (LBS)			MAX. FACTORED FORCE (LBS)	MAX. FACTORED FORCE (LBS)
FR-TO						FR-TO		
5-2	-197/0	0.0	0.0	0.01 (4)	7.81			
1-2	0/27	-77.4	-77.4	0.10 (1)	10.00			
2-3	-9/0	-77.4	-77.4	0.05 (1)	10.00			
5-4	0/0	-17.5	-17.5	0.02 (4)	10.00			

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD	= 33.3	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 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=0.10/1.00 (1-2:1), BC=0.02/1.00 (4-5:4), WB=0.00/1.00 (n/a:0), SSI=0.07/1.00 (1-2:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822

PLATE PLACEMENT TOL. = 0.250 inches

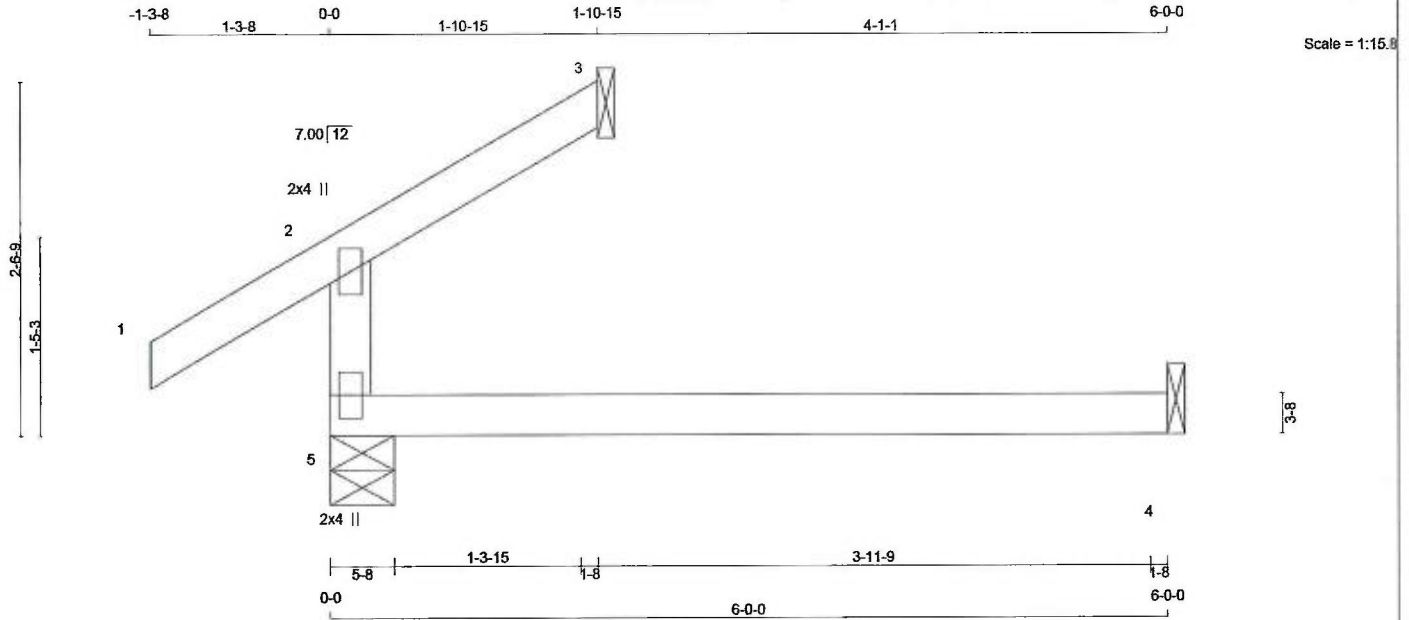
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.12 (2) (INPUT = 0.90)
JSI METAL= 0.05 (2) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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 12 = 25 lb (M)

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
5 - 2	2x4	DRY	No.2	SPF
1 - 3	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
5	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	UPLIFT	IN-SX	IN-SX
5	258	0	258	0	0	5-8	5-8
3	56	0	56	0	0	1-8	1-8
4	44	0	49	0	0	1-8	1-8

SEE MITTEK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

1ST LCASE		MAX./MIN. COMPONENT REACTIONS					
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
5	183	119 / 0	0 / 0	0 / 0	0 / 0	64 / 0	0 / 0
3	38	34 / 0	0 / 0	0 / 0	0 / 0	4 / 0	0 / 0
4	35	0 / 0	0 / 0	0 / 0	0 / 0	35 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5, 3

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00 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.	CHORDS			WEBS		
	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. UNBRACED LENGTH (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH (LC)
FR-TO		FROM TO		FR-TO		
5-2	-197 / 0	0.0	0.0 0.12 (4)	7.81		
1-2	0 / 27	-77.4	-77.4 0.10 (1)	10.00		
2-3	-9 / 0	-77.4	-77.4 0.05 (1)	10.00		
5-4	0 / 0	-17.5	-17.5 0.13 (4)	10.00		

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD = 33.3	PSF	

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.20")
CALCULATED VERT. DEFL.(LL) = L/999 (0.00")
ALLOWABLE DEFL.(TL)= L/360 (0.20")
CALCULATED VERT. DEFL.(TL) = L/999 (0.03")

CSI: TC=0.12/1.00 (2-5:4), BC=0.13/1.00 (4-5:4),
WB=0.00/1.00 (n/a:0), SSI=0.08/1.00 (4-5:4)

DOL LUMBER=1.00 NAIL=1.00 L.S BEND=1.10
COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR (PLI)	SECTION (PLI)
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches

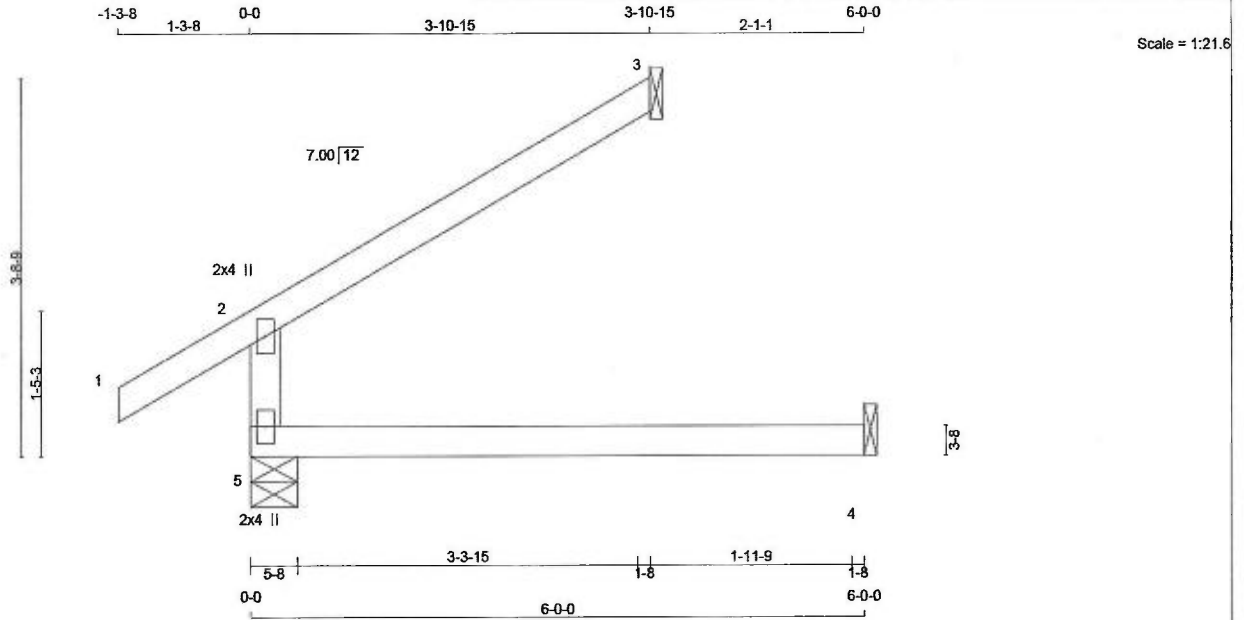
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.12 (2) (INPUT = 0.90)
JSI METAL= 0.05 (2) (INPUT = 1.00)



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TOTAL WEIGHT = 2 X 15 = 30 lb (M)

LUMBER
N. L. G. A. RULES

CHORDS	SIZE	LUMBER
5 - 2	2x4 DRY	No.2
1 - 3	2x4 DRY	No.2
5 - 4	2x4 DRY	No.2

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
5	BMV1+p	MT20	2.0	4.0		

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

FACTORED GROSS REACTION			MAXIMUM FACTORED GROSS REACTION			INPUT BRG	REQD BRG
JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
5	356	0	356	0	0	5-8	5-8
3	114	0	114	0	0	1-8	1-8
4	44	0	49	0	0	1-8	1-8

SEE MITEK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX/MIN. COMPONENT REACTIONS					
		SNOW	LIVE	PERM. LIVE	WIND	DEAD	SOIL
5	249	177 / 0	0 / 0	0 / 0	0 / 0	72 / 0	0 / 0
3	77	68 / 0	0 / 0	0 / 0	0 / 0	9 / 0	0 / 0
4	35	0 / 0	0 / 0	0 / 0	0 / 0	35 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5, 3

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)

CHORDS			WEBS					
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1	MAX CSI (LC)	MAX. UNBRAC LENGTH	MEMB. FORCE (LBS)	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
FR-TO		FROM TO				FR-TO		
5-2	-295 / 0	0.0	0.0	0.12 (4)	7.81			
1-2	0 / 27	-77.4	-77.4	0.10 (1)	10.00			
2-3	-19 / 0	-77.4	-77.4	0.20 (1)	6.25			
5-4	0 / 0	-17.5	-17.5	0.13 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.20")
CALCULATED VERT. DEFL.(LL) = L/999 (0.00")
ALLOWABLE DEFL.(TL)= L/360 (0.20")
CALCULATED VERT. DEFL.(TL) = L/999 (0.03")

CSI: TC=0.20/1.00 (2-3:1), BC=0.13/1.00 (4-5:4),
WB=0.00/1.00 (n/a:0), SSI=0.13/1.00 (2-3:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MT20	618	354	1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

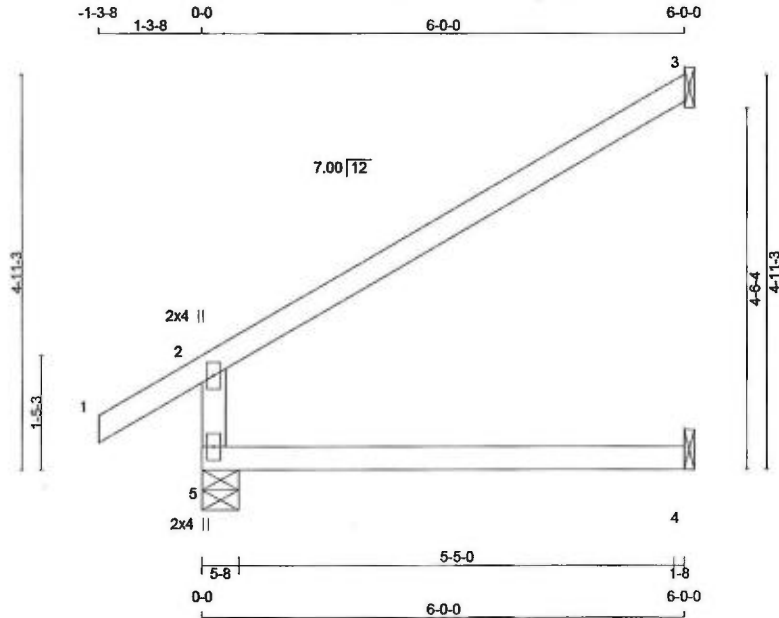
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.18 (2) (INPUT = 0.90)
JSI METAL= 0.07 (2) (INPUT = 1.00)



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TOTAL WEIGHT = 13 X 18 = 231 lb

LUMBER				
N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
5 - 2	2x4	DRY	No.2	SPF
1 - 3	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)					
JT	TYPE	PLATES	W	LEN	Y X
2	TMV+p	MT20	2.0	4.0	
5	BMV1+p	MT20	2.0	4.0	

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

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG	REQRD BRG
	VERT	HORZ	DOWN	HORZ		
5	457	0	457	0	5-8	5-8
3	174	0	174	0	1-8	1-8
4	44	0	49	0	1-8	1-8

SEE MITEK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

JT	1ST LCASE	MAX./MIN. COMPONENT REACTIONS					
	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
5	318	238 / 0	0 / 0	0 / 0	0 / 0	79 / 0	0 / 0
3	118	105 / 0	0 / 0	0 / 0	0 / 0	14 / 0	0 / 0
4	35	0 / 0	0 / 0	0 / 0	0 / 0	35 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5

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)

CHORDS				WEBS			
MEMB.	FORCE (LBS)	VERT. LOAD (PLF)	FACTORED MAX	MEMB.	FORCE (LBS)	MAX	FACTORED MAX
FR-TO			FROM TO	FR-TO			LENGTH FR-TO
5-2	-396 / 0	0.0	0.0 0.12 (4)	7.81			
1-2	0 / 27	-77.4	-77.4 0.10 (1)	10.00			
2-3	-29 / 0	-77.4	-77.4 0.47 (1)	6.25			
5-4	0 / 0	-17.5	-17.5 0.13 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
	DL = 3.0	PSF
BOT CH.	LL = 0.0	PSF
	DL = 7.0	PSF
TOTAL LOAD	= 33.3	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.20")
CALCULATED VERT. DEFL.(LL)= L/999 (0.00")
ALLOWABLE DEFL.(TL)= L/360 (0.20")
CALCULATED VERT. DEFL.(TL)= L/999 (0.03")

CSI: TC=0.47/1.00 (2-3:1), BC=0.13/1.00 (4-5:4), WB=0.00/1.00 (n/a:0), SSI=0.20/1.00 (2-3:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

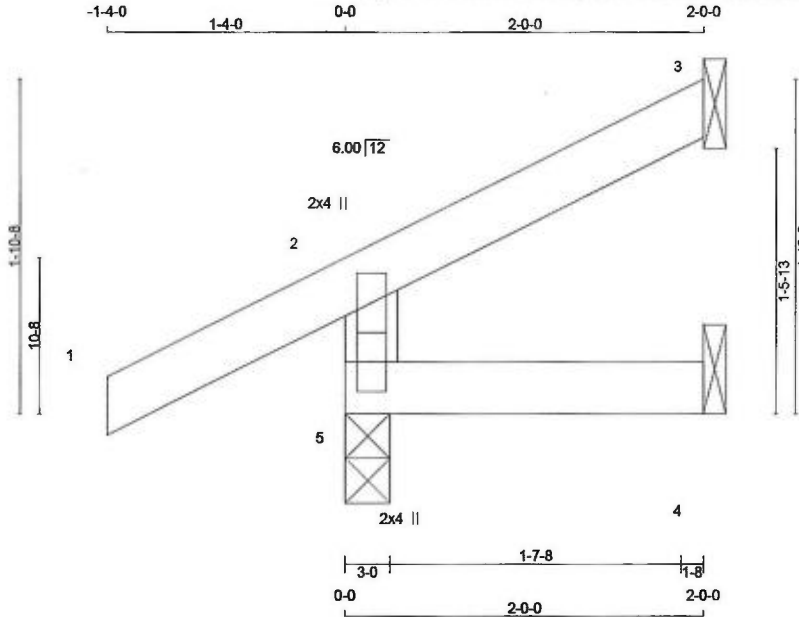
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.24 (2) (INPUT = 0.90)
JSI METAL= 0.09 (2) (INPUT = 1.00)



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TOTAL WEIGHT = 2 X 7 = 14 lb
(M)

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	DRY	LUMBER	DESCR.
5 - 2	2x4	DRY	No.2	SPF	
1 - 3	2x4	DRY	No.2	SPF	
5 - 4	2x4	DRY	No.2	SPF	

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMV+p	MT20	2.0	4.0		
5	BMV1+p	MT20	2.0	4.0		

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

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG IN-SX	REQRD BRG IN-SX
	VERT	HORZ	DOWN	HORZ		
5	224	0	224	0	3-0	3-0
3	58	0	58	0	1-8	1-8
4	15	0	17	0	1-8	1-8

SEE MITK STANDARD DETAIL B37579H FOR CONNECTION TO JOINT(S) 3, 4

UNFACTORED REACTIONS

JT	1ST LCASE	MAX./MIN. COMPONENT REACTIONS					
	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
5	155	123 / 0	0 / 0	0 / 0	0 / 0	32 / 0	0 / 0
3	40	35 / 0	0 / 0	0 / 0	0 / 0	5 / 0	0 / 0
4	12	0 / 0	0 / 0	0 / 0	0 / 0	12 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00 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)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
FR-TO		FROM	TO		FR-TO		
5-2	-205 / 0	0.0	0.0	0.01 (4)	7.81		
1-2	0 / 24	-77.4	-77.4	0.11 (1)	10.00		
2-3	-9 / 0	-77.4	-77.4	0.05 (1)	10.00		
5-4	0 / 0	-17.5	-17.5	0.02 (4)	10.00		

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	23.3	PSF
	DL	=	3.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.0	PSF
TOTAL LOAD		=	33.3	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 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=0.11/1.00 (1-2:1), BC=0.02/1.00 (4-5:4), WB=0.00/1.00 (n/a:0), SSI=0.08/1.00 (1-2:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

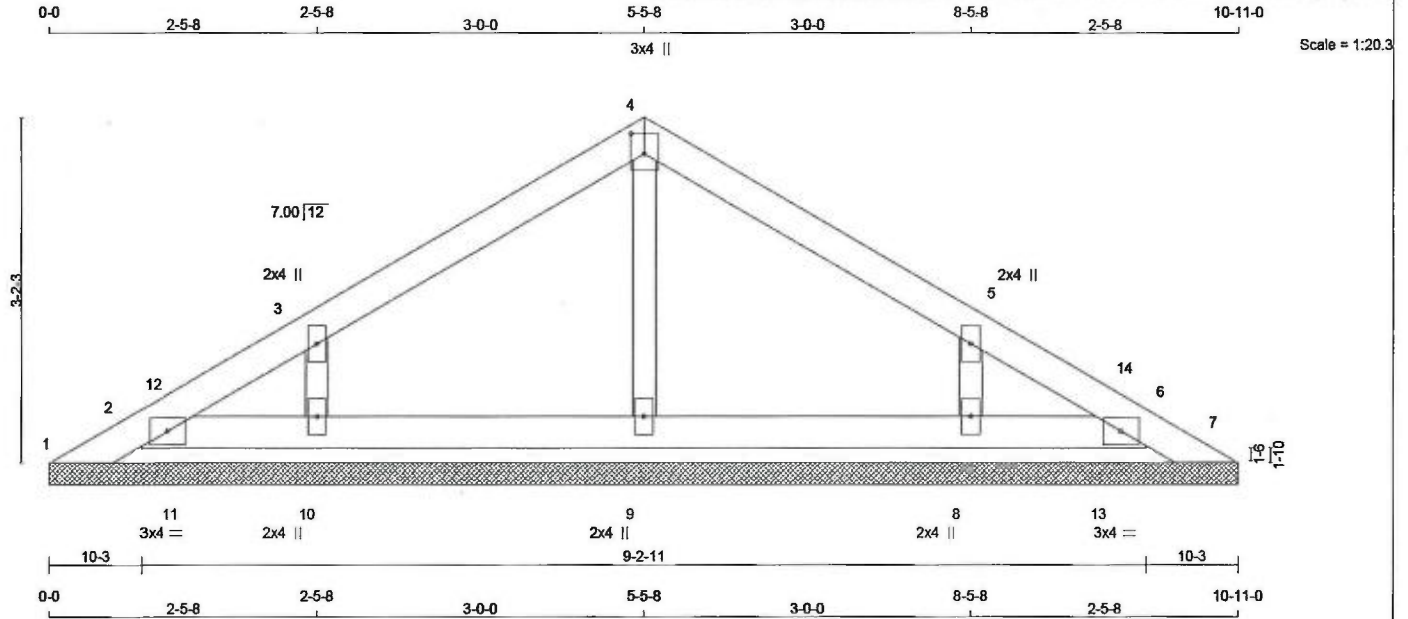
JSI GRIP= 0.12 (2) (INPUT = 0.90)

JSI METAL= 0.05 (2) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 28 lb [M]

LUMBER				
N. L. G. A. RULES	SIZE	LUMBER	DESCR.	
CHORDS				
1 - 4	2x4	DRY	No.2	SPF
4 - 7	2x4	DRY	No.2	SPF
2 - 6	2x4	DRY	No.2	SPF

ALL WEBS 2x3 DRY No.2 SPF
ALL GABLE WEBS 2x3 DRY No.2 SPF
DRY: SEASONED LUMBER.

