

RE: 400692 Lot 33 HT MiTek USA, Inc. 16023 Swingley Ridge Rd Chesterfield, MO 63017 314-434-1200

General Truss Engineering Criteria & Design Loads (Individual Truss Design Drawings Show Special Loading Conditions):

Design Code: IRC2018/TPI2014 Design Program: MiTek 20/20 8.4

Wind Code: N/A Wind Speed: 115 mph Roof Load: 45.0 psf Floor Load: N/A psf

This package includes 38 individual, dated Truss Design Drawings and 0 Additional Drawings.

No.	Seal#	Truss Name	Date	No.	Seal#	Truss Name	Date
1	143094481	A1	10/6/2020	27	143094507	R1	10/6/2020
2	143094482	A2	10/6/2020	28	143094508	R2	10/6/2020
3	143094483	B1	10/6/2020	29	143094509	V1	10/6/2020
4	143094484	B2	10/6/2020	30	I43094510	V2	10/6/2020
5	143094485	C1	10/6/2020	31	I43094511	V3	10/6/2020
6	143094486	C2	10/6/2020	32	I43094512	V4	10/6/2020
7	143094487	C3	10/6/2020	33	I43094513	V5	10/6/2020
8	143094488	D1	10/6/2020	34	I43094514	V6	10/6/2020
9	143094489	D2	10/6/2020	35	I43094515	V7	10/6/2020
10	143094490	E1	10/6/2020	36	I43094516	V8	10/6/2020
11	143094491	E2	10/6/2020	37	143094517	V9	10/6/2020
12	143094492	E3	10/6/2020	38	I43094518	V10	10/6/2020
13	143094493	E4	10/6/2020				
14	143094494	G1	10/6/2020				
15	143094495	G2	10/6/2020				
16	143094496	G3	10/6/2020				
17	143094497	G4	10/6/2020				
18	143094498	G5	10/6/2020				
19	143094499	G6	10/6/2020				
20	143094500	G7	10/6/2020				
21	143094501	G8	10/6/2020				

10/6/2020

10/6/2020

10/6/2020

10/6/2020

10/6/2020

The truss drawing(s) referenced above have been prepared by

MiTek USA, Inc under my direct supervision

143094502

143094503

143094504

143094505

143094506

based on the parameters provided by Wheeler - Waverly.

Truss Design Engineer's Name: Garcia, Juan

My license renewal date for the state of Kansas is April 30, 2022.

J1

J2

J3

J8

J9

Kansas COA: E-943

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IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek. Any project specific information included is for MiTek customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek has not independently verified the applicability of the design parameters or the designs for any particular building. Before use, the building designer should verify applicability of design parameters and properly incorporate these designs into the overall building design per ANSI/TPI 1, Chapter 2.



October 06, 2020



RE: 400692 Lot 33 HT MiTek USA, Inc. 16023 Swingley Ridge Rd Chesterfield, MO 63017 314-434-1200

General Truss Engineering Criteria & Design Loads (Individual Truss Design Drawings Show Special Loading Conditions):

Design Code: IRC2018/TPI2014 Design Program: MiTek 20/20 8.4

Wind Code: N/A Wind Speed: 115 mph Roof Load: 45.0 psf Floor Load: N/A psf

This package includes 38 individual, dated Truss Design Drawings and 0 Additional Drawings.

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4	143094484	B2	10/6/2020	30	I43094510	V2	10/6/2020
5	143094485	C1	10/6/2020	31	I43094511	V3	10/6/2020
6	143094486	C2	10/6/2020	32	I43094512	V4	10/6/2020
7	143094487	C3	10/6/2020	33	I43094513	V5	10/6/2020
8	143094488	D1	10/6/2020	34	I43094514	V6	10/6/2020
9	143094489	D2	10/6/2020	35	I43094515	V7	10/6/2020
10	143094490	E1	10/6/2020	36	I43094516	V8	10/6/2020
11	143094491	E2	10/6/2020	37	143094517	V9	10/6/2020
12	143094492	E3	10/6/2020	38	I43094518	V10	10/6/2020
13	143094493	E4	10/6/2020				
14	143094494	G1	10/6/2020				
15	143094495	G2	10/6/2020				
16	143094496	G3	10/6/2020				
17	143094497	G4	10/6/2020				
18	143094498	G5	10/6/2020				
19	143094499	G6	10/6/2020				
20	143094500	G7	10/6/2020				
21	143094501	G8	10/6/2020				

10/6/2020

10/6/2020

10/6/2020

10/6/2020

10/6/2020

The truss drawing(s) referenced above have been prepared by

J1

J2

J3

J8

J9

MiTek USA, Inc under my direct supervision

143094502

143094503

143094504

143094505

143094506

based on the parameters provided by Wheeler - Waverly.

Truss Design Engineer's Name: Garcia, Juan

My license renewal date for the state of Missouri is December 31, 2020.

Missouri COA: 001193

22

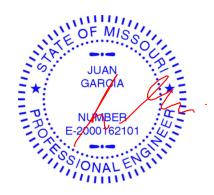
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IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek. Any project specific information included is for MiTek customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek has not independently verified the applicability of the design parameters or the designs for any particular building. Before use, the building designer should verify applicability of design parameters and properly incorporate these designs into the overall building design per ANSI/TPI 1, Chapter 2.



October 06, 2020

Job Lot 33 HT Truss Truss Type Qty Ply 143094481 400692 Α1 Hip Girder Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:09 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-TW38NeoVOYxoUj4cZ9EYZJU06TTP2Eg6EuULX_yW8ri -0-10-8 4-0-0 8-0-0 12-0-0 12-10-8

4-0-0

Scale = 1:22.4

0-10-8

4-0-0

12-0-0

Structural wood sheathing directly applied or 4-3-4 oc purlins.

except end verticals, and 2-0-0 oc purlins (5-0-4 max.): 3-4.

Rigid ceiling directly applied or 10-0-0 oc bracing.