GABLE STUDS SPACED AT 3-0-0 OC.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMB1-I	MT20	3.0	4.0		
3	TMW+w	MT20	2.0	4.0		
4	TTW+p	MT20	3.0	4.0	2.25	1.50
5	TMW+w	MT20	2.0	4.0		
6	TMB1-I	MT20	3.0	4.0		
8, 9, 10	BMW1+w	MT20	2.0	4.0		

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

BEARINGS

THIS TRUSS DESIGNED FOR CONTINUOUS BEARINGS.

BEVELED PLATE OR SHIM REQUIRED TO PROVIDE FULL BEARING SURFACE WITH TRUSS CHORD AT JT(S): 9, 10, 8
BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S)

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)

CHORDS					WEBS				
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED MAX CSI (LC)		
FR-TO		FROM TO			FR-TO				
1-2	0 / 0	-94.9 -94.9	0.01 (1)	10.00	9-4	-165 / 0	0.03 (1)		
2-12	-61 / 0	-77.4 -77.4	0.01 (1)	6.25	10-3	-241 / 0	0.03 (1)		
12-3	-16 / 0	-77.4 -77.4	0.09 (1)	6.25	8-5	-241 / 0	0.03 (1)		
3-4	-38 / 0	-77.4 -77.4	0.09 (1)	6.25	11-12	0 / 27	0.00 (1)		
4-5	-38 / 0	-77.4 -77.4	0.09 (1)	6.25	13-14	0 / 27	0.00 (1)		
5-14	-16 / 0	-77.4 -77.4	0.09 (1)	6.25					
14-6	-61 / 0	-77.4 -77.4	0.01 (1)	6.25					
6-7	0 / 0	-94.9 -94.9	0.01 (1)	10.00					
2-11	0 / 42	-17.5 -17.5	0.01 (1)	10.00					
11-10	0 / 42	-17.5 -17.5	0.02 (4)	10.00					
10-9	0 / 23	-17.5 -17.5	0.04 (4)	10.00					
9-8	0 / 23	-17.5 -17.5	0.04 (4)	10.00					
8-13	0 / 42	-17.5 -17.5	0.02 (4)	10.00					
13-6	0 / 42	-17.5 -17.5	0.01 (1)	10.00					

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

CSI: TC=0.09/1.00 (3-4:1), BC=0.04/1.00 (9-10:4), WB=0.03/1.00 (3-10:1), SSI=0.10/1.00 (3-4:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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	618 354	1667 822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

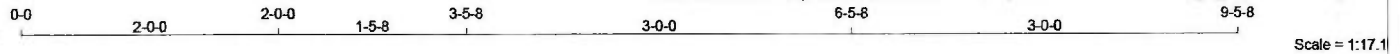
JSI GRIP= 0.16 (3) (INPUT = 0.90)

JSI METAL= 0.06 (3) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2	SPF
3 - 6	2x4	DRY	No.2	SPF
7 - 6	2x4	DRY	No.2	SPF
2 - 7	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF
ALL GABLE WEBS	2x3	DRY	No.2	SPF
DRY: SEASONED LUMBER.				

GABLE STUDS SPACED AT 3-0-0 OC.

PLATES (table is in inches)

JT TYPE	PLATES	W	LEN	Y	X
2 TMB1-I	MT20	3.0	4.0		
3 TT-m	MT20	3.0	4.0	Edge	
4 TMW+w	MT20	2.0	4.0		
5 TMW+w	MT20	2.0	4.0		
6 TMV+p	MT20	2.0	4.0		
7 BMV1+p	MT20	2.0	4.0		
8 BMW1+w	MT20	2.0	4.0		
9 BMW1+w	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
THIS TRUSS DESIGNED FOR CONTINUOUS BEARINGS.

BEVELED PLATE OR SHIM REQUIRED TO PROVIDE FULL BEARING SURFACE WITH TRUSS CHORD AT JT(S): 7, 8, 9

PROVIDE ANCHORAGE AT BEARING JOINT 1 FOR 150 LBS FACTORED UPLIFT BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S)

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)

CHORDS				WEBS			
MEMB.	FORCE (LBS)	VERT. LOAD (PLF)	LC1 MAX (LC)	MEMB.	FORCE (LBS)	MAX (LC)	
FR-TO		FROM	TO	UNBRAC		LENGTH	FR-TO
1-2	0 / 29	-94.9	-94.9 0.07 (1)	10.00	8-5	-261 / 0	0.04 (1)
2-11	-14 / 0	-77.4	-77.4 0.06 (1)	6.25	9-4	-208 / 0	0.03 (1)
11-3	-24 / 0	-77.4	-77.4 0.05 (1)	6.25	10-11	-69 / 15	0.00 (1)
3-4	0 / 0	-77.4	-77.4 0.08 (1)	10.00			
4-5	0 / 0	-77.4	-77.4 0.10 (1)	10.00			
5-6	0 / 0	-77.4	-77.4 0.10 (1)	10.00			
7-6	-92 / 0	0.0	0.0 0.01 (1)	7.61			
2-10	0 / 0	-17.5	-17.5 0.03 (1)	10.00			
10-9	0 / 0	-17.5	-17.5 0.03 (1)	10.00			
9-8	0 / 0	-17.5	-17.5 0.04 (4)	10.00			
8-7	0 / 0	-17.5	-17.5 0.04 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	23.3	PSF
	DL =	3.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.0	PSF
TOTAL LOAD	=	33.3	PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

CSI: TC=0.10/1.00 (4-5:1), BC=0.04/1.00 (7-8:4), WB=0.04/1.00 (5-8:1), SSI=0.11/1.00 (5-6:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES	PLATE GRIP(DRY)	SHEAR (PLI)	SECTION (PLI)
	MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

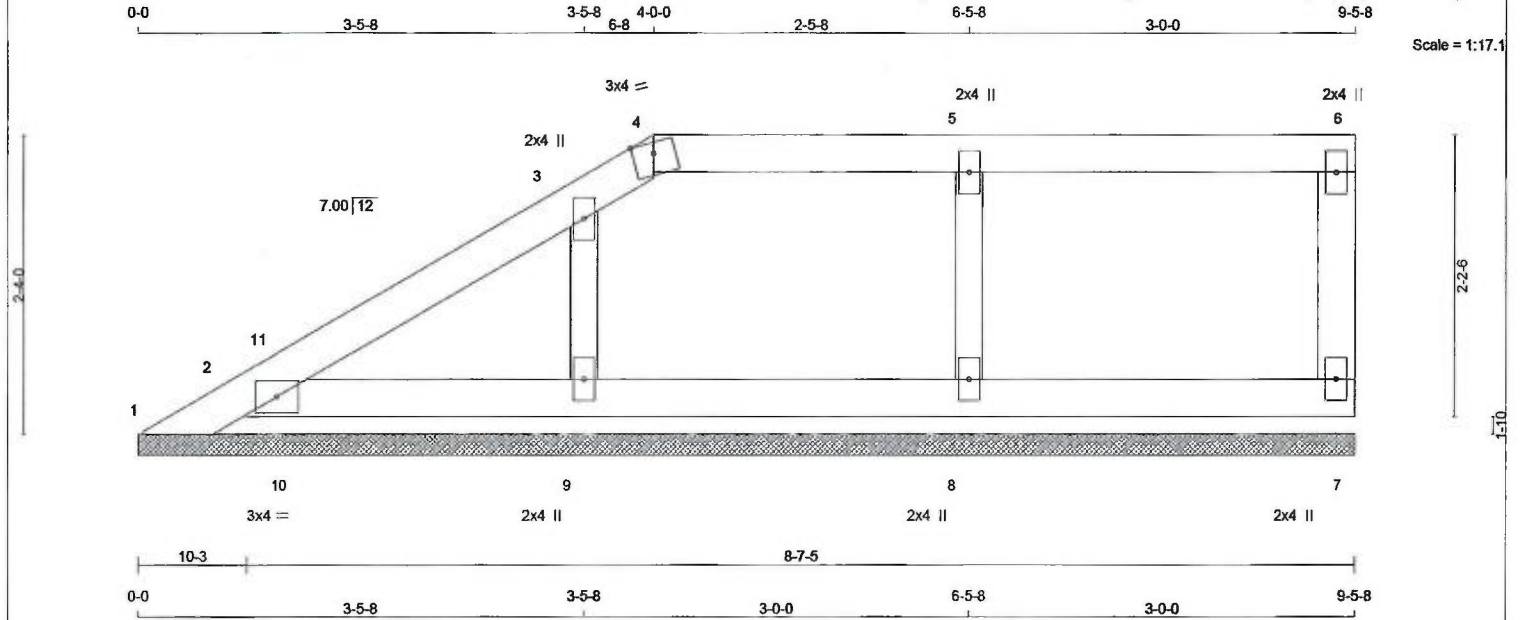
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.15 (2) (INPUT = 0.90)
JSI METAL= 0.05 (5) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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 26 = 51 lb
(M)

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY	No.2	SPF
4 - 6	2x4	DRY	No.2	SPF
7 - 6	2x4	DRY	No.2	SPF
2 - 7	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF
ALL GABLE WEBS	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

GABLE STUDS SPACED AT 3-0-0 OC.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMB1-I	MT20	3.0	4.0		
3	TMW+w	MT20	2.0	4.0		
4	TT-m	MT20	3.0	4.0		Edge
5	TMW+w	MT20	2.0	4.0		
6	TMV+p	MT20	2.0	4.0		
7	BMV1+p	MT20	2.0	4.0		
8	BMW1+w	MT20	2.0	4.0		
9	BMW1+w	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

THIS TRUSS DESIGNED FOR CONTINUOUS BEARINGS.

BEVELED PLATE OR SHIM REQUIRED TO PROVIDE FULL BEARING SURFACE WITH TRUSS CHORD AT JT(S): 7, 8, 9

PROVIDE ANCHORAGE AT BEARING JOINT 1 FOR 150 LBS FACTORED UPLIFT BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S)

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)

CHORDS				WEBS			
MEMB.	FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX (LC)	MEMB.	FORCE (LBS)	FACTORED MAX (LC)	MAX (LC)
FR-TO		FROM	TO	FR-TO		FROM	TO
1-2	0 / 16	-94.9	-94.9	0.04 (1)	10.00	8-5	-267 / 0
2-11	-48 / 0	-77.4	-77.4	0.04 (1)	6.25	9-3	-213 / 0
11-3	0 / 0	-77.4	-77.4	0.07 (1)	10.00	10-11	-14 / 24
3-4	-45 / 0	-77.4	-77.4	0.07 (1)	6.25		
4-5	0 / 0	-77.4	-77.4	0.10 (1)	10.00		
5-6	0 / 0	-77.4	-77.4	0.10 (1)	10.00		
7-6	-91 / 0	0.0	0.0	0.01 (1)	7.81		
2-10	0 / 10	-17.5	-17.5	0.01 (1)	10.00		
10-9	0 / 10	-17.5	-17.5	0.03 (4)	10.00		
9-8	0 / 0	-17.5	-17.5	0.04 (4)	10.00		
8-7	0 / 0	-17.5	-17.5	0.04 (4)	10.00		

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH. LL = 23.3 PSF
DL = 3.0 PSF

BOT CH. LL = 0.0 PSF
DL = 7.0 PSF

TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

CSI: TC=0.10/1.00 (4-5:1), BC=0.04/1.00 (7-8:4), WB=0.04/1.00 (5-8:1), SSI=0.11/1.00 (5-6:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY) (PSI)	(PLI)	SECTION (PLI)
MT20	618	354	1667 822 2264 1656

PLATE PLACEMENT TOL. = 0.250 inches

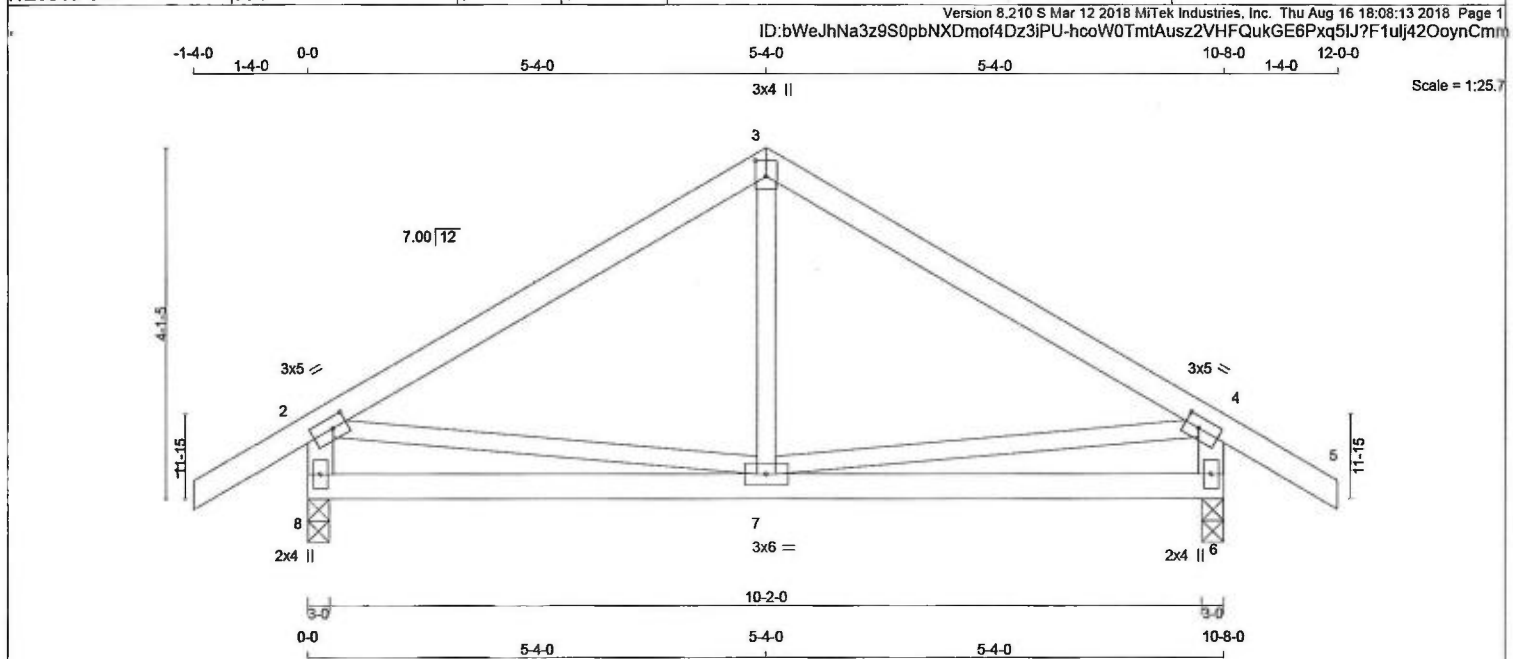
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.14 (8) (INPUT = 0.90)
JSI METAL= 0.05 (3) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 42 lb [M/JF]

LUMBER				DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER			
N. L. G. A. RULES	CHORDS	SIZE	LUMBER	BEARINGS			
1 - 3	2x4	DRY	No.2	FACTORED	MAXIMUM FACTORED	INPUT	REQD
3 - 5	2x4	DRY	No.2	GROSS REACTION	GROSS REACTION	BRG	BRG
8 - 2	2x4	DRY	No.2	JT VERT	DOWN	UPLIFT	IN-SX
8 - 4	2x4	DRY	No.2	8 615 0	615 0	0	3-0
8 - 6	2x4	DRY	No.2	6 615 0	615 0	0	3-0

ALL WEBS 2x3 DRY No.2 SPF
EXCEPT

DRY: SEASONED LUMBER.

UNFACTORED REACTIONS							
1ST LCASE	MAX/MIN COMPONENT REACTIONS						
JT COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL	
8 429	314 / 0	0 / 0	0 / 0	0 / 0	115 / 0	0 / 0	
6 429	314 / 0	0 / 0	0 / 0	0 / 0	115 / 0	0 / 0	

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 8, 6

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)

CHORDS				WEBS				ALLOWABLE DEFL (TL)= L/360 (0.36")	
MAX. FACTORED				MAX. FACTORED				CALCULATED VERT. DEFL. (TL) = L/ 999 (0.02")	
MEMB.	FORCE (LBS)	VERT. LOAD (PLF)	MAX CS1 (LC)	MAX. UNBRAC	MEMB.	FORCE (LBS)	MAX CS1 (LC)	CSI: TC=0.28/1.00 (3-4:1), BC=0.14/1.00 (7-8:4),	
FR-TO		FROM TO		LENGTH	FR-TO			WB=0.08/1.00 (2-7:1), SSI=0.14/1.00 (3-4:1)	
1-2	0 / 27	-77.4	-77.4 0.11 (1)	10.00	7-3	0 / 98	0.03 (4)	DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10	
2-3	-429 / 0	-77.4	-77.4 0.28 (1)	6.25	2-7	0 / 373	0.08 (1)	COMP=1.10 SHEAR=1.10 TENS= 1.10	
3-4	-429 / 0	-77.4	-77.4 0.28 (1)	6.25	7-4	0 / 373	0.08 (1)	COMPANION LIVE LOAD FACTOR = 0.50	
4-5	0 / 27	-77.4	-77.4 0.11 (1)	10.00					
8-2	-579 / 0	0.0	0.0 0.06 (1)	7.81					
6-4	-579 / 0	0.0	0.0 0.06 (1)	7.81					
8-7	0 / 0	-17.5	-17.5 0.14 (4)	10.00				TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN	

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.36")
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.36")
CALCULATED VERT. DEFL.(TL) = L/999 (0.02")

CSI: TC=0.28/1.00 (3-4:1), BC=0.14/1.00 (7-8:4), WB=0.08/1.00 (2-7:1), SSI=0.14/1.00 (3-4:1)

DOL LUMBER=1.00 NAIL=1.00 L.S BEND=1.10
COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

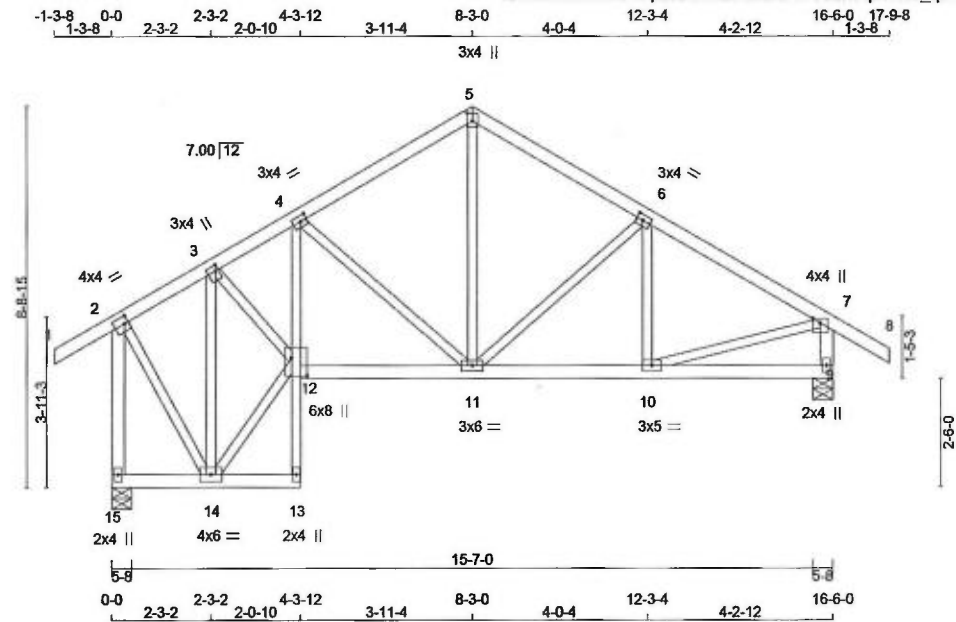
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.74 (7) (INPUT = 0.90)
JSI METAL= 0.18 (4) (INPUT = 1.00)

Aug 16, 2018

READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 85 lb [M/F]

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 5	2x4	DRY	No.2	SPF
5 - 8	2x4	DRY	No.2	SPF
15 - 2	2x4	DRY	No.2	SPF
9 - 7	2x4	DRY	No.2	SPF
15 - 13	2x4	DRY	No.2	SPF
13 - 4	2x3	DRY	No.2	SPF
12 - 9	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

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		
15	888	0	888	0	5-8	5-8
9	888	0	888	0	5-8	5-8

UNFACTORED REACTIONS

JT	1ST LCASE MAX/MIN COMPONENT REACTIONS					
	COMBINED	SNOW	LIVE	PERM. LIVE	WIND	DEAD
15	621	448 / 0	0 / 0	0 / 0	173 / 0	0 / 0
9	621	448 / 0	0 / 0	0 / 0	173 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 15, 9

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.	CHORDS MAX. FACTORED FORCE (LBS)		FACTORED VERT. LOAD (PLF)		MAX. CS1 (LC)	UNBRAC LENGTH	MEMB. FORCE (LBS)	WEBS MAX. FACTORED FORCE (LBS)	
	FROM	TO	FROM	TO				FROM	TO
FR-TO									
1-2	0 / 27	-77.4	-77.4	0.10 (1)	10.00	14-3	-892 / 0	0.37 (1)	
2-3	-359 / 0	-77.4	-77.4	0.06 (1)	6.25	14-12	0 / 536	0.12 (1)	
3-4	-873 / 0	-77.4	-77.4	0.12 (1)	6.25	3-12	0 / 697	0.16 (1)	
4-5	-649 / 0	-77.4	-77.4	0.15 (1)	6.25	4-11	-310 / 0	0.15 (1)	
5-6	-655 / 0	-77.4	-77.4	0.17 (1)	6.25	11-5	0 / 393	0.09 (1)	
6-7	-833 / 0	-77.4	-77.4	0.17 (1)	6.25	11-6	-249 / 0	0.12 (1)	
7-8	0 / 27	-77.4	-77.4	0.10 (1)	10.00	10-6	-120 / 31	0.03 (1)	
15-2	-871 / 0	0.0	0.0	0.22 (1)	7.81	2-14	0 / 583	0.13 (1)	
9-7	-856 / 0	0.0	0.0	0.09 (1)	7.81	10-7	0 / 760	0.17 (1)	
15-14	0 / 0	-17.5	-17.5	0.02 (4)	10.00				
14-13	0 / 3	-17.5	-17.5	0.02 (4)	10.00				
13-12	0 / 14	0.0	0.0	0.03 (1)	10.00				
12-4	0 / 50	0.0	0.0	0.03 (1)	10.00				
12-11	0 / 783	-17.5	-17.5	0.16 (1)	10.00				
11-10	0 / 735	-17.5	-17.5	0.16 (1)	10.00				
10-9	0 / 0	-17.5	-17.5	0.06 (4)	10.00				

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL) = $L/360$ (0.55")
CALCULATED VERT. DEFL. (LL) = $L/999$ (0.03")
ALLOWABLE DEFL. (TL) = $L/360$ (0.55")
CALCULATED VERT. DEFL. (TL) = $L/999$ (0.05")

CSI: TC=0.22/1.00 (2-15:1), BC=0.16/1.00 (11-12:1), WB=0.37/1.00 (3-14:1), SS=0.13/1.00 (6-7:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR	SECTION
(PSI)	(PLI)	(PLI)	
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches

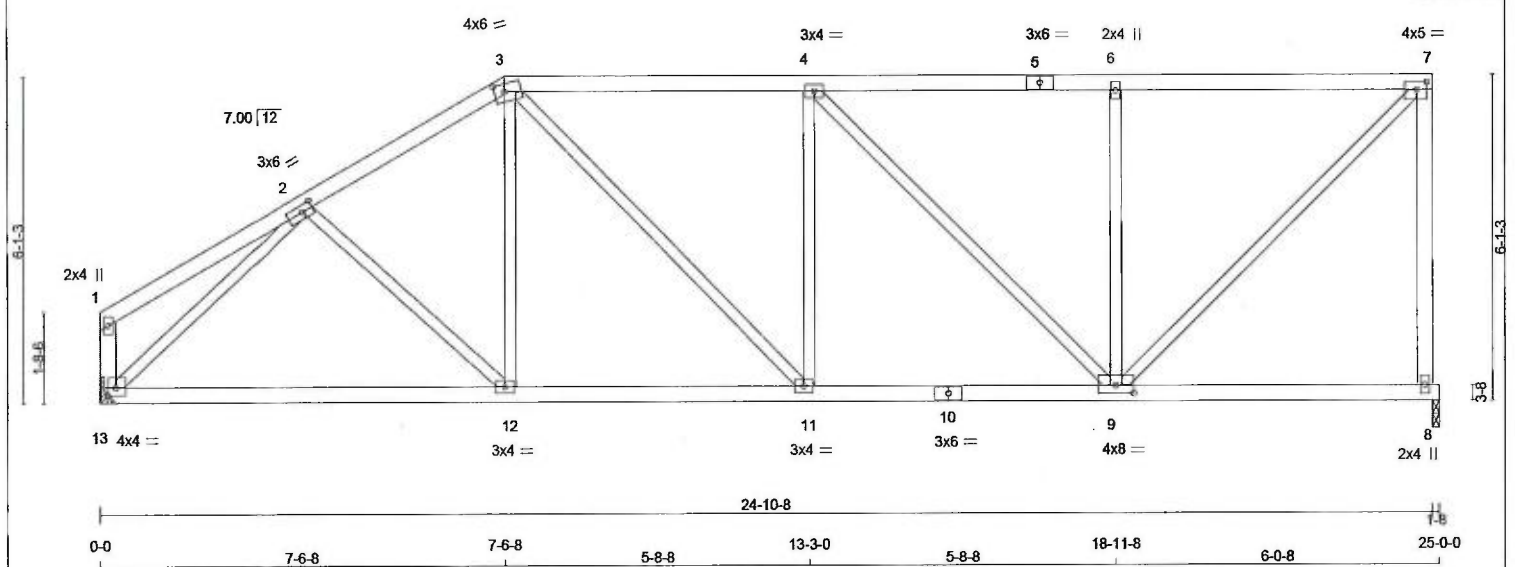
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.88 (11) (INPUT = 0.90)
JSI METAL= 0.27 (3) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





LUMBER
N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2
3 - 5	2x4	DRY	No.2
5 - 7	2x4	DRY	No.2
8 - 7	2x4	DRY	No.2
13 - 1	2x4	DRY	No.2
13 - 10	2x4	DRY	No.2
10 - 8	2x4	DRY	No.2
ALL WEBS	2x3	DRY	No.2

EXCEPT
SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMV+p	MT20	2.0	4.0		
2	TMWW-l	MT20	3.0	6.0	1.50	2.50
3	TTWW-m	MT20	4.0	6.0	1.75	2.25
4	TMWW-l	MT20	3.0	4.0		
5	TS-l	MT20	3.0	6.0		
6	TMW+w	MT20	2.0	4.0		
7	TMVW-l	MT20	4.0	5.0	1.75	2.25
8	BMV1+p	MT20	2.0	4.0		
9	BMWWW-l	MT20	4.0	8.0	1.75	4.00
10	BS-l	MT20	3.0	6.0		
11	BMWW-l	MT20	3.0	4.0		
12	BMWW-l	MT20	3.0	4.0		
13	BMVW1-l	MT20	4.0	4.0	1.75	1.75

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
8	VERT 1180 0	DOWN 1180 0	0 0	1-8 1-8
13	HORZ 1180 0	UP 1180 0	0 0	MECHANICAL

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 13 TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX/MIN. SNOW	LIVE	PERM. LIVE	WIND	DEAD	SOIL
8	828	579 / 0	0 / 0	0 / 0	0 / 0	249 / 0	0 / 0
13	828	579 / 0	0 / 0	0 / 0	0 / 0	249 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 8

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.18 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. CSI (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. CSI (LC)	
FR-TO		FROM TO		FR-TO			
1-2	0 / 16	-77.4 -77.4	0.17 (1)	10.00	2-12	0 / 61	0.02 (4)
2-3	-1273 / 0	-77.4 -77.4	0.19 (1)	5.49	12-3	0 / 119	0.04 (4)
3-4	-1304 / 0	-77.4 -77.4	0.39 (1)	5.18	3-11	0 / 310	0.07 (1)
4-5	-970 / 0	-77.4 -77.4	0.39 (1)	5.78	11-4	-139 / 44	0.08 (1)
5-6	-970 / 0	-77.4 -77.4	0.39 (1)	5.78	4-9	-476 / 0	0.66 (1)
6-7	-970 / 0	-77.4 -77.4	0.39 (1)	5.78	9-6	-495 / 0	0.29 (1)
8-7	-1138 / 0	0.0 0.0	0.82 (1)	7.45	9-7	0 / 1359	0.31 (1)
13-1	-114 / 0	0.0 0.0	0.01 (1)	7.81	13-2	-1467 / 0	0.63 (1)
13-12	0 / 1063	-17.5 -17.5	0.29 (1)	10.00			
12-11	0 / 1086	-17.5 -17.5	0.30 (4)	10.00			
11-10	0 / 1304	-17.5 -17.5	0.29 (1)	10.00			
10-9	0 / 1304	-17.5 -17.5	0.29 (1)	10.00			
9-8	0 / 0	-17.5 -17.5	0.15 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL) = $L/360$ (0.83")
CALCULATED VERT. DEFL. (LL) = $L/999$ (0.05")
ALLOWABLE DEFL. (TL) = $L/360$ (0.83")
CALCULATED VERT. DEFL. (TL) = $L/999$ (0.12")

CSI: TC=0.82/1.00 (7-8:1), BC=0.30/1.00 (11-12:4), WB=0.66/1.00 (4-9:1), SSI=0.21/1.00 (6-7:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

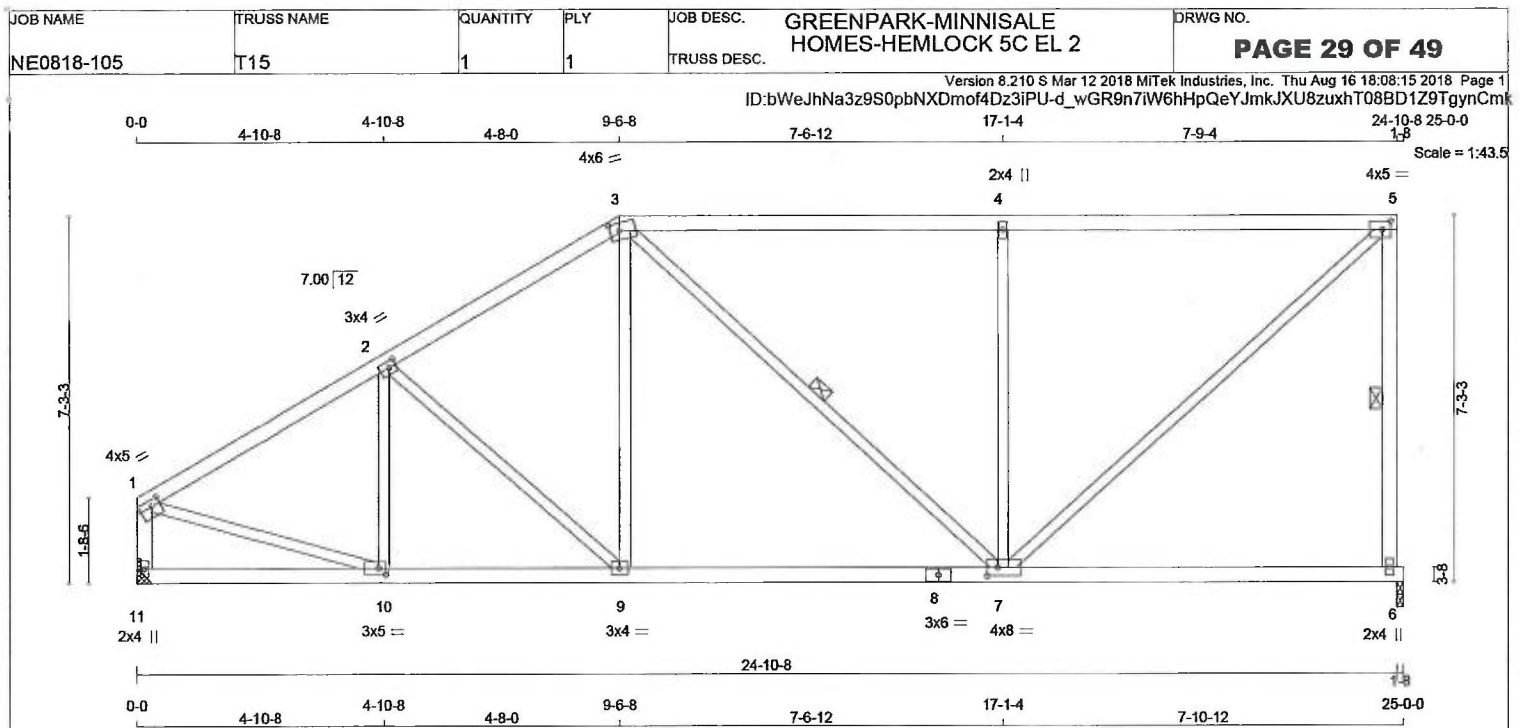
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (13) (INPUT = 0.90)
JSI METAL= 0.40 (13) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





LUMBER TOTAL WEIGHT = 107 lb [M]

N. L. G. A. RULES	SIZE	LUMBER	DESCR.
CHORDS			
1 - 3	2x4 DRY	No.2	SPF
3 - 5	2x4 DRY	No.2	SPF
6 - 5	2x4 DRY	No.2	SPF
11 - 1	2x4 DRY	No.2	SPF
11 - 8	2x4 DRY	No.2	SPF
8 - 6	2x4 DRY	No.2	SPF
ALL WEBS EXCEPT	2x3 DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT TYPE	PLATES	W	LEN	Y	X
1 TMVW-I	MT20	4.0	5.0	1.50	2.00
2 TMWW-I	MT20	3.0	4.0	1.50	1.75
3 TTWW-m	MT20	4.0	6.0	1.75	2.25
4 TMW+w	MT20	2.0	4.0		
5 TMVW-I	MT20	4.0	5.0	2.00	2.00
6 BMV1+p	MT20	2.0	4.0		
7 BMWWW-I	MT20	4.0	8.0	2.00	2.50
8 BS-I	MT20	3.0	6.0		
9 BMWW-I	MT20	3.0	4.0		
10 BMWW-I	MT20	3.0	5.0	1.50	1.75
11 BMV1+p	MT20	2.0	4.0		

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

BEARINGS		FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
JT	VERT	GROSS REACTION	HORZ	GROSS REACTION	DOWN	HORZ	UPLIFT	IN-SX	BRG
6	1180	0	1180	0	0	0	1-8	1-8	
11	1180	0	1180	0	0	0	MECHANICAL		