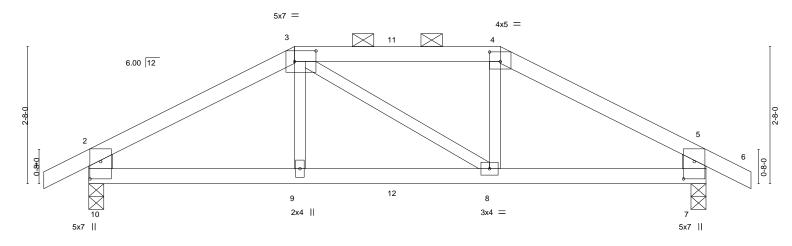


Plate Off	sets (X,Y)	4-0-0 [3:0-5-0,0-2-8], [4:0-2-8,0)-2-4], [7:0-4-1	, 1,0-2-8], [10:0-	4-1,0-2-8]	4-0-0					4-0-0	'
LOADIN	G (psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.71	Vert(LL)	-0.07	8-9	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.67	Vert(CT)	-0.13	8-9	>999	240		
BCLL BCDL	0.0 * 10.0	Rep Stress Incr Code IRC2018/TR	NO PI2014	WB Matrix	0.10 -S	Horz(CT) Wind(LL)	0.02 0.06	7 8-9	n/a >999	n/a 240	Weight: 39 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

0-10-8

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

WEBS 2x3 SPF No.2 *Except* 2-10.5-7: 2x6 SP DSS

2-10,5-7: 2x6 SP DSS

REACTIONS. (size) 10=0-3-8, 7=0-3-8 Max Horz 10=-50(LC 27)

Max Uplift 10=-201(LC 8), 7=-201(LC 9) Max Grav 10=899(LC 1), 7=899(LC 1)

4-0-0

4-0-0

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-3=-1231/277, 3-4=-1024/269, 4-5=-1232/276, 2-10=-806/214, 5-7=-806/213 BOT CHORD 9-10=-219/1012, 8-9=-219/1023, 7-8=-196/1013

WEBS 3-9=0/271, 4-8=-5/279

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Provide adequate drainage to prevent water ponding.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 10=201, 7=201.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 8) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 9) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 79 lb down and 74 lb up at 4-0-0, and 86 lb down and 74 lb up at 6-0-0, and 79 lb down and 74 lb up at 8-0-0 on top chord, and 220 lb down and 76 lb up at 4-0-0, and 31 lb down at 6-0-0, and 220 lb down and 76 lb up at 7-11-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
- 10) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

 Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-2=-70, 2-3=-70, 3-4=-70, 4-5=-70, 5-6=-70, 7-10=-20

Continued on page 2







Job	Truss	Truss Type	Qty	Ply	Lot 33 HT
400000	A4	Llin Circles	4	_	I43094481
400692	A1	Hip Girder	1	1	Job Reference (optional)

Wheeler Lumber,

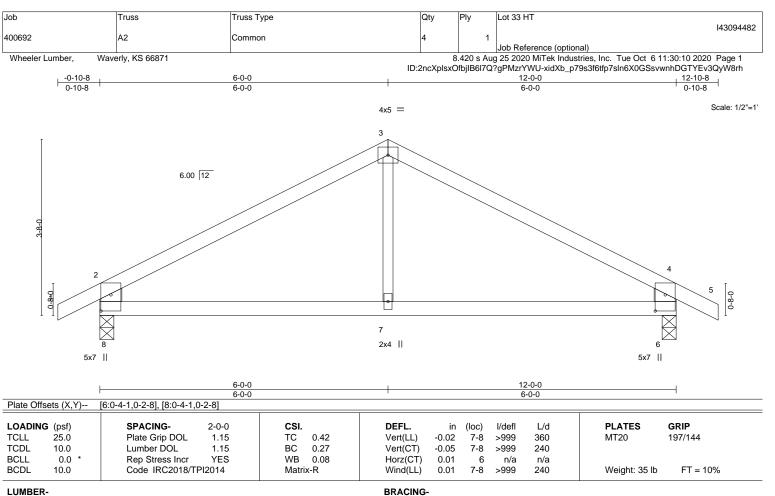
Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:09 2020 Page 2 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-TW38NeoVOYxoUj4cZ9EYZJU06TTP2Eg6EuULX_yW8ri

LOAD CASE(S) Standard Concentrated Loads (lb)

Vert: 3=-46(F) 4=-46(F) 9=-220(F) 8=-220(F) 11=-46(F) 12=-25(F)





TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

WEBS 2x6 SPF No.2 *Except* 3-7: 2x3 SPF No.2

REACTIONS. (size) 8=0-3-8, 6=0-3-8 Max Horz 8=-62(LC 6)

Max Uplift 8=-90(LC 8), 6=-90(LC 9)

Max Grav 8=597(LC 1), 6=597(LC 1)

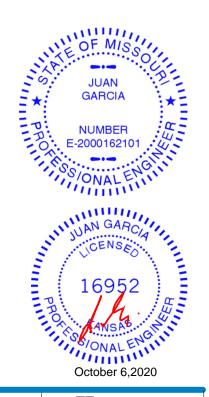
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-3=-638/89, 3-4=-638/89, 2-8=-544/131, 4-6=-544/131 TOP CHORD

BOT CHORD 7-8=-14/480, 6-7=-14/480

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 6.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals

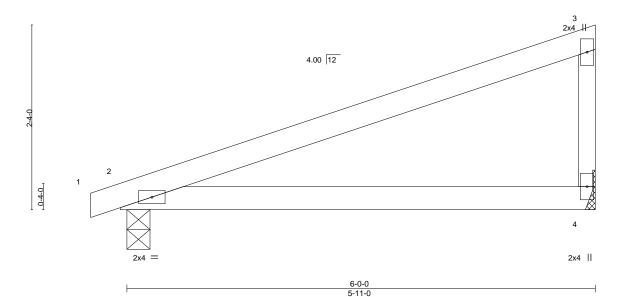


MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Type Truss Qty Ply 143094483 В1 400692 Monopitch Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:11 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-PvBvoKqlw9BWk0E?haG0ekZOlGEqW9gPhCzSbsyW8rg $\frac{-0-4-8}{0-4-8}$ 6-0-0

Scale = 1:14.6



LOADING	G (psf)	SPACING- 2-0-	CSI.		DEFL.	in	(loc)	I/defI	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL 1.1	5 TC	0.64	Vert(LL)	-0.07	2-4	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL 1.1	5 BC	0.35	Vert(CT)	-0.13	2-4	>526	240		
BCLL	0.0 *	Rep Stress Incr YE	S WB	0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014	Matri	x-P	Wind(LL)	0.00	2	****	240	Weight: 16 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

WFBS

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2

BOT CHORD 2x3 SPF No.2

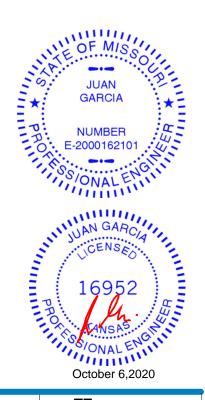
REACTIONS. (size) 4=Mechanical, 2=0-3-8

Max Horz 2=91(LC 5)

Max Uplift 4=-55(LC 8), 2=-65(LC 4) Max Grav 4=257(LC 1), 2=297(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.