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 11 TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
6	828	579 / 0	0 / 0	0 / 0	0 / 0	249 / 0	0 / 0
11	828	579 / 0	0 / 0	0 / 0	0 / 0	249 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.54 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 5-6, 3-7. DBS = 20-0-0. CBF = 141 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. UNBRACED LENGTH (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH (LC)	
FR-TO		FROM TO		FR-TO			
1-2	-1308 / 0	-77.4 -77.4 0.33 (1)	5.26	10-2	-242 / 3	0.07 (1)	
2-3	-1183 / 0	-77.4 -77.4 0.32 (1)	5.46	2-9	-197 / 0	0.14 (1)	
3-4	-999 / 0	-77.4 -77.4 0.88 (1)	4.54	9-3	0 / 236	0.05 (1)	
4-5	-999 / 0	-77.4 -77.4 0.88 (1)	4.54	3-7	-14 / 0	0.01 (4)	
6-5	-1125 / 0	0.0 0.0 0.27 (1)	5.98	7-4	-737 / 0	0.69 (1)	
11-1	-1142 / 0	0.0 0.0 0.12 (1)	7.44	7-5	0 / 1342	0.30 (1)	
				1-10	0 / 1194	0.27 (1)	
11-10	0 / 0	-17.5 -17.5 0.08 (4)	10.00				
10-9	0 / 1149	-17.5 -17.5 0.26 (1)	10.00				
9-8	0 / 1005	-17.5 -17.5 0.34 (4)	10.00				
8-7	0 / 1005	-17.5 -17.5 0.34 (4)	10.00				
7-6	0 / 0	-17.5 -17.5 0.26 (4)	10.00				

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.83")
CALCULATED VERT. DEFL.(LL) = L/999 (0.05")
ALLOWABLE DEFL.(TL) = L/360 (0.83")
CALCULATED VERT. DEFL.(TL) = L/999 (0.12")

CSI: TC=0.88/1.00 (4-5:1), BC=0.34/1.00 (7-9:4), WB=0.69/1.00 (4-7:1), SSI=0.29/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

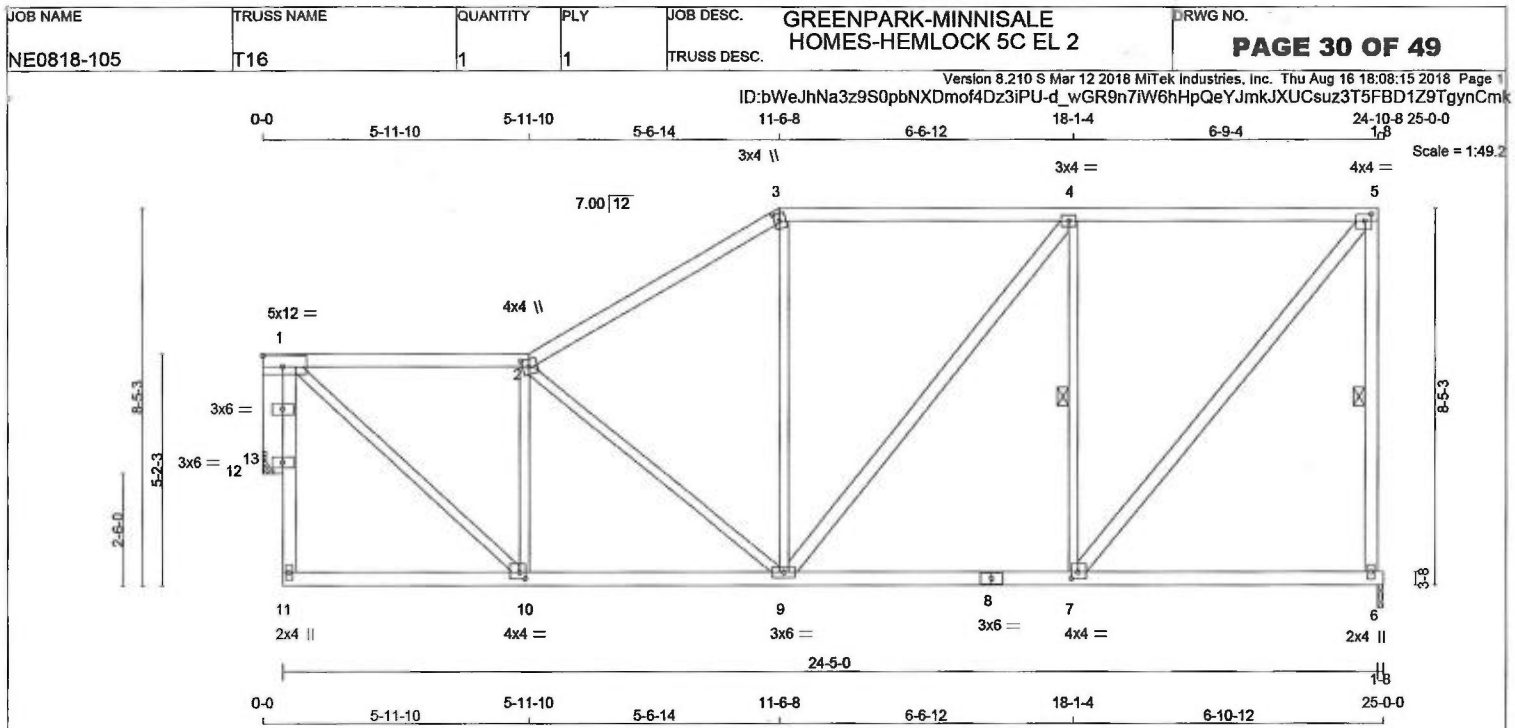
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (10) (INPUT = 0.90)
JSI METAL= 0.42 (1) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

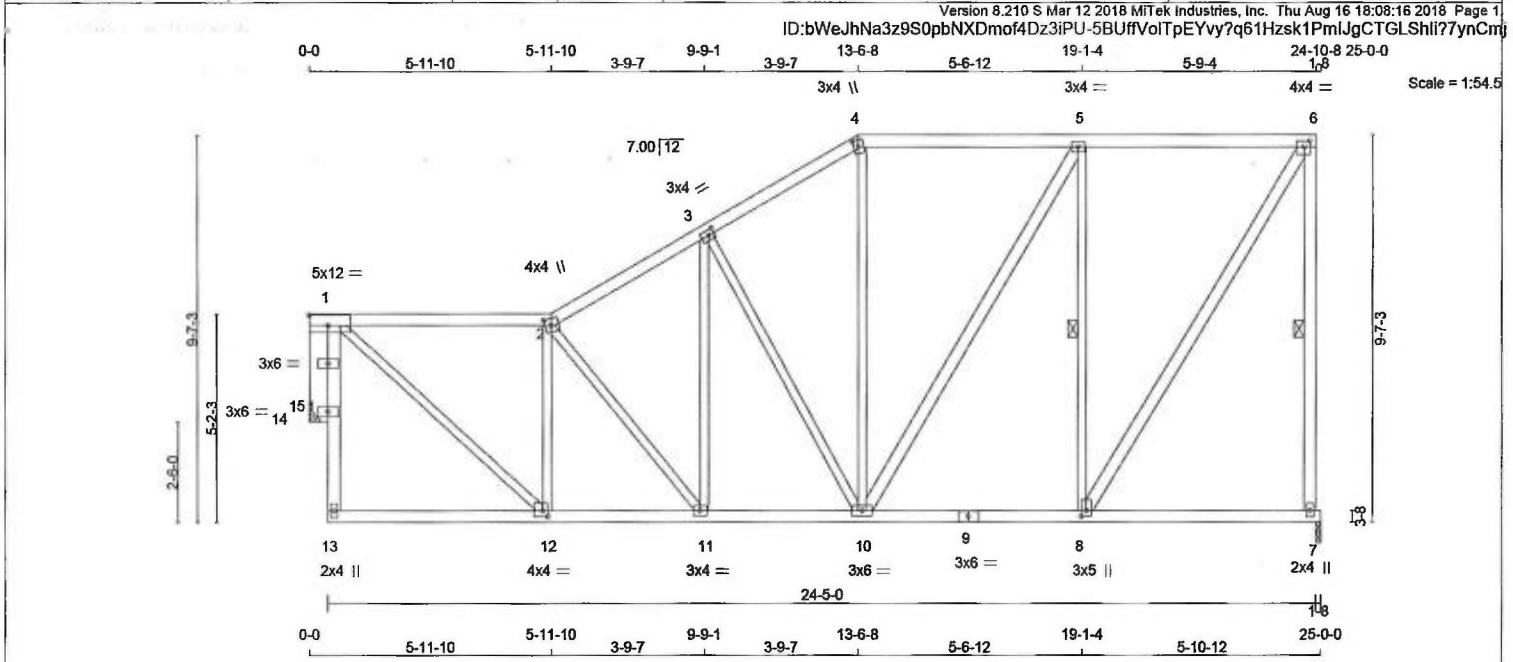




LUMBER N. L. G. A. RULES CHORDS SIZE LUMBER DESCR. 11 - 1 2x4 DRY No.2 SPF 1 - 2 2x4 DRY No.2 SPF 2 - 3 2x4 DRY No.2 SPF 3 - 5 2x4 DRY No.2 SPF 6 - 5 2x4 DRY No.2 SPF 11 - 8 2x4 DRY No.2 SPF 8 - 6 2x4 DRY No.2 SPF BEARING BLOCKS BL1 2x6 DRY No.2 SPF ALL WEBS EXCEPT 9 - 4 2x4 DRY No.2 SPF 7 - 5 2x4 DRY 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. PLATES (table is in inches) JT TYPE PLATES W LEN Y X 1 TMVWK1-t MT20 5.0 12.0 3.00 Edge 2 TTWW+m MT20 4.0 4.0 2.00 1.75 3 TTW+m MT20 3.0 4.0 2.00 1.25 4 TMWW-t MT20 3.0 4.0 5 TMVW-t MT20 4.0 4.0 1.75 1.75 6 BMV1+p MT20 2.0 4.0 7 BMVW-t MT20 4.0 4.0 1.75 1.75 8 BS-t MT20 3.0 6.0 9 BMVWW-t MT20 3.0 6.0 10 BMVW-t MT20 4.0 4.0 1.75 1.50 11 BMV+p MT20 2.0 4.0 12 KP-p MT20 3.0 6.0 12 KP-p MT20 3.0 6.0 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 UPLIFT IN-SX IN-SX 13(1) 1143 0 1143 0 0 MECHANICAL 6 1173 0 1173 0 0 1-8 1-8 A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 13(1) TO RESIST THE MAX FACTORED REACTIONS. UNFACTORED REACTIONS 1ST LCASE MAX/MIN. COMPONENT REACTIONS JT COMBINED SNOW LIVE PERM.LIVE WIND DEAD SOIL 13(1) 802 561/0 0/0 0/0 0/0 241/0 0/0 6 823 576/0 0/0 0/0 0/0 247/0 0/0 BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6 BRACING TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.44 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. 1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 5-6, 4-7. DBS = 20-0-0. CBF = 141 LBS. DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12. 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 FACTORED WEBS MEMB. MAX. FORCE VERT. LOAD LC1 MAX MAX. MEMB. MAX. FORCE MAX (LBS) (PLF) CSI (LC) UNBRAC LENGTH FR-TO (LBS) CSI (LC) FR-TO FROM TO 11-12 0/42 0.0 0.0 0.24 (1) 10.00 1-10 0/1332 0.30 (1) 12-1 0/42 0.0 0.0 0.24 (1) 10.00 10-2 -787/0 0.31 (1) 1-2 -1061/0 -77.4 -77.4 0.44 (1) 5.48 2-9 -249/0 0.28 (1) 2-3 -1029/0 -77.4 -77.4 0.46 (1) 5.53 9-3 0/112 0.04 (4) 3-4 -890/0 -77.4 -77.4 0.63 (1) 5.44 9-4 0/194 0.03 (1) 4-5 -770/0 -77.4 -77.4 0.63 (1) 5.76 7-4 -793/0 0.36 (1) 6-5 -1125/0 0.0 0.0 0.36 (1) 5.98 7-5 0/1204 0.19 (1) 11-10 0/73 -17.5 -17.5 0.13 (4) 10.00 12-13 -1152/0 0.12 (1) 10-9 0/1078 -17.5 -17.5 0.24 (1) 10.00 9-8 0/770 -17.5 -17.5 0.25 (4) 10.00 8-7 0/770 -17.5 -17.5 0.25 (4) 10.00 7-6 0/0 -17.5 -17.5 0.19 (4) 10.00				DESIGN CRITERIA SPECIFIED LOADS: TOP CH. LL = 23.3 PSF DL = 3.0 PSF BOT CH. LL = 0.0 PSF DL = 7.0 PSF TOTAL LOAD = 33.3 PSF SPACING = 24.0 IN. C/C LOADING IN ALL FLAT SECTIONS BASED ON A SLOPE OF 2.00/12 MINIMUM THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCS 2010 THIS DESIGN COMPLIES WITH: - PART 9 OF OBC 2012, BCBC 2012, ABC 2014 - CSA 086-09 - TPIC 2011 (55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD ALLOWABLE DEFL.(LL)= L/360 (0.81") CALCULATED VERT. DEFL.(LL) = L/999 (0.05") ALLOWABLE DEFL.(TL)= L/360 (0.81") CALCULATED VERT. DEFL.(TL) = L/999 (0.09") CSI: TC=0.63/1.00 (3-4:1), BC=0.25/1.00 (7-9:4), WB=0.36/1.00 (4-7:1), SSI=0.25/1.00 (4-5:1) DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10 COMPANION LIVE LOAD FACTOR = 0.50 AUTOSOLVE RIGHT 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) MAX MIN MAX MIN MT20 618 354 1667 822 2284 1656 PLATE PLACEMENT TOL. = 0.250 inches PLATE ROTATION TOL. = 5.0 Deg. JSI GRIP= 0.90 (7) (INPUT = 0.90) JSI METAL= 0.38 (10) (INPUT = 1.00)			
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LUMBER	N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
13 - 1	2x4	DRY	No.2	SPF	
1 - 2	2x4	DRY	No.2	SPF	
2 - 4	2x4	DRY	No.2	SPF	
4 - 6	2x4	DRY	No.2	SPF	
7 - 6	2x4	DRY	No.2	SPF	
13 - 9	2x4	DRY	No.2	SPF	
9 - 7	2x4	DRY	No.2	SPF	
BEARING BLOCKS					
BL1	2x6	DRY	No.2	SPF	
ALL WEBS	2x3	DRY	No.2	SPF	
EXCEPT					
10 - 5	2x4	DRY	No.2	SPF	
8 - 6	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.

PLATES (table is in inches)	JT	TYPE	PLATES	W	LEN	Y	X
1	TMVWK1-1	MT20	5.0	12.0	3.00	Edge	
2	TTWW+m	MT20	4.0	4.0	2.00	1.75	
3	TMVW-1	MT20	3.0	4.0	1.50	1.75	
4	TTW+m	MT20	3.0	4.0	2.00	1.25	
5	TMVW-1	MT20	3.0	4.0			
6	TMVW-1	MT20	4.0	4.0	1.75	1.75	
7	BMV1+p	MT20	2.0	4.0			
8	BMVW+1	MT20	3.0	5.0	1.75	1.50	
9	BS-1	MT20	3.0	6.0			
10	BMVW-1	MT20	3.0	6.0			
11	BMVW-1	MT20	3.0	4.0			
12	BMVW-1	MT20	4.0	4.0	1.75	1.50	
13	BMV+p	MT20	2.0	4.0			
14	KP-p	MT20	3.0	6.0			
14	KP-p	MT20	3.0	6.0			

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	REQRD
GROSS REACTION	GROSS REACTION	GROSS REACTION	BRG	BRG
JT	VERT	HORZ	DOWN	HORZ
15(1)	1143	0	1143	0
7	1173	0	1173	0

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 15(1) TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
15(1)	802	561 / 0	0 / 0	0 / 0	0 / 0	241 / 0	0 / 0
7	823	576 / 0	0 / 0	0 / 0	0 / 0	247 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.49 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 6-7, 5-8. DBS = 20-0-0. CBF = 142 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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

LOADING	CHORDS	WEBS
MEMB.	MAX. FACTORED	MAX. FACTORED
FR-TO	FORCE (LBS)	FORCE (LBS)
13-14	0/44	0/1331
14-1	0/44	-795/0
1-2	-1060/0	-137/0
2-3	-1130/0	0/161
3-4	-913/0	-457/0
4-5	-774/0	0/179
5-6	-586/0	0/353
7-6	-1132/0	-848/0
13-12	0/73	0/1131
12-11	0/1077	-1152/0
11-10	0/993	0/141
10-9	0/596	
9-8	0/596	
8-7	0/0	

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN./C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.81")
CALCULATED VERT. DEFL.(LL) = L/999 (0.05")
ALLOWABLE DEFL.(TL) = L/360 (0.81")
CALCULATED VERT. DEFL.(TL) = L/999 (0.09")

CSI: TC=0.50/1.00 (6-7:1), BC=0.23/1.00 (11-12:1), WB=0.63/1.00 (3-10:1), SSI=0.21/1.00 (5-6:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

AUTOSOLVE RIGHT 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)
MAX MIN MAX MIN MAX MIN
MT20 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.88 (1) (INPUT = 0.90)
JSI METAL= 0.38 (12) (INPUT = 1.00)

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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.
NE0818-105	T18	3	1	GREENPARK-MINNISALE HOMES-HEMLOCK 5C EL 2	PAGE 33 OF 49

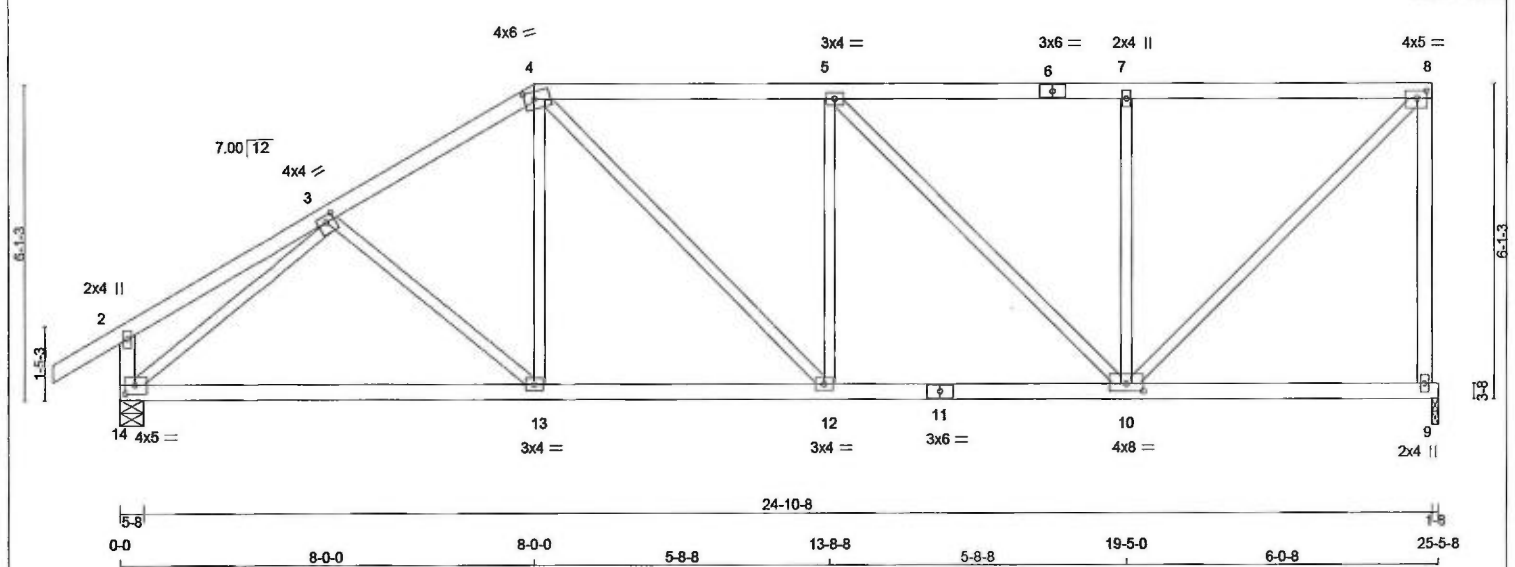
Version 8.210 S Mar 12 2018 MiTek Industries, Inc. Thu Aug 16 18:08:17 2018 Page 2
ID:bWeJhNa3z9S0pbNXDmof4Dz3iPU-ZN21srpOE7MPW6a0fkpCOyZXJieqxxdUgL2GXZynCmi