Job Lot 33 HT Truss Truss Type Qty Ply 143094484 400692 B2 Monopitch Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:11 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-PvBvoKqlw9BWk0E?haG0ekZMkGDmW9gPhCzSbsyW8rg 0-4-8 8-0-0 8-0-0 Scale = 1:18.1 2x4 || 3 4.00 12 0-4-0 2x4 || 8-0-0 7-11-0 LOADING (psf) DEFL. GRIP SPACING-CSI. **PLATES** 2-0-0 (loc) I/defl I/d TC 0.77 197/144 **TCLL** 25.0 Plate Grip DOL 1.15 Vert(LL) -0.172-4 >553 360 MT20 TCDL 10.0 Lumber DOL 1.15 BC 0.42 Vert(CT) -0.342-4 >276 240 BCLL 0.0 Rep Stress Incr YES WB 0.00 Horz(CT) -0.00 n/a **** n/a

Wind(LL)

BRACING-

TOP CHORD

BOT CHORD

2

except end verticals.

0.00

240

Rigid ceiling directly applied or 10-0-0 oc bracing.

Structural wood sheathing directly applied or 6-0-0 oc purlins,

Weight: 21 lb

FT = 10%

LUMBER-

REACTIONS.

BCDL

TOP CHORD 2x4 SPF 2100F 1.8E 2x4 SPF 2100F 1.8E **BOT CHORD**

WFBS 2x3 SPF No.2

10.0

(size) 4=Mechanical, 2=0-3-8

Max Horz 2=121(LC 7)

Max Uplift 4=-74(LC 8), 2=-79(LC 4) Max Grav 4=348(LC 1), 2=386(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

Code IRC2018/TPI2014

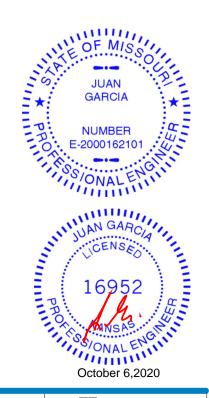
TOP CHORD

NOTES-

1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate

Matrix-P

- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



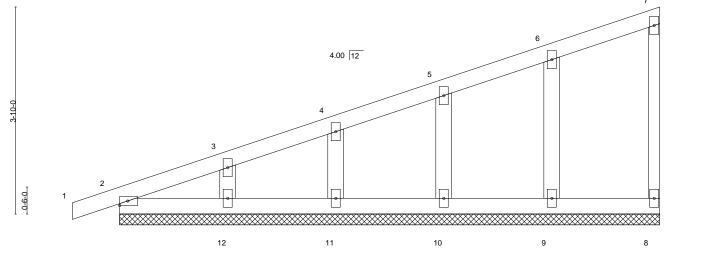
Job Lot 33 HT Truss Truss Type Qty Ply 143094485 C1 GABLE 400692 Job Reference (optional) Wheeler Lumber,

Waverly, KS 66871

-0-10-8 0-10-8 10-0-0

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:12 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-t5kH?grNhTJMMApBFHnFBy6h?geAFcVZwsj07JyW8rf 10-0-0

Scale = 1:21.3



LOADIN	G (psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.09	Vert(LL)	0.00	1	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	0.00	1	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	-0.00	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TF	PI2014	Matri	x-S						Weight: 35 lb	FT = 10%

LUMBER-

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD**

WFBS 2x3 SPF No.2 OTHERS 2x4 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

except end verticals.

Rigid ceiling directly applied or 10-0-0 oc bracing. **BOT CHORD**

REACTIONS. All bearings 10-0-0.

(lb) -Max Horz 2=158(LC 5)

Max Uplift All uplift 100 lb or less at joint(s) 8, 2, 12, 11, 10, 9 Max Grav All reactions 250 lb or less at joint(s) 8, 2, 12, 11, 10, 9

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-

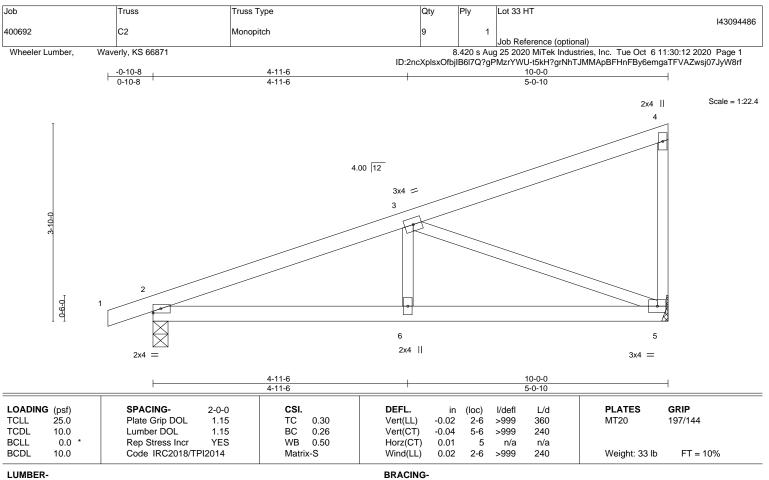
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 3) All plates are 2x4 MT20 unless otherwise indicated.
- 4) Gable requires continuous bottom chord bearing.
- 5) Gable studs spaced at 2-0-0 oc.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 2, 12, 11, 10, 9.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.





TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD**

WFBS 2x3 SPF No.2

REACTIONS. (size) 5=Mechanical, 2=0-3-8

Max Horz 2=158(LC 5)

Max Uplift 5=-94(LC 8), 2=-115(LC 4) Max Grav 5=435(LC 1), 2=514(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

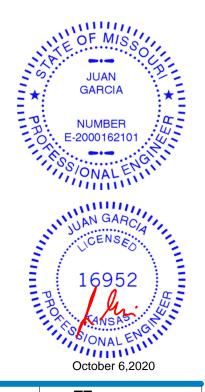
TOP CHORD 2-3=-782/113

BOT CHORD 2-6=-134/682, 5-6=-134/682

WEBS 3-5=-714/178

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5 except (it=lb) 2=115.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use only will will teles collected. This design is asset only upon parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TP1 Quality Criteria, DSB-89 and BCSI Building Component fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANS/TPI1 Qu
Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

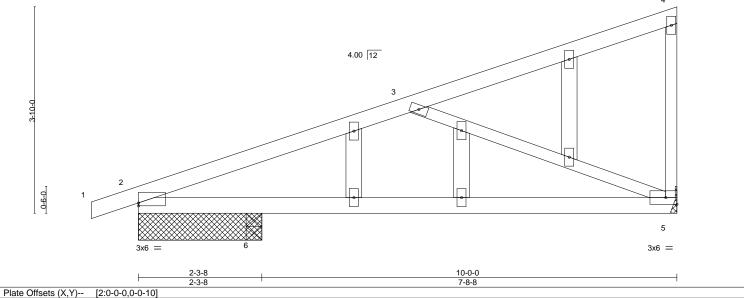


Job Lot 33 HT Truss Type Qty Truss Ply 143094487 400692 СЗ Monopitch Structural Gable Job Reference (optional) Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:13 2020 Page 1

Waverly, KS 66871

ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-LHlfD0r0SmRDzKNNo?IUk9epg4ux__Yi9WSZglyW8re -0-10-8 5-2-8 10-0-0 0-10-8 5-2-8

Scale = 1:21.4



SPACING-DFFI **PLATES** GRIP LOADING (psf) 2-0-0 CSL in (loc) I/defl L/d **TCLL** 25.0 Plate Grip DOL 1.15 TC 0.29 Vert(LL) -0.10 5-6 >935 360 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 вс 0.44 Vert(CT) -0.20 5-6 >473 240 **BCLL** 0.0 Rep Stress Incr YES WB 0.36 Horz(CT) 0.01 5 n/a n/a BCDL Code IRC2018/TPI2014 Wind(LL) -0.01 5-6 >999 Weight: 36 lb FT = 10% 10.0 Matrix-S 240

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

2x3 SPF No.2 WEBS 2x4 SPF No.2 OTHERS

(size) 5=Mechanical, 2=2-3-8, 6=0-3-8

Max Horz 2=158(LC 5)

Max Uplift 5=-112(LC 8), 2=-172(LC 4)

Max Grav 5=398(LC 1), 2=349(LC 1), 6=346(LC 3)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

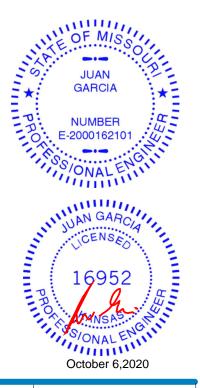
TOP CHORD 2-3=-619/203

BOT CHORD 2-6=-217/526, 5-6=-217/526

WEBS 3-5=-545/271

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 3) All plates are 2x4 MT20 unless otherwise indicated.
- 4) Gable studs spaced at 2-0-0 oc.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 5=112, 2=172.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals

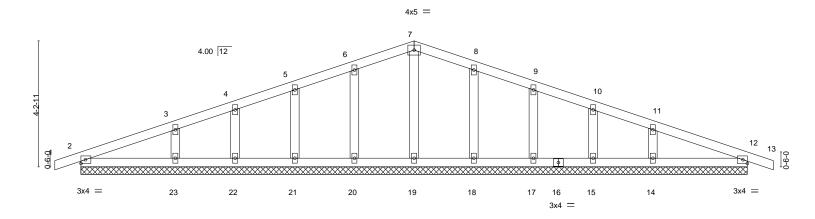


MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Truss Type Qty Ply 143094488 D1 400692 Common Supported Gable Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:14 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-pUs1QMseD4Z4bUyaMipjGNB1XUK8jVusNAC6CByW8rd 0-10-8 0-10-8 11-2-0 22-4-0 11-2-0 11-2-0 0-10-8

Scale = 1:38.6



LOADING TCLL TCDL	G (psf) 25.0 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15	CSI. TC 0.09 BC 0.06	DEFL. Vert(LL) Vert(CT)	in (l 0.00 0.00	(loc) 13 13	l/defl n/r n/r	L/d 120 120	PLATES MT20	GRIP 197/144
BCLL BCDL	0.0 *	Rep Stress Incr YES Code IRC2018/TPI2014	WB 0.03 Matrix-S	Horz(CT)	0.00	12	n/a	n/a	Weight: 77 lb	FT = 10%

BRACING-TOP CHORD

BOT CHORD

22-4-0

LUMBER-

OTHERS

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2

BOT CHORD 2x4 SPF No.2

REACTIONS.

All bearings 22-4-0. (lb) - Max Horz 2=71(LC 12)

Max Uplift All uplift 100 lb or less at joint(s) 2, 20, 21, 22, 23, 18, 17, 15, 14, 12

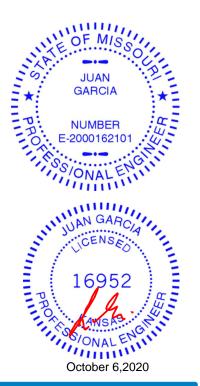
All reactions 250 lb or less at joint(s) 2, 19, 20, 21, 22, 18, 17, 15, 12 except 23=275(LC 21),

14=275(LC 22)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) Gable requires continuous bottom chord bearing.
- 6) Gable studs spaced at 2-0-0 oc.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 20, 21, 22, 23, 18, 17, 15, 14, 12,
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins.

Rigid ceiling directly applied or 10-0-0 oc bracing.

MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

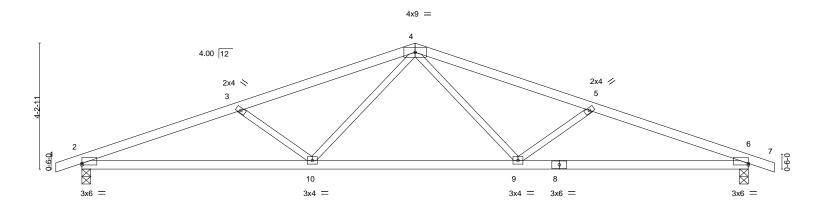
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use Only with New Controlled S. This costign is based only upon parameters shown, and is for an individual druining Component, not a fundamental property incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job Lot 33 HT Truss Truss Type Qty Ply 143094489 400692 D2 Common Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:14 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-pUs1QMseD4Z4bUyaMipjGNBxdUACjTXsNAC6CByW8rd 0-10-8 0-10-8 5-3-15 11-2-0 22-4-0 23-2-8 0-10-8 5-3-15 5-10-1 5-10-1 5-3-15

Scale = 1:38.6



	<u> </u>	7-8-10 7-8-10		+		14-7-6 6-10-12					22-4-0 7-8-10	
Plate Offse	ets (X,Y)	[2:0-0-0,0-0-10], [6:0-0-0,0-0	-10]									
LOADING TCLL	25.0	Plate Grip DOL	1.15).47	DEFL. Vert(LL)	in -0.12		l/defl >999	L/d 360	PLATES MT20	GRIP 197/144
TCDL BCLL BCDL	10.0 0.0 * 10.0		YES		0.69 0.19 S	Vert(CT) Horz(CT) Wind(LL)	-0.25 0.07 0.08	6-9 6 9-10	>999 n/a >999	240 n/a 240	Weight: 68 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2 WEBS 2x3 SPF No.2

(size) 2=0-3-8, 6=0-3-8

Max Horz 2=71(LC 8)

Max Uplift 2=-189(LC 4), 6=-189(LC 5) Max Grav 2=1063(LC 1), 6=1063(LC 1)

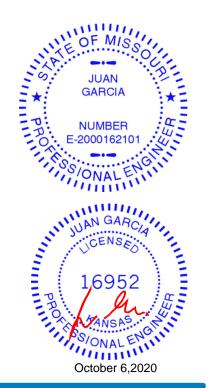
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-3=-2232/355, 3-4=-1909/259, 4-5=-1909/260, 5-6=-2232/355 TOP CHORD **BOT CHORD** 2-10=-333/2049, 9-10=-127/1406, 6-9=-280/2049

4-9=-59/541, 5-9=-418/221, 4-10=-58/541, 3-10=-418/221 WEBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=189. 6=189.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 3-7-2 oc purlins.