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

JSI GRIP= 0.90 (1) (INPUT = 0.90)
JSI METAL= 0.38 (11) (INPUT = 1.00)

READ ALL NOTES ON THIS PAGE AND ON
ENGINEERING NOTE PAGE ENP-1. THIS
NOTE PAGE IS AN INTEGRAL PART OF
THIS DRAWING AS IT CONTAINS
SPECIFICATIONS AND CRITERIA USED IN
THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 109 lb [M]

LUMBER				DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER			
N. L. G. A. RULES	SIZE	LUMBER	DESCR.	BEARINGS			
1 - 4	2x4	DRY	No.2	SPF	FACTORED	MAXIMUM FACTORED	INPUT
4 - 6	2x4	DRY	No.2	SPF	GROSS REACTION	GROSS REACTION	BRG
6 - 8	2x4	DRY	No.2	SPF	JT VERT	DOWN	UPLIFT
9 - 8	2x4	DRY	No.2	SPF	1202	0	1-8
14 - 2	2x4	DRY	No.2	SPF	1307	0	5-8
14 - 11	2x4	DRY	No.2	SPF			
11 - 9	2x4	DRY	No.2	SPF			

UNFACTORED REACTIONS				1ST LCASE MAX/MIN COMPONENT REACTIONS			
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
9	843	590 / 0	0 / 0	0 / 0	0 / 0	253 / 0	0 / 0
14	915	654 / 0	0 / 0	0 / 0	0 / 0	262 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 9, 14

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.11 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. UNBRACED LENGTH (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH (LC)	
FR-TO		FROM TO		FR-TO			
1-2	0 / 27	-77.4	-77.4 0.10 (1)	10.00	3-13	-45 / 45	0.02 (1)
2-3	0 / 17	-77.4	-77.4 0.19 (1)	10.00	13-4	0 / 175	0.05 (4)
3-4	-1350 / 0	-77.4	-77.4 0.22 (1)	5.34	4-12	0 / 277	0.06 (1)
4-5	-1347 / 0	-77.4	-77.4 0.39 (1)	5.11	12-5	-118 / 50	0.07 (1)
5-6	-992 / 0	-77.4	-77.4 0.39 (1)	5.73	5-10	-506 / 0	0.70 (1)
6-7	-992 / 0	-77.4	-77.4 0.39 (1)	5.73	10-7	-495 / 0	0.29 (1)
7-8	-992 / 0	-77.4	-77.4 0.39 (1)	5.73	10-8	0 / 1391	0.31 (1)
9-8	-1160 / 0	0.0	0.0 0.83 (1)	7.40	14-3	-1565 / 0	0.71 (1)
14-2	-227 / 0	0.0	0.0 0.02 (1)	7.81			
14-13	0 / 1185	-17.5	-17.5 0.33 (1)	10.00			
13-12	0 / 1153	-17.5	-17.5 0.33 (4)	10.00			
12-11	0 / 1347	-17.5	-17.5 0.30 (1)	10.00			
11-10	0 / 1347	-17.5	-17.5 0.30 (1)	10.00			
10-9	0 / 0	-17.5	-17.5 0.15 (4)	10.00			

DESIGN CRITERIA
SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.84")
CALCULATED VERT. DEFL.(LL)= L/999 (0.05")
ALLOWABLE DEFL.(TL)= L/360 (0.84")
CALCULATED VERT. DEFL.(TL)= L/999 (0.15")

CSI: TC=0.83/1.00 (8-9:1), BC=0.33/1.00 (12-13:4), WB=0.71/1.00 (3-14:1), SSI=0.21/1.00 (7-8:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

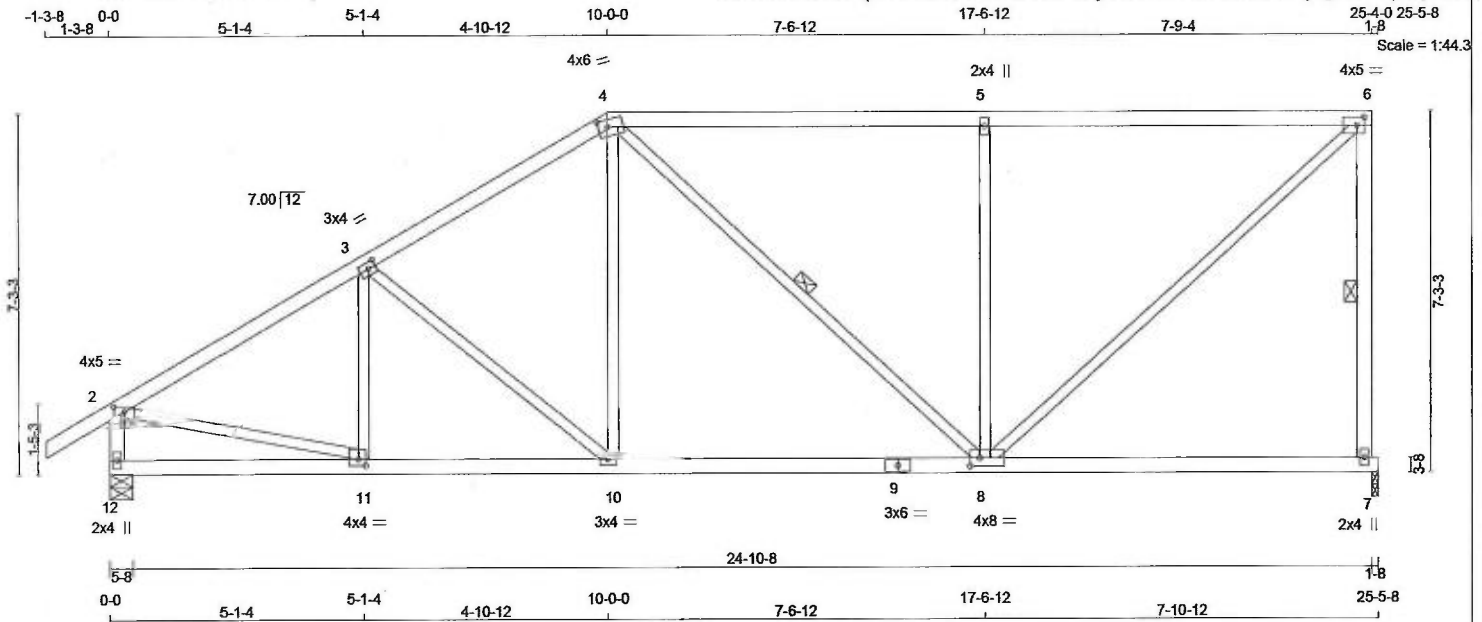
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (14) (INPUT = 0.90)
JSI METAL= 0.57 (3) (INPUT = 1.00)

PROFESSIONAL ENGINEER
N.A. EL-MASRI
Aug 16, 2018

READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 109 lb

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY	No.2	SPF
4 - 6	2x4	DRY	No.2	SPF
7 - 6	2x4	DRY	No.2	SPF
12 - 2	2x4	DRY	No.2	SPF
12 - 9	2x4	DRY	No.2	SPF
9 - 7	2x4	DRY	No.2	SPF

ALL WEBS 2x3 DRY No.2 SPF
EXCEPT

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMVW-p	MT20	4.0	5.0	1.25	2.50
3	TMWW-l	MT20	3.0	4.0	1.50	1.75
4	TTWW-m	MT20	4.0	6.0	1.75	2.25
5	TMW+w	MT20	2.0	4.0		
6	TMVW-l	MT20	4.0	5.0	2.00	1.75
7	BMV1+p	MT20	2.0	4.0		
8	BMWWW-l	MT20	4.0	8.0	2.00	2.25
9	BS-l	MT20	3.0	6.0		
10	BMWW-l	MT20	3.0	4.0		
11	BMWW-l	MT20	4.0	4.0	1.50	1.75
12	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 DOWN	REQRD BRG IN-SX
JT	VERT	HORZ	DOWN	HORZ UPLIFT IN-SX
7	1202	0	1202	0
12	1307	0	1307	0

UNFACTORED REACTIONS

	1ST LCASE	MAX./MIN.	COMPONENT REACTIONS	
JT	COMBINED	SNOW	LIVE	PERM.LIVE WIND DEAD SOIL
7	843	590 / 0	0 / 0	0 / 0 253 / 0 0 / 0
12	915	654 / 0	0 / 0	0 / 0 262 / 0 0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7, 12

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.50 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 6-7, 4-8. DBS = 20-0-0. CBF = 143 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. FACTORED CSI (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED CSI (LC)	
FR-TO		FROM TO		FR-TO			
1-2	0 / 27	-77.4	0.10 (1)	10.00	11-3	-187 / 24	0.05 (1)
2-3	-1434 / 0	-77.4	0.38 (1)	5.02	3-10	-271 / 0	0.20 (1)
3-4	-1239 / 0	-77.4	0.36 (1)	5.32	10-4	0 / 279	0.06 (1)
4-5	-1023 / 0	-77.4	0.88 (1)	4.50	4-8	-41 / 0	0.03 (1)
5-6	-1023 / 0	-77.4	0.89 (1)	4.50	8-5	-737 / 0	0.69 (1)
7-6	-1147 / 0	0.0	0.27 (1)	5.94	8-6	0 / 1375	0.31 (1)
12-2	-1268 / 0	0.0	0.13 (1)	7.15	2-11	0 / 1268	0.29 (1)
12-11	0 / 0	-17.5	-17.5 0.09 (4)	10.00			
11-10	0 / 1258	-17.5	-17.5 0.27 (1)	10.00			
10-9	0 / 1053	-17.5	-17.5 0.34 (4)	10.00			
9-8	0 / 1053	-17.5	-17.5 0.34 (4)	10.00			
8-7	0 / 0	-17.5	-17.5 0.26 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD = 33.3	PSF	

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, CBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.84")
CALCULATED VERT. DEFL.(LL) = L/999 (0.05")
ALLOWABLE DEFL.(TL) = L/360 (0.84")
CALCULATED VERT. DEFL.(TL) = L/999 (0.12")

CSI: TC=0.89/1.00 (5-6:1), BC=0.34/1.00 (8-10:4), WB=0.69/1.00 (5-8:1), SSI=0.29/1.00 (5-6:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES
PLATE GRIP(DRY) SHEAR SECTION (PLI)
MAX MIN MAX MIN MAX MIN
MT20 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

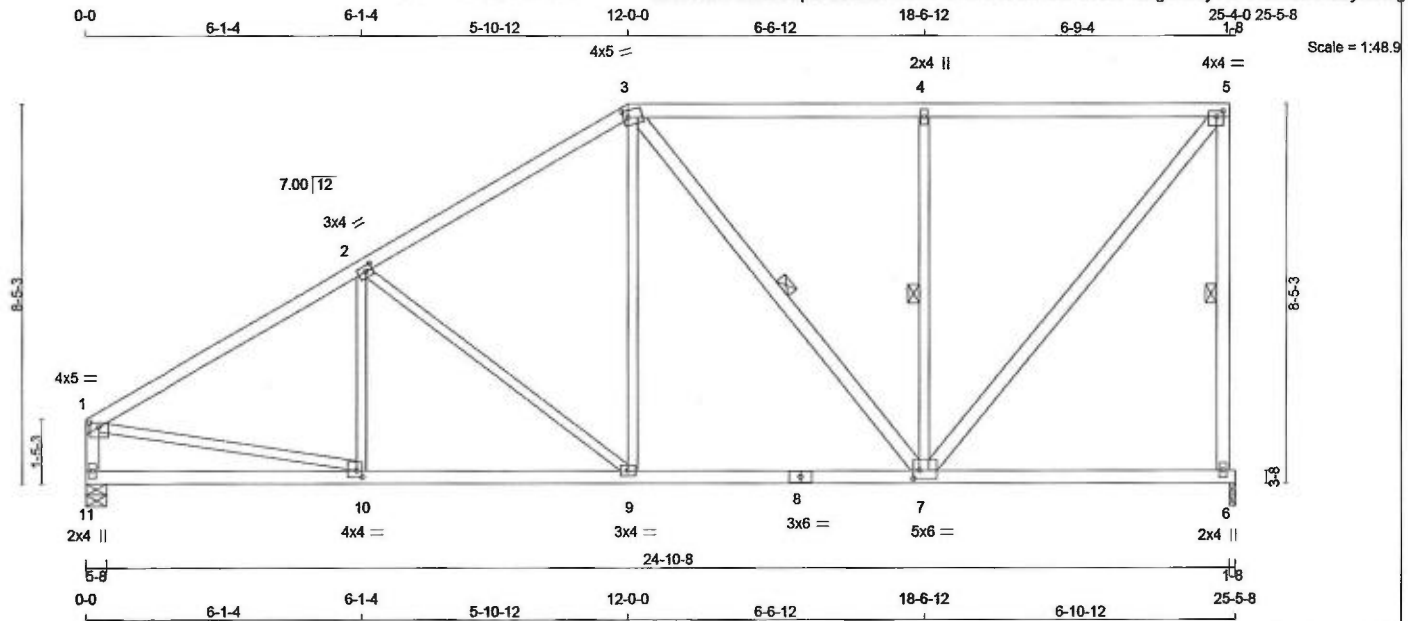
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (11) (INPUT = 0.90)
JSI METAL= 0.47 (11) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 120 lb

LUMBER				
N. L. G. A. RULES				
CHORDS	SIZE		LUMBER	DESCR
1 - 3	2x4	DRY	No.2	SPF
3 - 5	2x4	DRY	No.2	SPF
6 - 5	2x4	DRY	No.2	SPF
11 - 1	2x4	DRY	No.2	SPF
11 - 8	2x4	DRY	No.2	SPF
8 - 6	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF
3 - 7	2x4	DRY	No.2	SPF
7 - 5	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES		(table is in inches)				
JT	TYPE	PLATES	W	LEN	Y	X
1	TMWV-p	MT20	4.0	5.0	1.25	2.50
2	TMWV-l	MT20	3.0	4.0	1.50	1.75
3	TTWV-m	MT20	4.0	5.0	1.75	1.25
4	TMV+rw	MT20	2.0	4.0		
5	TMWV-l	MT20	4.0	4.0	1.50	1.75
6	BMV1+p	MT20	2.0	4.0		
7	BMWVVW-l	MT20	5.0	6.0	2.25	1.50
8	BS-t	MT20	3.0	6.0		
9	BMWVV-l	MT20	3.0	4.0		
10	BMWV-t	MT20	4.0	4.0	1.75	1.50
11	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	UPLIFT	IN-SX	IN-SX
6	1202	0	1202	0	0	1-8	1-8
11	1202	0	1202	0	0	5-8	5-8

UNFACTORED REACTIONS

1ST LCASE		MAX./MIN. COMPONENT REACTIONS					
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
6	843	590 / 0	0 / 0	0 / 0	0 / 0	253 / 0	0 / 0
11	843	590 / 0	0 / 0	0 / 0	0 / 0	253 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6, 11

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.73 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 5-6, 3-7, 4-7. DBS = 20-0-0. CBF = 144 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS : 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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				
MAX. FACTORED		FACTORED		MAX. FACTORED		FACTORED		
MEMB.	FORCE	VERT. LOAD	LC1	MAX.	MAX.	MEMB.	FORCE	MAX.
	(LBS)	(PLF)		CSI (LC)	UNBRAC		(LBS)	CSI (LC)
FR-TO		FROM	TO		LENGTH	FR-TO		
1-2	-1447 / 0	-77.4	-77.4	0.58 (1)	5.73	10-2	-117 / 65	0.04 (1)
2-3	-1113 / 0	-77.4	-77.4	0.53 (1)	4.27	2-9	-429 / 0	0.50 (1)
3-4	-793 / 0	-77.4	-77.4	0.62 (1)	5.70	9-3	0 / 367	0.08 (1)
4-5	-794 / 0	-77.4	-77.4	0.63 (1)	5.70	3-7	-233 / 0	0.13 (1)
6-5	-1154 / 0	0.0	0.0	0.37 (1)	5.93	7-4	-641 / 0	0.29 (1)
11-1	-1157 / 0	0.0	0.0	0.12 (1)	7.40	7-5	0 / 1241	0.20 (1)
						1-10	0 / 1295	0.29 (1)
11-10	0 / 0	-17.5	-17.5	0.15 (4)	10.00			
10-9	0 / 1273	-17.5	-17.5	0.28 (1)	10.00			
9-8	0 / 940	-17.5	-17.5	0.26 (4)	10.00			
8-7	0 / 940	-17.5	-17.5	0.26 (4)	10.00			
7-6	0 / 0	-17.5	-17.5	0.19 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	23.3	PSF
	DL =	3.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.0	PSF
TOTAL LOAD	=	33.3	PSF

DL	=	7.0	PSF
TOTAL LOAD	=	33.3	PSF

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL
OR SMALL BUILDING REQUIREMENTS OF
PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012 , BCBC 2012 , ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= 1/360 (0.84")
CALCULATED VERT. DEFL.(LL) = 1/999 (0.05")
ALLOWABLE DEFL.(TL)= 1/360 (0.84")
CALCULATED VERT. DEFL.(TL) = 1/999 (0.09")

CSI: TC=0.63/1.00 (4-5:1), BC=0.28/1.00 (9-10:1),
WB=0.50/1.00 (2-9:1), SSI=0.25/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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	618	354	1667	822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