Rigid ceiling directly applied or 10-0-0 oc bracing.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



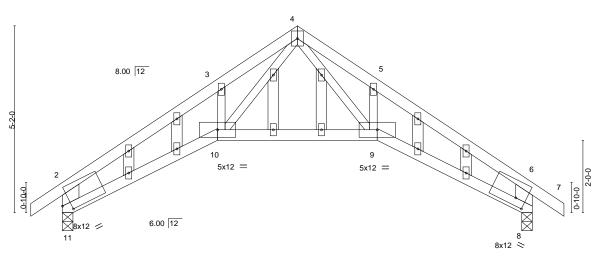
4x5 ||

Scale: 3/8"=1'

Structural wood sheathing directly applied or 5-3-11 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals



 4-3-8
 8-8-8
 13-0-0

 4-3-8
 4-5-0
 4-3-8

 [8:0-3-5,0-2-7], [11:0-2-13,0-2-7]

LOADING	• (nof)	SPACING- 2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
LUADING	(psi)		CSI.		DEFL.	in	(IOC)	i/deli	L/u	PLATES	GKIF
TCLL	25.0	Plate Grip DOL 1.15	TC	0.69	Vert(LL)	-0.16	9-10	>968	360	MT20	197/144
TCDL	10.0	Lumber DOL 1.15	BC	0.61	Vert(CT)	-0.29	9-10	>511	240		
BCLL	0.0 *	Rep Stress Incr YES	WB	0.17	Horz(CT)	0.27	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014	Matri	x-S	Wind(LL)	0.08	9-10	>999	240	Weight: 55 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

Plate Offsets (X Y)--

TOP CHORD 2x4 SPF 2100F 1.8E

BOT CHORD 2x4 SPF No.2

WEBS 2x3 SPF No.2 *Except* 2-11.6-8: 2x6 SP DSS

OTHERS 2x4 SPF No.2

REACTIONS. (size) 11=0-3-8, 8=0-3-8

Max Horz 11=154(LC 7)

Max Uplift 11=-88(LC 8), 8=-88(LC 9) Max Grav 11=642(LC 1), 8=642(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-3=-1287/152, 3-4=-1079/272, 4-5=-1069/195, 5-6=-1287/84, 2-11=-1009/165,

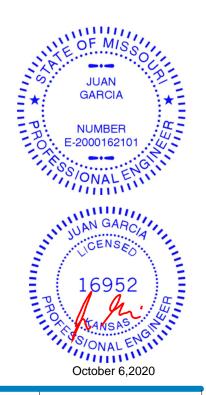
6-8=-1009/102

BOT CHORD 10-11=-127/1104, 9-10=0/624, 8-9=-11/1029

WEBS 4-9=-180/520, 4-10=-219/592

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mpn; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) Gable studs spaced at 1-4-0 oc.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Bearing at joint(s) 11, 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 8.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not



Job Lot 33 HT Truss Type Truss Qty Ply 143094491 400692 E2 Roof Special Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:16 2020 Page 1 $ID: 2ncXplsxOfbjlB6l7Q?gPMzrYWU-ms_or1uulhpoqo6yU7sBLoGEpHpBBN18rUhDH4yW8rb$ 4-2-0 6-4-8 8-7-0 12-10-8

2-2-8

2-2-8

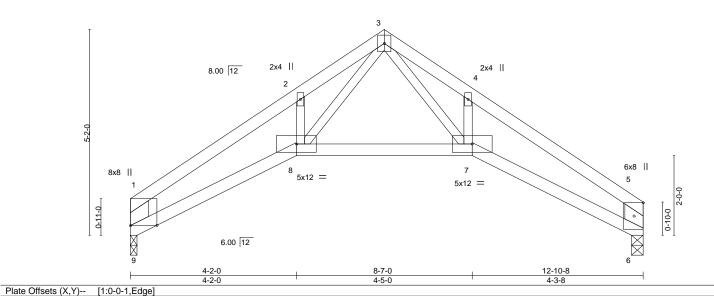
Scale = 1:28.9 4x5 ||

Structural wood sheathing directly applied or 4-2-13 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

4-3-8



LOADING	(psf)	SPACING- 2-0-	0 CSI.	DEFL.	in (loc)	l/defl l	_/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL 1.1	5 TC 0.	0.62 Vert(LL)	-0.24	7-8	>610 3	60	MT20	197/144
TCDL	10.0	Lumber DOL 1.1	5 BC 0.	vert(CT)	-0.45	7-8	>331 2	40		
BCLL	0.0 *	Rep Stress Incr YE	S WB 0.	.18 Horz(CT)	0.40	6	n/a ı	n/a		
BCDL	10.0	Code IRC2018/TPI2014	Matrix-S	Wind(LL)	0.14	7-8	>999 2	40	Weight: 44 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD**

WEBS 2x3 SPF No.2 *Except*

1-9,5-6: 2x6 SP DSS (size) 9=0-2-0, 6=0-3-8

Max Horz 9=-135(LC 4) Max Uplift 9=-61(LC 8), 6=-62(LC 9) Max Grav 9=559(LC 1), 6=559(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 1-2=-1235/160, 2-3=-1049/277, 3-4=-1082/227, 4-5=-1263/97, 1-9=-874/141,

4-2-0

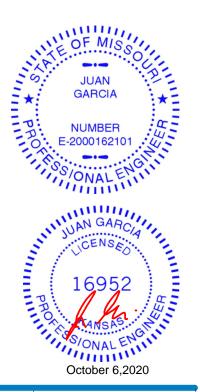
5-6=-889/100

8-9=-143/1032, 7-8=-1/594, 6-7=-38/1012 BOT CHORD WFBS

3-8=-218/570, 3-7=-197/548

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Bearing at joint(s) 9, 6 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 6) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 9.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 9, 6.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Type Truss Qty Ply 143094492 GABLE 400692 E3 Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:17 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-E2YA3NvWW?xfSyh91qNQu?pX_hMpwril48QnpWyW8ra

3x4 =

-0-10-8 0-10-8 10-0-0 20-0-0 20-10-8 10-0-0 10-0-0 0-10-8

Scale = 1:45.2

10 11 9 12 8.00 12 13 14 15 16 17 18 19 36 33 32 31 30 28 26 25 24 23 21 20 35 3x4 3x10 || 3x10 || 20-0-0

Plate Offsets (X,Y)--[10:0-2-0,Edge], [20:0-5-10,0-1-8], [36:0-5-10,0-1-8] LOADING (psf) SPACING-CSL DFFI **PLATES** GRIP 2-0-0 in (loc) I/defl L/d **TCLL** 25.0 Plate Grip DOL 1.15 TC 0.08 Vert(LL) -0.00 19 n/r 120 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 вс 0.06 Vert(CT) -0.00 19 n/r 120 **BCLL** 0.0 Rep Stress Incr YES WB 0.09 Horz(CT) 0.00 20 n/a n/a BCDL Code IRC2018/TPI2014 Matrix-R Weight: 115 lb FT = 10% 10.0

20-0-0

LUMBER-**BRACING-**

TOP CHORD 2x4 SPF No.2 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, BOT CHORD 2x4 SPF No.2 except end verticals 2x4 SPF No.2 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 20-0-0.

(lb) -Max Horz 36=-213(LC 6)

2x4 SPF No.2

Max Uplift All uplift 100 lb or less at joint(s) 36, 20, 34, 33, 32, 31, 30, 27, 26, 24, 23, 22 except 35=-133(LC 8), 21=-120(LC 9)

Max Grav All reactions 250 lb or less at joint(s) 36, 20, 35, 34, 33, 32, 31, 30, 29, 28, 27, 26, 24, 23, 22,

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-

WEBS

OTHERS

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) Gable requires continuous bottom chord bearing.
- 6) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 7) Gable studs spaced at 1-4-0 oc
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 36, 20, 34, 33, 32, 31, 30, 27, 26, 24, 23, 22 except (jt=lb) 35=133, 21=120.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Type Qty Plv Truss 143094493 400692 E4 COMMON GIRDER 3 Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:18 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-iF6YGjv8HJ3W45GLbYufRDMci5cgfAtRIoAKLyyW8rZ -0-10-8 0-10-8 5-9-13 10-0-0 14-2-2 20-0-0

5x7 ||

4-2-2

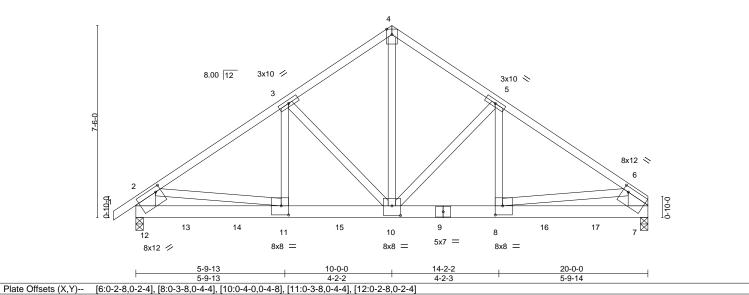
Scale = 1:45.0

Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals

5-9-14



4-2-3

CSL DFFI **PLATES** GRIP LOADING (psf) SPACING-2-0-0 in (loc) I/defl L/d **TCLL** 25.0 Plate Grip DOL 1.15 TC 0.46 Vert(LL) -0.07 10-11 >999 360 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 вс 0.34 Vert(CT) -0.13 10-11 >999 240 **BCLL** WB 0.61 Horz(CT) 0.02 0.0 Rep Stress Incr NO n/a n/a BCDL Code IRC2018/TPI2014 Wind(LL) 0.04 10-11 Weight: 362 lb FT = 10% 10.0 Matrix-S >999 240

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 *Except*

4-6: 2x4 SPF 2100F 1.8E **BOT CHORD** 2x6 SP 2400F 2.0E

2x4 SPF No.2 *Except* WEBS 2-12,6-7: 2x10 SP DSS

(size) 7=0-3-8 (req. 0-4-3), 12=0-3-8 (req. 0-4-4)

Max Horz 12=208(LC 26) Max Uplift 7=-401(LC 9), 12=-281(LC 8) Max Grav 7=7989(LC 1), 12=8075(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-3=-9669/321, 3-4=-7079/323, 4-5=-7097/323, 5-6=-9688/369, 2-12=-6264/280,

5-9-13

6-7=-6182/268

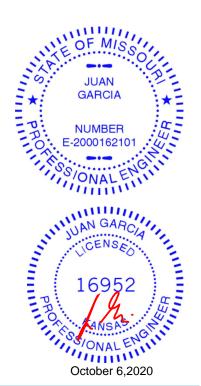
BOT CHORD 11-12=-253/2865 10-11=-276/7932 8-10=-232/7959 7-8=-219/2759

WEBS 4-10=-268/7463, 5-10=-3109/283, 5-8=-102/3457, 3-10=-3021/217, 3-11=-34/3313,

2-11=-86/5119. 6-8=-63/5275

NOTES-

- 1) 3-ply truss to be connected together with 10d (0.131"x3") nails as follows:
 - Top chords connected as follows: 2x4 1 row at 0-7-0 oc, 2x10 2 rows staggered at 0-9-0 oc.
 - Bottom chords connected as follows: 2x6 2 rows staggered at 0-4-0 oc.
 - Webs connected as follows: 2x4 1 row at 0-9-0 oc.
- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 3) Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) WARNING: Required bearing size at joint(s) 7, 12 greater than input bearing size.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 7=401 12=281
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Continued on page 2

\Lambda WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job	Truss	Truss Type	Qty	Ply	Lot 33 HT	
400692	E4	COMMON GIRDER	1	_		143094493
400092	-4	COMMON GIRDER	'	∣ 3	Job Reference (optional)	

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:18 2020 Page 2 ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-iF6YGjv8HJ3W45GLbYufRDMci5cgfAtRloAKLyyW8rZ

NOTES-

10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1659 lb down and 39 lb up at 2-0-0, 1659 lb down and 39 lb up at 4-0-0, 1583 lb down and 39 lb up at 6-0-0, 1583 lb down and 39 lb up at 8-0-0, 1668 lb down and 39 lb up at 10-0-0, 1665 lb down and 39 lb up at 12-0-0, 1665 lb down and 39 lb up at 14-0-0, and 1665 lb down and 39 lb up at 16-0-0, and 1578 lb down and 219 lb up at 18-0-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-2=-70, 2-4=-70, 4-6=-70, 7-12=-20