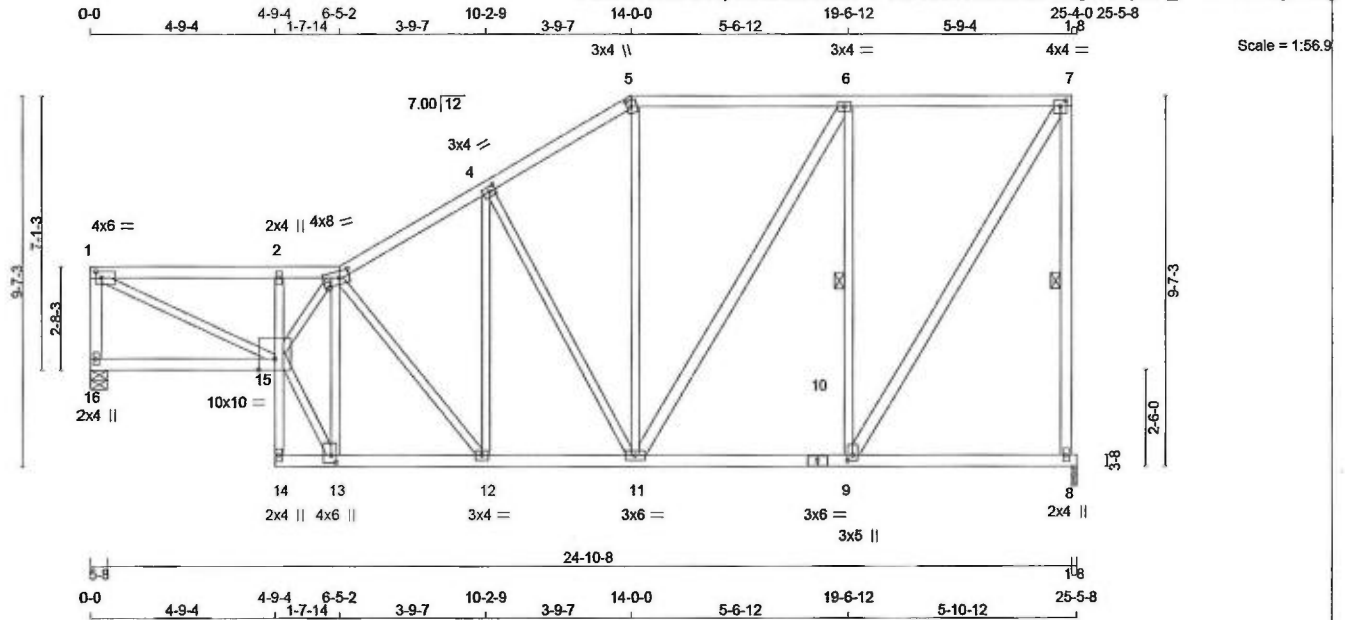
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.88 (10) (INPUT = 0.90)
JSI METAL= 0.48 (10) (INPUT = 1.00)



**READ ALL NOTES ON THIS PAGE AND ON
ENGINEERING NOTE PAGE ENP-1. THIS
NOTE PAGE IS AN INTEGRAL PART OF
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THE DESIGN OF THIS COMPONENT.**





TOTAL WEIGHT = 143 lb

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
16 - 1	2x4	DRY	No.2	SPF
1 - 3	2x4	DRY	No.2	SPF
3 - 5	2x4	DRY	No.2	SPF
5 - 7	2x4	DRY	No.2	SPF
8 - 7	2x4	DRY	No.2	SPF
16 - 15	2x4	DRY	No.2	SPF
14 - 2	2x3	DRY	No.2	SPF
14 - 10	2x4	DRY	No.2	SPF
10 - 8	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF
11 - 6	2x4	DRY	No.2	SPF
9 - 7	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVW-t	MT20	4.0	6.0	2.00	1.75
2	TMV+p	MT20	2.0	4.0		
3	TTWWW-m	MT20	4.0	8.0	2.00	3.00
4	TMWW-t	MT20	3.0	4.0	1.50	1.75
5	TTW+m	MT20	3.0	4.0	2.00	1.25
6	TMWW-t	MT20	3.0	4.0		
7	TMVW-t	MT20	4.0	4.0	1.75	1.75
8	BMV1+p	MT20	2.0	4.0		
9	BMWW-t	MT20	3.0	5.0	1.75	1.50
10	BS-t	MT20	3.0	6.0		
11	BMWWW-t	MT20	3.0	6.0		
12	BMWW-t	MT20	3.0	4.0		
13	BMWW-t	MT20	4.0	6.0	2.25	1.50
14	BMV+p	MT20	2.0	4.0		
15	BMVWWW-t	MT20	10.0	10.0	Edge	
16	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 GROSS REACTION		MAXIMUM FACTORED GROSS REACTION			INPUT BRG	REQD BRG
	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
JT 16	1202	0	1202	0	0	5-8	5-8
8	1202	0	1202	0	0	1-8	1-8

UNFACTORED REACTIONS

1ST LCASE		MAX./MIN. COMPONENT REACTIONS						
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL	
16	843	590 / 0	0 / 0	0 / 0	0 / 0	253 / 0	0 / 0	
8	843	590 / 0	0 / 0	0 / 0	0 / 0	253 / 0	0 / 0	

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 16, 8

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.44 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 7-8, 6-9. DBS = 20-0-0. CBF = 145 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. UNBRACED LENGTH (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH (LC)	
FR-TO		FROM TO		FR-TO			
16-1	-1159 / 0	0.0 0.0 0.16 (1)	7.40	1-15	0 / 2258	0.51 (1)	
1-2	-2027 / 0	-77.4 -77.4 0.32 (1)	4.44	15-13	0 / 2265	0.51 (1)	
2-3	-2013 / 0	-77.4 -77.4 0.20 (1)	4.57	15-3	0 / 1579	0.36 (1)	
3-4	-1200 / 0	-77.4 -77.4 0.21 (1)	5.60	13-3	-1870 / 0	0.74 (1)	
4-5	-954 / 0	-77.4 -77.4 0.20 (1)	6.11	3-12	-222 / 0	0.15 (1)	
5-6	-810 / 0	-77.4 -77.4 0.44 (1)	6.06	12-4	0 / 222	0.05 (1)	
6-7	-614 / 0	-77.4 -77.4 0.43 (1)	6.25	4-11	-510 / 0	0.70 (1)	
8-7	-1161 / 0	0.0 0.0 0.51 (1)	5.91	11-5	0 / 199	0.04 (1)	
				11-6	0 / 387	0.06 (1)	
16-15	0 / 0	-17.5 -17.5 0.12 (4)	10.00	9-6	-877 / 0	0.54 (1)	
14-15	-18 / 0	0.0 0.0 0.09 (1)	7.81	9-7	0 / 1165	0.19 (1)	
15-2	-333 / 0	0.0 0.0 0.10 (1)	7.81				
14-13	0 / 14	-17.5 -17.5 0.06 (1)	10.00				
13-12	0 / 1190	-17.5 -17.5 0.25 (1)	10.00				
12-11	0 / 1053	-17.5 -17.5 0.21 (1)	10.00				
11-10	0 / 614	-17.5 -17.5 0.19 (4)	10.00				
10-9	0 / 614	-17.5 -17.5 0.19 (4)	10.00				
9-8	0 / 0	-17.5 -17.5 0.14 (4)	10.00				

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3 PSF
DL = 3.0 PSF	
BOT CH.	LL = 0.0 PSF
DL = 7.0 PSF	
TOTAL LOAD = 33.3 PSF	

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL) = L/360 (0.84")
CALCULATED VERT. DEFL. (LL) = L/999 (0.10")
ALLOWABLE DEFL. (TL) = L/360 (0.84")
CALCULATED VERT. DEFL. (TL) = L/999 (0.17")

CSI: TC=0.51/1.00 (7-8:1), BC=0.25/1.00 (12-13:1), WB=0.74/1.00 (3-13:1), SSI=0.21/1.00 (6-7:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (1) (INPUT = 0.90)
JSI METAL= 0.51 (1) (INPUT = 1.00)

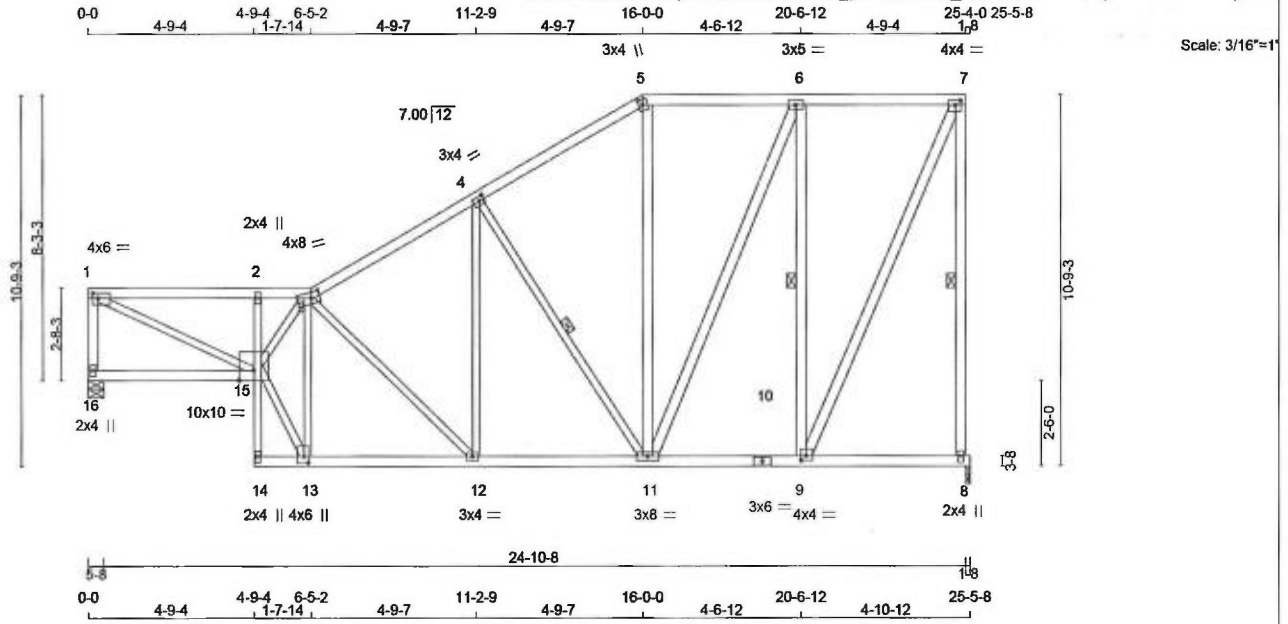
CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.



Version 8.210 S Mar 12 2018 MTEK Industries, Inc. Thu Aug 16 18:08:20 2018 Page 1
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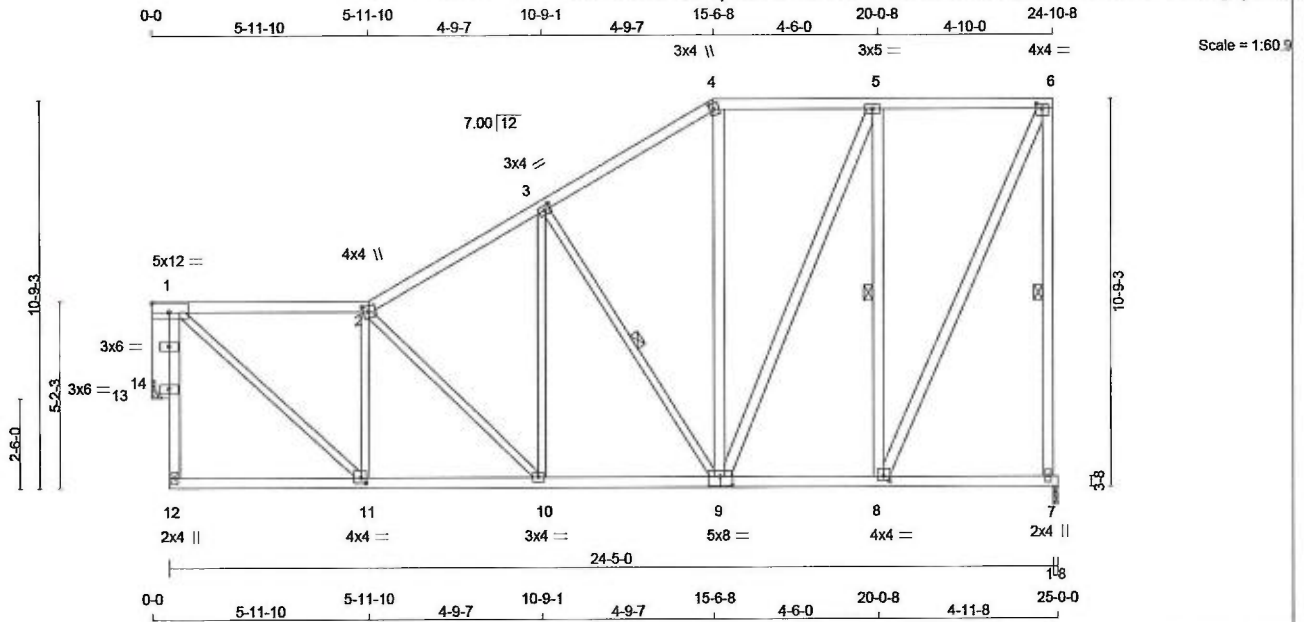
JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	GREENPARK-MINNISALE HOMES-HEMLOCK 5C EL 2	DRWG NO.
NE0818-105	T41	3	1	TRUSS DESC.		PAGE 39 OF 49

Version 8.210 S Mar 12 2018 MiTek Industries, Inc. Thu Aug 16 18:08:20 2018 Page 2
ID:bWeJhNa3z9S0pbNXDmof4Dz3iPU- yk9U9rGW2k NaJbLtMv0aB1Hvg98FJwMJGw8uynCmf

JSI GRIP= 0.88 (3) (INPUT = 0.90)
JSI METAL= 0.51 (1) (INPUT = 1.00)

READ ALL NOTES ON THIS PAGE AND ON
ENGINEERING NOTE PAGE ENP-1. THIS
NOTE PAGE IS AN INTEGRAL PART OF
THIS DRAWING AS IT CONTAINS
SPECIFICATIONS AND CRITERIA USED IN
THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 156 lb

LUMBER	N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
12 - 1	2x4	DRY	No.2	SPF	
1 - 2	2x4	DRY	No.2	SPF	
2 - 4	2x4	DRY	No.2	SPF	
4 - 6	2x4	DRY	No.2	SPF	
7 - 6	2x4	DRY	No.2	SPF	
12 - 9	2x4	DRY	No.2	SPF	
9 - 7	2x4	DRY	No.2	SPF	

BEARING BLOCKS	BL1	2x6	DRY	No.2	SPF
ALL WEBS EXCEPT	9 - 4	2x4	DRY	No.2	SPF
	9 - 5	2x4	DRY	No.2	SPF
	8 - 5	2x4	DRY	No.2	SPF
	8 - 6	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.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVWK1-t	MT20	5.0	12.0	3.00	Edge
2	TTWW+m	MT20	4.0	4.0	2.00	1.75
3	TMWW-t	MT20	3.0	4.0	1.50	1.75
4	TTW+m	MT20	3.0	4.0	2.00	1.25
5	TMWW-t	MT20	3.0	4.0	5.0	
6	TMVW-t	MT20	4.0	4.0	1.50	2.00
7	BMV1+p	MT20	2.0	4.0		
8	BMWW-t	MT20	4.0	4.0	1.50	2.00
9	BSWWW-t	MT20	5.0	8.0	3.00	4.00
10	BMWW-t	MT20	3.0	4.0		
11	BMWW-t	MT20	4.0	4.0	1.75	1.50
12	BMV+p	MT20	2.0	4.0		
13	KP-p	MT20	3.0	6.0		
13	KP-p	MT20	3.0	6.0		

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

BEARINGS		FACTORED	MAXIMUM FACTORED	INPUT	REQRD
JT	GROSS REACTION	GROSS REACTION	DOWN	BRG	BRG
14(1)	1157	0	1157	0	0
7	1230	0	1230	0	0

A SUITABLE MECHANICAL CONNECTION IS REQUIRED AT JOINT 14(1) TO RESIST THE MAX FACTORED REACTIONS.

UNFACTORED REACTIONS

JT	1ST LCASE	MAX/MIN.	COMPONENT REACTIONS	LIVE	PERM.LIVE	WIND	DEAD	SOIL
14(1)	813	561/0	0/0	0/0	0/0	0/0	252/0	0/0
7	868	576/0	0/0	0/0	0/0	0/0	293/0	0/0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7

BRACING

FOR SECTION 4-6, MAX. PURLIN SPACING = 2.00 FT.
FOR OTHER SECTIONS, TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.69 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.

1 - 1x4 LATERAL BRACE(S) AT 1/2 LENGTH OF 6-7, 3-9, 5-8. DBS = 20-0-0. CBF = 149 LBS.

DBS = DIAGONAL BRACE SPACING (MAX). CBF = CUMULATIVE BRACING FORCE (PER BRACE). FASTEN LATERAL BRACE(S) USING (0.122"x3") SPIRAL NAILS: 1 NAIL FOR 2x3 BRACE(S), 2 FOR 1x4, 2x4, 2x5, 3 FOR 2x6, 4 FOR 2x8, 5 FOR 2x10, AND 6 FOR 2x12.

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.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH	MAX. FACTORED FORCE (LBS)
FR-TO				FR-TO			
12-13	0/43	0.0	0.0 0.24 (1)	1-11	0/1351	0.30 (1)	
13-1	0/43	0.0	0.0 0.24 (1)	11-2	-805/0	0.32 (1)	
1-2	-1076/0	-77.4	-77.4 0.32 (1)	2-10	-165/0	0.14 (1)	
2-3	-1107/0	-77.4	-77.4 0.25 (1)	5-7	0/201	0.05 (4)	
3-4	-793/0	-77.4	-77.4 0.24 (1)	6-25	-575/0	0.33 (1)	
4-5	-666/0	-84.9	-84.9 0.24 (1)	2-9	0/106	0.02 (4)	
5-6	-478/0	-84.9	-84.9 0.24 (1)	2-9	0/494	0.08 (1)	
7-6	-1194/0	0.0	0.0 0.70 (1)	5-8	-946/0	0.56 (1)	
				8-6	0/1140	0.18 (1)	
12-11	0/74	-17.5	-17.5 0.12 (4)	10-9	-1165/0	0.12 (1)	
11-10	0/1093	-17.5	-17.5 0.23 (1)	10-9	0/143	0.00 (1)	
10-9	0/977	-17.5	-17.5 0.19 (1)				
9-8	0/478	-17.5	-17.5 0.13 (4)				
8-7	0/0	-17.5	-17.5 0.09 (4)				

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN./C

LOADING IN HIGHEST FLAT SECTION BASED ON PIGGYBACK TRUSS WITH SLOPES OF 7.00/12 AND -7.00/12 AND RESPECTIVE WALL HEIGHTS OF 0-0 AND 0-0 AND AN ADDITIONAL DEAD LOAD OF 3.0 P.S.F.