Concentrated Loads (lb)

Vert: 9=-1587(B) 10=-1583(B) 8=-1587(B) 11=-1583(B) 13=-1578(B) 14=-1578(B) 15=-1583(B) 16=-1587(B) 17=-1578(B)

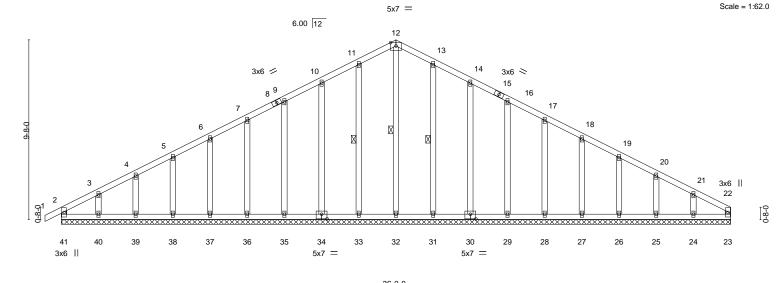




Waverly, KS 66871 Wheeler Lumber,

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:20 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-edDlhPxPowJEJPQkjzw7WeR2MuNU7Brkm6fRQryW8rX

-0-10-8 0-10-8 18-0-0 36-0-0 18-0-0 18-0-0



T late Oil	3613 (A, I)	[30.0-3-0,0-3-0], [34.0-3-0,0-3	5-Uj									
LOADIN	G (psf)	SPACING- 2-0	0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL 1.	.15	TC	0.07	Vert(LL)	-0.00	1	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL 1.	.15	BC	0.06	Vert(CT)	-0.00	1	n/r	120		
BCLL	0.0 *	Rep Stress Incr Y	ES	WB	0.13	Horz(CT)	0.01	23	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI201	14	Matrix	k-R	, ,					Weight: 183 lb	FT = 10%

36-0-0

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

2x4 SPF No.2 WEBS 2x4 SPF No.2 OTHERS

BRACING-

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

except end verticals.

BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. WEBS 1 Row at midpt 12-32, 11-33, 13-31

REACTIONS. All bearings 36-0-0.

(lb) -Max Horz 41=161(LC 8)

Max Uplift All uplift 100 lb or less at joint(s) 41, 33, 34, 35, 36, 37, 38, 39, 31, 30, 29, 28, 27, 26, 25 except 40=-112(LC 8), 24=-103(LC 9)

Max Grav All reactions 250 lb or less at joint(s) 41, 23, 32, 33, 34, 35, 36, 37, 38, 39, 40, 31, 30, 29, 28, 27, 26, 25, 24

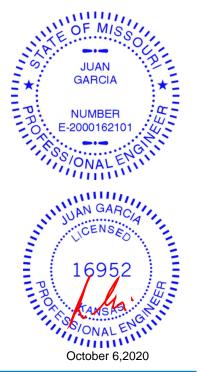
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

[30:0-3-8 0-3-0] [34:0-3-8 0-3-0]

TOP CHORD 11-12=-46/254

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) Gable requires continuous bottom chord bearing.
- 6) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- Gable studs spaced at 2-0-0 oc.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 41, 33, 34, 35, 36, 37, 38, 39, 31, 30, 29, 28, 27, 26, 25 except (jt=lb) 40=112, 24=103.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Truss Type Qty Ply 143094495 400692 G2 Roof Special Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:21 2020 Page 1

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> Scale = 1:57.2 4x5 ||

Structural wood sheathing directly applied or 3-3-12 oc purlins,

3-12, 6-10

Rigid ceiling directly applied or 9-3-13 oc bracing.

except end verticals.

1 Row at midpt

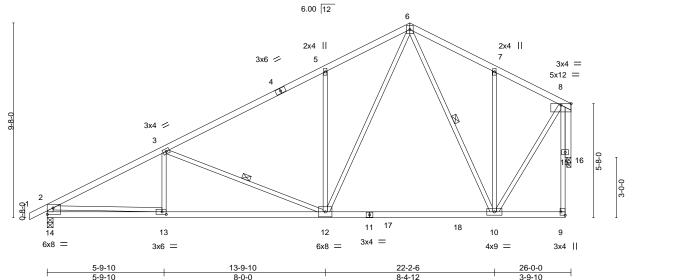


Plate Offsets (X,Y)--[9:Edge,0-2-8], [13:0-2-8,0-1-8], [14:Edge,0-3-13]

LOADING (psf)	SPACING- 2-0-0	CSI.	DEFL. in (loc)	I/defl L/d	PLATES GRIP
TCLL 25.0	Plate Grip DOL 1.15	TC 0.68	Vert(LL) -0.21 10-12	>999 360	MT20 197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.86	Vert(CT) -0.33 10-12	>923 240	
BCLL 0.0 *	Rep Stress Incr YES	WB 0.73	Horz(CT) 0.18 16	n/a n/a	
BCDL 10.0	Code IRC2018/TPI2014	Matrix-S	Wind(LL) 0.07 12-13	>999 240	Weight: 118 lb FT = 10%

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2

WEBS 2x3 SPF No.2 *Except* 2-14: 2x4 SPF No.2

OTHERS 2x4 SPF No.2

REACTIONS. (size) 14=0-3-8, 16=0-2-8

Max Horz 14=243(LC 5)

Max Uplift 14=-178(LC 8), 16=-139(LC 8) Max Grav 14=1273(LC 2), 16=1213(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-3=-2023/262, 3-5=-1401/193, 5-6=-1376/338, 6-7=-718/167, 7-8=-668/113, TOP CHORD

2-14=-1178/205

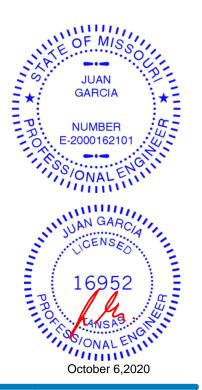
BOT CHORD 13-14=-287/524, 12-13=-392/1763, 10-12=-59/727

WEBS 3-12=-647/234, 5-12=-497/274, 6-12=-283/1095, 6-10=-381/102, 7-10=-342/183,

2-13=-106/1277, 8-10=-99/1005, 8-16=-1219/140

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) The Fabrication Tolerance at joint 2 = 2%
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 6) Bearing at joint(s) 16 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 7) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 16.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb)
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