LOADING IN OTHER FLAT SECTIONS BASED ON A SLOPE OF 7.00/12

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.81")
CALCULATED VERT. DEFL.(LL) = L/999 (0.05")
ALLOWABLE DEFL.(TL) = L/360 (0.81")
CALCULATED VERT. DEFL.(TL) = L/999 (0.10")

CSI: TC=0.70/1.00 (6-7-1), BC=0.23/1.00 (10-11-1), WB=0.56/1.00 (5-8-1), SSI=0.20/1.00 (5-6-1)

DOL LUMBER=1.00 NAIL=1.00 L.S BEND=1.10
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50

AUTOSOLVE RIGHT 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)
MAX MIN MAX MIN MAX MIN
MT20 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

CONTINUED ON PAGE 2



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS 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.
NE0818-105	T43	1	1	GREENPARK-MINNISALE HOMES-HEMLOCK 5C EL 2	PAGE 41 OF 49
TRUSS DESC.					

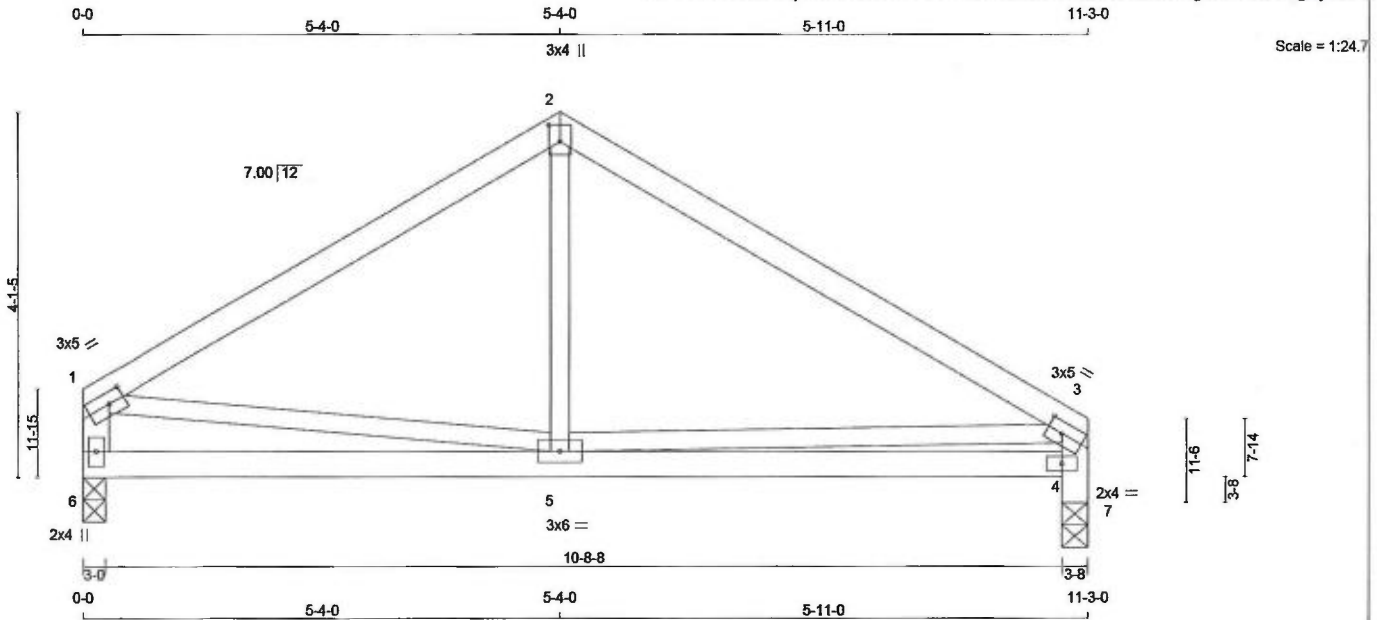
Version 8.210 S Mar 12 2018 MiTek Industries, Inc. Thu Aug 16 18:08:21 2018 Page 2
ID:bWeJhNa3z9S0pbNXDmof4Dz3iPU-S8HYiCsuHMsrfkuouat8ZokDIJ0mtlf4bz0TgKynCme

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

JSI GRIP= 0.90 (1) (INPUT = 0.90)
JSI METAL= 0.38 (11) (INPUT = 1.00)

READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





Scale = 1:24.7

TOTAL WEIGHT = 41 lb

LUMBER **DESIGN CRITERIA**

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 2	2x4	DRY	No.2	SPF
2 - 3	2x4	DRY	No.2	SPF
6 - 1	2x4	DRY	No.2	SPF
7 - 3	2x4	DRY	No.2	SPF
6 - 4	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVW-I	MT20	3.0	5.0	1.50	2.00
2	TTW+p	MT20	3.0	4.0	2.25	1.50
3	TMVW-I	MT20	3.0	5.0	1.50	2.00
4	BVM-I	MT20	2.0	4.0		
5	BMVWW-I	MT20	3.0	6.0		
6	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		
6	534	0	534	0	0	3-0	3-0		
7	534	0	534	0	0	3-8	3-8		

UNFACTORED REACTIONS

JT	1ST LCASE	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
6	374	262 / 0	0 / 0	0 / 0	0 / 0	0 / 0	113 / 0	0 / 0
7	374	262 / 0	0 / 0	0 / 0	0 / 0	0 / 0	113 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6, 7

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)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. LC1 MAX. CSI (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH	MAX. FACTORED FORCE (LBS)
FR-TO		FROM TO		FR-TO			
1-2	-476 / 0	-77.4	-77.4 0.39 (1)	6.25	5-2	0 / 112	0.04 (4)
2-3	-476 / 0	-77.4	-77.4 0.49 (1)	6.25	1-5	0 / 414	0.09 (1)
6-1	-499 / 0	0.0	0.0 0.05 (1)	7.81	5-3	0 / 412	0.09 (1)
7-4	-534 / 0	0.0	0.0 0.05 (1)	7.81			
4-3	-492 / 0	0.0	0.0 0.05 (1)	7.81			
6-5	0 / 0	-17.5	-17.5 0.16 (4)	10.00			
5-4	0 / 0	-17.5	-17.5 0.16 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:
TOP CH. LL = 23.3 PSF
DL = 3.0 PSF
BOT CH. LL = 0.0 PSF
DL = 7.0 PSF
TOTAL LOAD = 33.3 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.38")
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.38")
CALCULATED VERT. DEFL.(TL) = L/999 (0.03")

CSI: TC=0.49/1.00 (2-3:1), BC=0.16/1.00 (5-6:4),
WB=0.09/1.00 (1-5:1), SSI=0.15/1.00 (2-3:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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)
MAX MIN MAX MIN MAX MIN
MT20 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

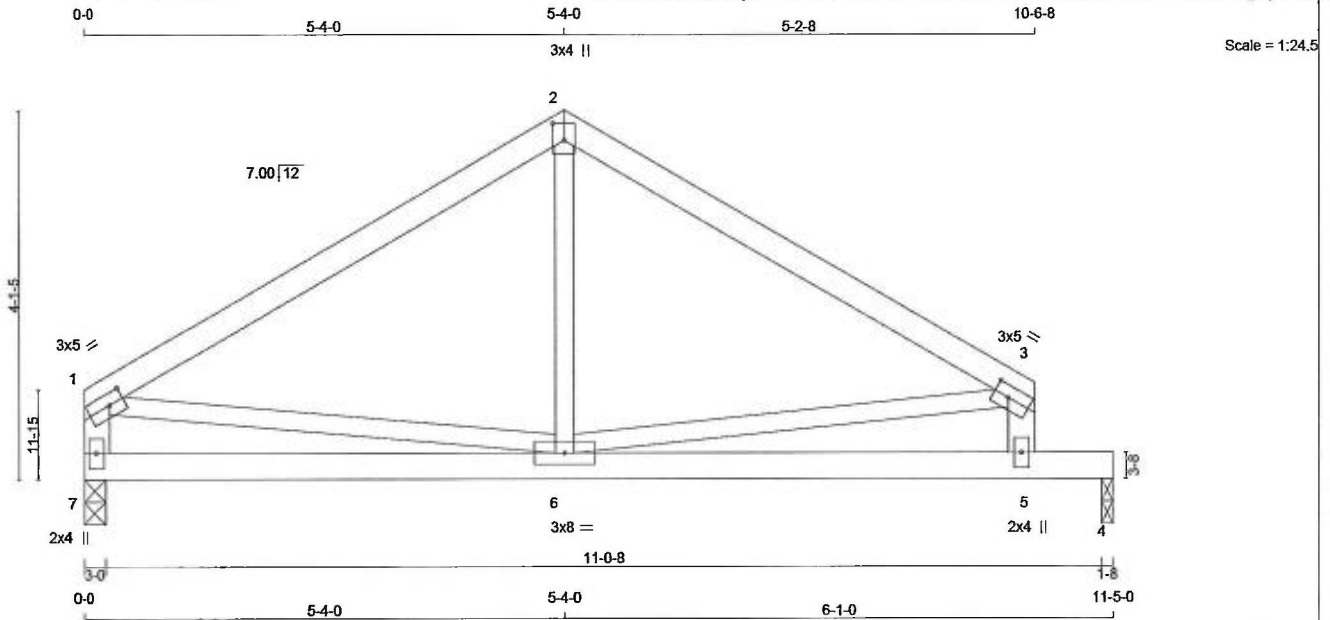
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.83 (5) (INPUT = 0.90)
JSI METAL= 0.18 (3) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 39 lb

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 2	2x4	DRY	No.2	SPF
2 - 3	2x4	DRY	No.2	SPF
7 - 1	2x4	DRY	No.2	SPF
5 - 3	2x4	DRY	No.2	SPF
7 - 4	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
1	TMVW-t	MT20	3.0	5.0	1.50	2.00
2	TTW+p	MT20	3.0	4.0	2.25	1.50
3	TMVW-t	MT20	3.0	5.0	1.50	2.00
5	BMV+p	MT20	2.0	4.0		
6	BMVW-t	MT20	3.0	8.0		
7	BMV1+p	MT20	2.0	4.0		

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

BEARINGS		FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
JT	VERT	GROSS REACTION	HORZ	GROSS REACTION	DOWN	HORZ	BRG	IN-SX	BRG
7	541	0		541	0	0	3-0		3-0
4	541	0		541	0	0	1-8		1-8

UNFACTORED REACTIONS

1ST LCASE	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
JT							
7	380	266 / 0	0 / 0	0 / 0	0 / 0	114 / 0	0 / 0
4	380	266 / 0	0 / 0	0 / 0	0 / 0	114 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7, 4

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)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. FACTORED LC1 MAX. (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED UNBRACED LENGTH (LC)	MAX. FACTORED (LC)
FR-TO		FROM TO		FR-TO			
1-2	-519 / 0	-77.4 -77.4	0.39 (1)	6-2	0 / 125	0.04 (4)	
2-3	-519 / 0	-77.4 -77.4	0.37 (1)	6-5	0 / 452	0.10 (1)	
7-1	-525 / 0	0.0 0.0	0.05 (1)	6-3	0 / 453	0.10 (1)	
5-3	-528 / 0	0.0 0.0	0.05 (1)				
7-6	0 / 0	-17.5 -17.5	0.22 (1)	10.00			
6-5	0 / 0	-17.5 -17.5	0.60 (1)	10.00			
5-4	0 / 0	-94.9 -94.9	0.60 (1)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD	= 33.3	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, CBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.38")
CALCULATED VERT. DEFL.(LL) = L/999 (0.13")
ALLOWABLE DEFL.(TL)= L/360 (0.38")
CALCULATED VERT. DEFL.(TL) = L/534 (0.26")

CSI: TC=0.39/1.00 (1-2:1), BC=0.60/1.00 (4-5:1), WB=0.10/1.00 (3-6:1), SSI=0.42/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

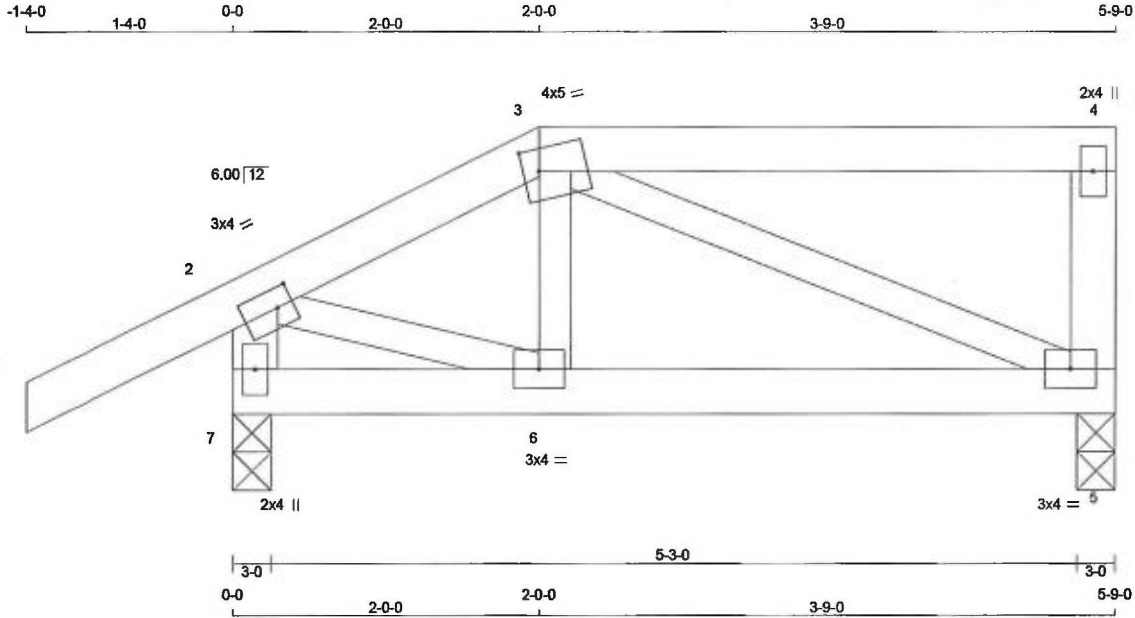
JSI GRIP= 0.57 (3) (INPUT = 0.90)

JSI METAL= 0.19 (1) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 23 lb

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2	SPF
3 - 4	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF
7 - 2	2x4	DRY	No.2	SPF
7 - 5	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMVW-t	MT20	3.0	4.0	1.50	1.25
3	TTWW-m	MT20	4.0	5.0	1.75	1.25
4	TMV+p	MT20	2.0	4.0		
5	BMVW1-t	MT20	3.0	4.0		
6	BMVW-t	MT20	3.0	4.0		
7	BMV1+p	MT20	2.0	4.0		

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

BEARINGS		FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
JT	GROSS REACTION	VERT	HORZ	GROSS REACTION	DOWN	HORZ	UPLIFT	BRG	IN-SX
5	273	0	273	0	0	0	3-0	3-0	
7	381	0	381	0	0	0	3-0	3-0	

UNFACTORED REACTIONS

JT	1ST LCASE	MAX/MIN. COMPONENT REACTIONS	COMBINED	SNOW	LIVE	PERM. LIVE	WIND	DEAD	SOIL
5	191	134 / 0	0 / 0	0 / 0	0 / 0	0 / 0	0 / 0	58 / 0	0 / 0
7	265	199 / 0	0 / 0	0 / 0	0 / 0	0 / 0	0 / 0	66 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5, 7

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)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. FACTORED VERT. LOAD (LC1)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED VERT. LOAD (LC)	MAX. FACTORED VERT. LOAD (LC)
FR-TO		FROM	TO	FR-TO		FROM	TO
1-2	0 / 24	-77.4	-77.4 0.11 (1)	10.00	6-3	-4 / 51	0.02 (4)
2-3	-265 / 0	-77.4	-77.4 0.05 (1)	6.25	3-5	-256 / 0	0.06 (1)
3-4	0 / 0	-77.4	-77.4 0.19 (1)	10.00	2-6	0 / 245	0.06 (1)
5-4	-145 / 0	0.0	0.0 0.02 (1)	7.81			
7-2	-368 / 0	0.0	0.0 0.04 (1)	7.81			
7-6	0 / 0	-17.5	-17.5 0.04 (4)	10.00			
6-5	0 / 236	-17.5	-17.5 0.07 (1)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	23.3	PSF
DL	=	3.0	PSF	
BOT CH.	LL	=	0.0	PSF
DL	=	7.0	PSF	
TOTAL LOAD	=	33.3	PSF	

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55% OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 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=0.19/1.00 (3-4:1), BC=0.07/1.00 (5-6:1), WB=0.06/1.00 (3-5:1), SSI=0.11/1.00 (3-4:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES	PLATE GRIP(DRY)	(PSI)	SHEAR (PLI)	SECTION (PLI)
MT20	618	354	1667	822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

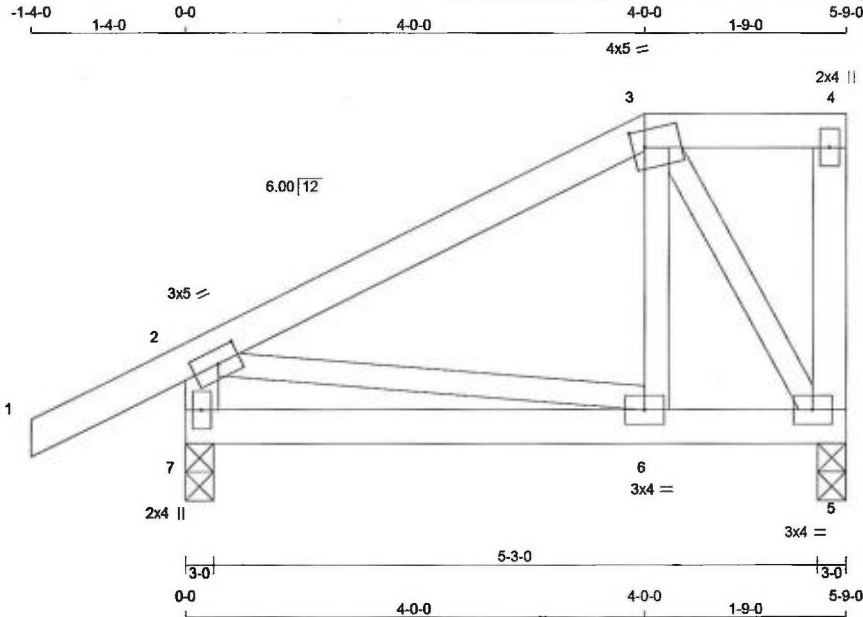
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.62 (2) (INPUT = 0.90)
JSI METAL= 0.13 (2) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





Scale = 1:19.2

TOTAL WEIGHT = 26 lb

LUMBER				
N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2	SPF
3 - 4	2x4	DRY	No.2	SPF
5 - 4	2x4	DRY	No.2	SPF
7 - 2	2x4	DRY	No.2	SPF
7 - 5	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMVW-1	MT20	3.0	5.0	1.50	2.25
3	TTWW-m	MT20	4.0	5.0	1.75	1.25
4	TMV+p	MT20	2.0	4.0		
5	BMVW1-t	MT20	3.0	4.0		
6	BMWW-t	MT20	3.0	4.0		
7	BMV1+p	MT20	2.0	4.0		

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

BEARINGS		FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
JT	VERT	GROSS REACTION	HORZ	GROSS REACTION	HORZ	BRG	IN-SX	BRG	IN-SX
5	273	0	273	0	0	3-0	3-0	3-0	3-0
7	381	0	381	0	0	3-0	3-0	3-0	3-0

UNFACTORED REACTIONS

JT	1ST LCASE	MAX./MIN. COMPONENT REACTIONS	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
5	191	134 / 0	0 / 0	0 / 0	0 / 0	0 / 0	58 / 0	0 / 0
7	265	199 / 0	0 / 0	0 / 0	0 / 0	0 / 0	66 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 5, 7

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)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX. LC1 CSI (LC)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. UNBRACED LENGTH	MAX. FACTORED CSI (LC)
FR-TO		FROM	TO	FR-TO			
1-2	0 / 24	-77.4	-77.4 0.11 (1)	10.00	6-3	0 / 74	0.03 (4)
2-3	-153 / 0	-77.4	-77.4 0.21 (1)	6.25	3-5	-247 / 0	0.05 (1)
3-4	0 / 0	-77.4	-77.4 0.04 (1)	10.00	2-6	0 / 138	0.03 (1)
5-4	-68 / 0	0.0	0.0 0.01 (1)	7.81			
7-2	-350 / 0	0.0	0.0 0.04 (1)	7.81			
7-6	0 / 0	-17.5	-17.5 0.06 (4)	10.00			
6-5	0 / 139	-17.5	-17.5 0.07 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD = 33.3	PSF	

SPACING = 24.0 IN. C/C

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

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 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=0.21/1.00 (2-3:1), BC=0.07/1.00 (5-6:4), WB=0.05/1.00 (3-5:1), SSI=0.11/1.00 (2-3:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

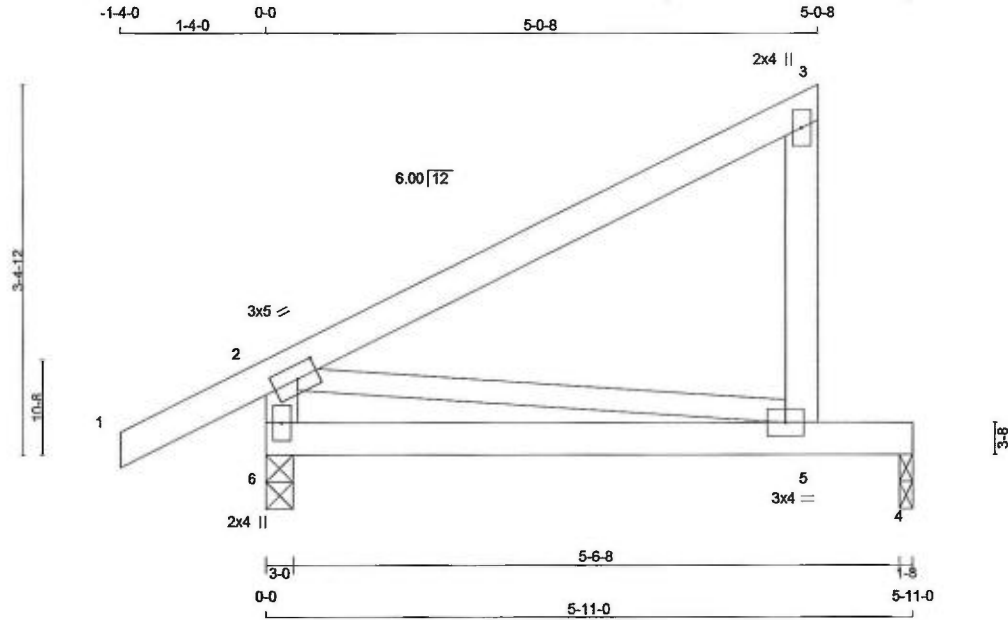
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.32 (2) (INPUT = 0.90)
JSI METAL= 0.08 (2) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 11 X 22 = 245 lb

LUMBER
N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2
5 - 3	2x4	DRY	No.2
6 - 2	2x4	DRY	No.2
6 - 4	2x4	DRY	No.2

ALL WEBS 2x3 DRY No.2
DRY; SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
2	TMVW-t	MT20	3.0	5.0	1.50	2.25
3	TMV+p	MT20	2.0	4.0		
5	BMVW-t	MT20	3.0	4.0		
6	BMV1+p	MT20	2.0	4.0		

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

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG	REQRD BRG
	VERT	HORZ	DOWN	HORZ UPLIFT		
6	384	0	384	0	3-0	3-0
4	218	0	218	0	1-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE MAX/MIN. COMPONENT REACTIONS						
	COMBINED	SNOW	LIVE	PERM. LIVE	WIND	DEAD	SOIL
6	267	200 / 0	0 / 0	0 / 0	0 / 0	67 / 0	0 / 0
4	154	100 / 0	0 / 0	0 / 0	0 / 0	54 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6, 4

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00 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)	LC1 MAX CSI (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED CSI (LC)
FR-TO		FROM TO			FR-TO		
1-2	0 / 24	-77.4	-77.4 0.11 (1)	10.00	2-5	0 / 0	0.00 (1)
2-3	0 / 0	-77.4	-77.4 0.33 (1)	10.00			
5-3	-195 / 0	0.0	0.0 0.03 (1)	7.81			
6-2	-303 / 0	0.0	0.0 0.03 (1)	7.81			
6-5	0 / 0	-17.5	-17.5 0.25 (1)	10.00			
5-4	0 / 0	-17.5	-17.5 0.25 (1)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL = 23.3	PSF
DL = 3.0	PSF	
BOT CH.	LL = 0.0	PSF
DL = 7.0	PSF	
TOTAL LOAD = 33.3	PSF	

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.20")
CALCULATED VERT. DEFL.(LL)= L/999 (0.05")
ALLOWABLE DEFL.(TL)= L/360 (0.20")
CALCULATED VERT. DEFL.(TL)= L/555 (0.13")

CSI: TC=0.33/1.00 (2-3:1), BC=0.25/1.00 (5-6:1),
WB=0.00/1.00 (2-5:1), SSI=0.17/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
MT20	618 354 1667 822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

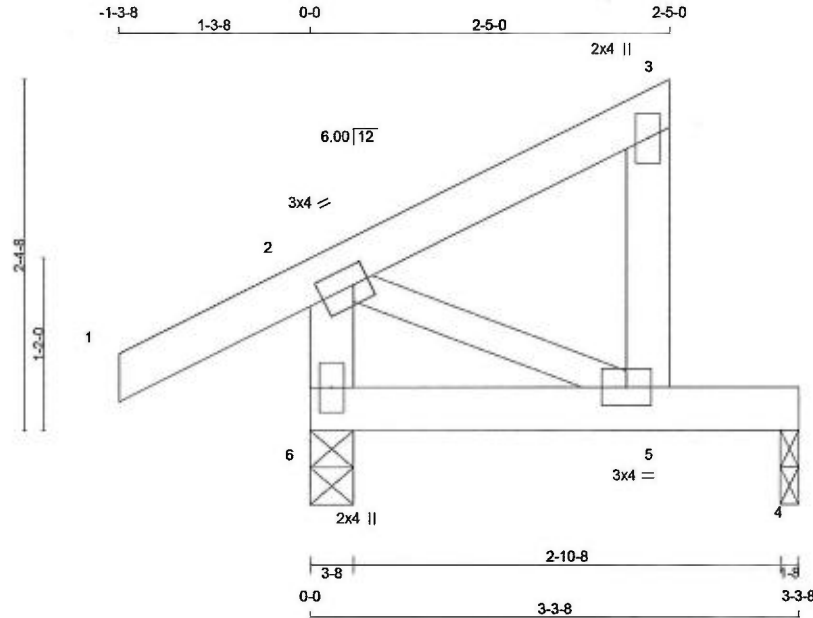
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.28 (2) (INPUT = 0.90)
JSI METAL= 0.06 (6) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





TOTAL WEIGHT = 7 X 13 = 91 lb [M]

LUMBER

N. L. G. A. RULES	CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2	SPF
5 - 3	2x4	DRY	No.2	SPF
6 - 2	2x4	DRY	No.2	SPF
6 - 4	2x4	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
2	TMVW-t	MT20	3.0	4.0	1.50	1.25
3	TMV+p	MT20	2.0	4.0		
5	BMVW-t	MT20	3.0	4.0		
6	BMV1+p	MT20	2.0	4.0		

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

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG	REQRD BRG
	VERT	HORZ	DOWN	HORZ UPLIFT		
6	252	0	252	0	3-8	3-8
4	97	0	97	0	1-8	1-8

UNFACTORED REACTIONS

	1ST LCASE	MAX./MIN. COMPONENT REACTIONS					
JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
6	175	134 / 0	0 / 0	0 / 0	0 / 0	40 / 0	0 / 0
4	70	41 / 0	0 / 0	0 / 0	0 / 0	28 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6, 4

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00 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)

CHORDS				WEBS				
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX (LC)	MAX. UNBRACED LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED CSI (LC)	
FR-TO		FROM TO			FR-TO			
1-2	0 / 23	-77.4	-77.4	0.10 (1)	10.00	0 / 0	0.00 (1)	
2-3	0 / 0	-77.4	-77.4	0.08 (1)	10.00			
5-3	-93 / 0	0.0	0.0	0.01 (1)	7.81			
6-2	-198 / 0	0.0	0.0	0.02 (1)	7.81			
6-5	0 / 0	-17.5	-17.5	0.11 (1)	10.00			
5-4	0 / 0	-17.5	-17.5	0.11 (1)	10.00			

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	23.3	PSF
	DL =	3.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.0	PSF
TOTAL LOAD	=	33.3	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2014
- CSA 086-09
- TPIC 2011

(55 % OF 27.2 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 23.3 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.19")
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.19")
CALCULATED VERT. DEFL.(TL) = L/999 (0.02")

CSI: TC=0.10/1.00 (1-2:1), BC=0.11/1.00 (5-6:1),
WB=0.00/1.00 (2-5:1), SSI=0.08/1.00 (4-5:1)

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

COMPANION LIVE LOAD FACTOR = 0.50

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

NAIL VALUES

PLATE GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)
		MAX MIN MAX MIN MAX MIN
MT20	618	354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.18 (2) (INPUT = 0.90)

JSI METAL= 0.04 (6) (INPUT = 1.00)



READ ALL NOTES ON THIS PAGE AND ON ENGINEERING NOTE PAGE ENP-1. THIS NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.



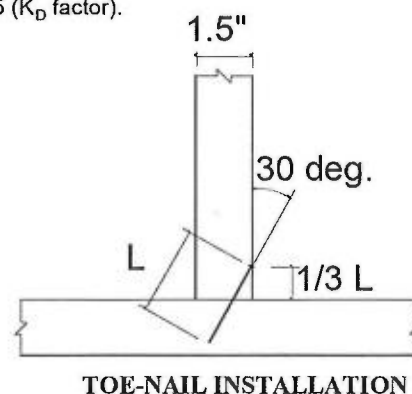
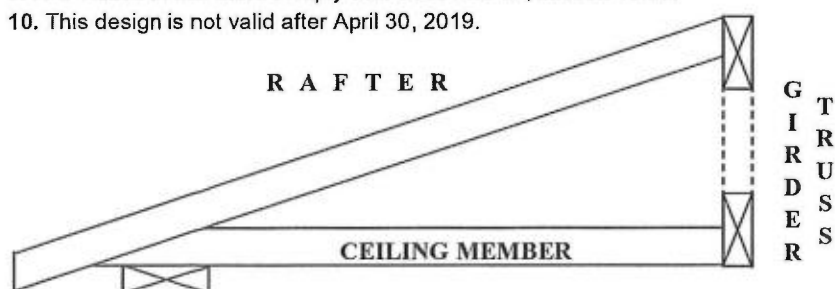
BEARING ANCHORAGE BY TOE-NAILS FOR LATERAL CAPACITY

B37579H1

NAIL TYPE	LENGTH (IN)	DIAMETER (IN)	NAIL LATERAL CAPACITY (LB)	
			S-P-F	D. FIR
COMMON WIRE	3.00	0.144	132	147
	3.25	0.144	132	147
	3.50	0.160	159	177

NOTES:

1. Rafter and ceiling members may be anchored to top and bottom chords of girder truss by toe-nailing rafter and ceiling members to girder chords provided the reaction does not exceed the lateral capacities in the table. Hangers (specified by others) are required for reactions higher than the maximum toe-nail capacity. Reactions are based on factored loads.
2. Toe nail capacities shown in the table are for **one** toe-nail. For additional toe-nails multiply values in table by the number of toe-nails used. Toe-nail capacities take into account toe-nailing factor J_A in CSA O86-09, section 10.9.4.1.
3. For 9- 3/4 gauge 3.25" common wire gun nails (diameter = 0.120") use 3" common spiral nail values.
4. Maximum number of toe-nails allowed depends on the lumber size & species to be toe-nailed to supporting member and nail diameter, as shown in tables below.
5. Nail values in table are based on the following relative lumber densities: $G = 0.42$ (SPF), $G = 0.49$ (D. Fir).
6. Toe-nails shall be driven at approximately 1/3 the nail length from the edge of the joist/truss chord and driven at an angle of 30° to the grain of the member (See next page for nailing on bearing plate).
7. For loads due to **wind** the nail lateral capacity in this table may be multiplied by 1.15 (K_D factor).
8. Lumber must be dry (< 19% moisture content) at the time of nail installation.
9. Nail values in this table comply with CSA O86-09, section 10.9.4
10. This design is not valid after April 30, 2019.



Nail type	Common wire	Common spiral	Common wire
Nail dia. (in)	0.160	0.152	0.144
	(3.5" nail)		(3" and 3.25" nail)
LUMBER SIZE	MAXIMUM NUMBER OF TOE-NAILS		
2X4 SPF	2	2	3
2X4 D. Fir	2	2	2
2X6 SPF	4	4	4
2X6 D. Fir	3	3	3



MiTek Canada Inc
100 Industrial Rd.
Bradford, Ontario L3Z 3G7

PEO
Certificate No. 10889485



April 26, 2017

BEARING ANCHORAGE BY TOE-NAILS FOR WIND LOADING

B37579H2

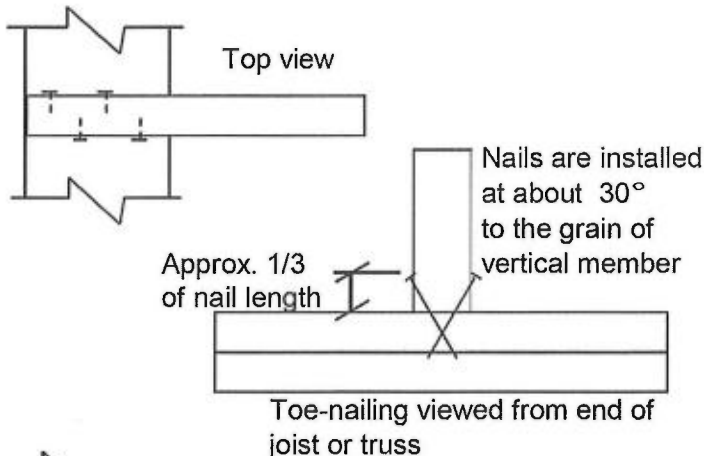
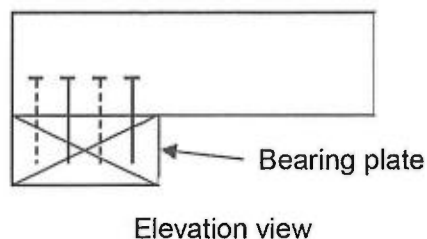
NAIL TYPE	LENGTH (IN)	DIAMETER (IN)	NAIL WITHDRAWAL CAPACITY (LB)	
			S-P-F	D. FIR
COMMON WIRE	3.00	0.144	30	42
	3.25	0.144	32	45
	3.50	0.160	38	52

Note: If using truss with D. Fir lumber and S-P-F bearing plate, use values in table for S-P-F.

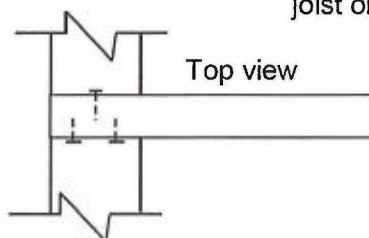
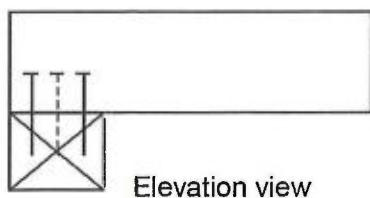
NOTES:

1. Truss chord, rafter, or ceiling members may be anchored to bearing plate by toe-nails, provided that the actual factored uplift force due to **wind or earthquake** load does not exceed the withdrawal capacities in the table. Hangers (specified by others) are required for uplift forces that are higher than the maximum toe-nail withdrawal capacity.
2. Toe nail capacities shown in the table are for **one** toe-nail. For additional toe-nails multiply values in table by the number of toe-nails used. Toe-nail capacities take into account toe-nailing factor J_A in CSA O86-09, section 10.9.5.2.
3. For 9-3/4 gauge 3.25" common wire gun nails (diameter = 0.120") use 3" common spiral nail values.
4. Maximum number of toe-nails allowed depends on the lumber size & species to be toe-nailed to supporting member and nail diameter, as shown in table above.
5. Nail values in table are based on the following relative lumber densities: $G = 0.42$ (SPF), $G = 0.49$ (D. Fir).
6. Toe-nails shall be driven at approximately 1/3 the nail length from the edge of the joist/truss chord and driven at an angle of 30° to the grain of the member (See drawing on detail B37579H1).
7. Lumber must be dry (< 19% moisture content) at the time of nail installation.
8. Nail values in this table comply with CSA O86-09, section 10.9.5
9. This design is not valid after April 30, 2019

Toe-nailing on 2x6 Bearing Plate



Toe-nailing on 2x4 Bearing Plate



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Bradford, Ontario L3Z 3G7

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April 26, 2017