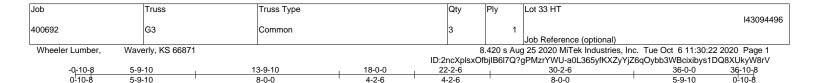


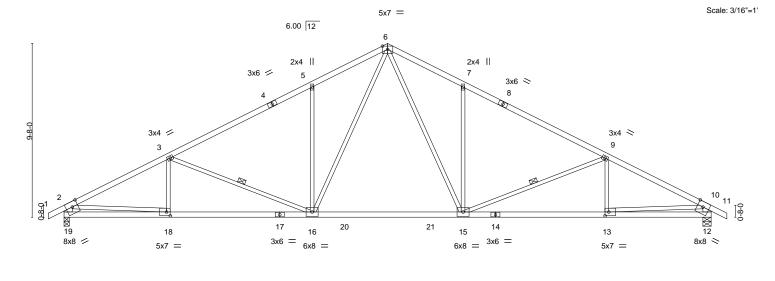
\Lambda WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use Only with New Controlled S. This costign is based only upon parameters shown, and is for an individual druining Component, not a fundamental property incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601







1	5-9-10	13-9-10	1	22-2-6	1	30-2-6		36-0)-0	ı
	5-9-10	8-0-0	· ·	8-4-12		8-0-0		5-9-	10	
Plate Offsets (X,Y) [12:0-3-12,Edge], [13:0-2-8,0-2-8], [18:0-2-8,0-2-8], [19:0-3-12,Edge]										
LOADING (psf)	SPACING	- 2-0-0	CSI.	DEFL.	in (loc)	I/defI L/d		PLATES	GRIP	

TCLL 25.0 Plate Grip DOL 1.15 TC 0.92 Vert(LL) -0.26 15-16 >999 360 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 вс 0.53 Vert(CT) -0.43 15-16 >996 240 **BCLL** 0.0 Rep Stress Incr YES WB 0.74 Horz(CT) 0.08 12 n/a n/a BCDL Code IRC2018/TPI2014 Wind(LL) 0.11 16-18 Weight: 145 lb FT = 10% 10.0 Matrix-S >999 240

BRACING-

WEBS

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF 2100F 1.8E WEBS 2x3 SPF No.2 *Except*

2-19.10-12: 2x6 SPF No.2

REACTIONS. (size) 19=0-3-8, 12=0-5-8 Max Horz 19=-150(LC 9)

Max Uplift 19=-224(LC 8), 12=-224(LC 9)

Max Grav 19=1743(LC 2), 12=1743(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-3=-2882/343, 3-5=-2373/287, 5-6=-2351/431, 6-7=-2351/431, 7-9=-2373/287,

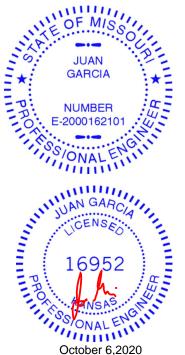
9-10=-2882/344, 2-19=-1638/249, 10-12=-1638/248

18-19=-226/675, 16-18=-383/2516, 15-16=-63/1605, 13-15=-233/2516, 12-13=-89/598 BOT CHORD 6-15=-284/1056, 7-15=-500/276, 9-15=-572/220, 6-16=-284/1056, 5-16=-500/276, WFBS

3-16=-572/220, 2-18=-157/1925, 10-13=-144/1925

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 19=224, 12=224,
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied, except end verticals.

9-15, 3-16

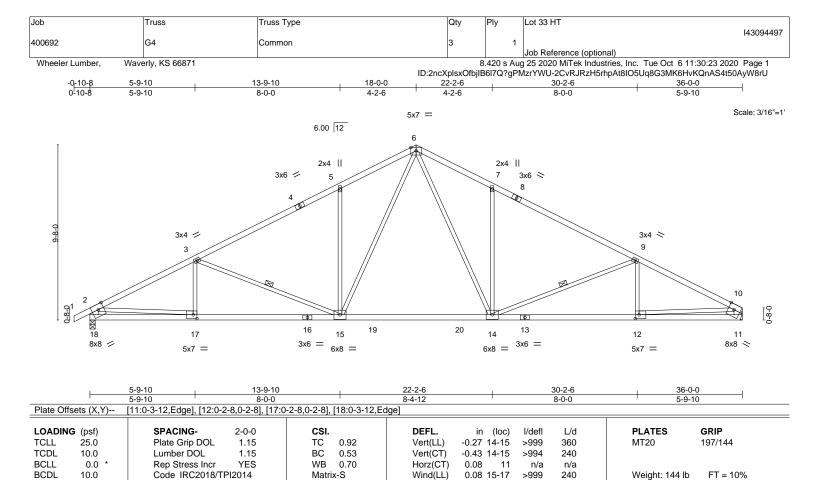
Rigid ceiling directly applied or 10-0-0 oc bracing.

1 Row at midpt

October 6,2020







BRACING-

WEBS

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF 2100F 1.8E WEBS 2x3 SPF No.2 *Except*

2-18.10-11: 2x6 SPF No.2

REACTIONS. (size) 18=0-3-8, 11=Mechanical

Max Horz 18=123(LC 5)

Max Uplift 18=-31(LC 8), 11=-19(LC 9) Max Grav 18=1744(LC 2), 11=1679(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-3=-2884/46, 3-5=-2375/55, 5-6=-2353/150, 6-7=-2353/150, 7-9=-2377/55,

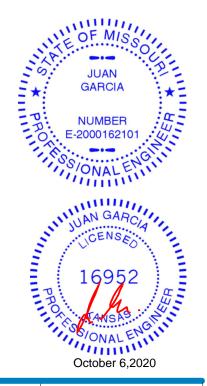
9-10=-2890/47, 2-18=-1639/57, 10-11=-1572/45

17-18=-107/674, 15-17=-80/2566, 14-15=0/1618, 12-14=0/2530, 11-12=-15/514 BOT CHORD WFBS 6-14=-117/1074, 7-14=-495/166, 9-14=-586/111, 6-15=-117/1073, 5-15=-500/166,

3-15=-572/109, 2-17=0/1927, 10-12=0/2024

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18, 11.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied, except end verticals.

9-14, 3-15

Rigid ceiling directly applied or 10-0-0 oc bracing.

1 Row at midpt



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

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ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job Lot 33 HT Truss Type Truss Qty Ply 143094498 400692 G5 Roof Special Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:23 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-2CvRJRzH5rhpAt8lO5Uq8G3MY6DfKLDAS4t50AyW8rU -0-10-8 2-3-8 0-10-8 2-3-8 5-9-9 13-6-0 18-0-0 22-2-6 30-2-6 36-0-0 3-6-1 7-8-7 4-6-0 4-2-6 5-9-10 Scale = 1:66.2 6x8 II 6.00 12 6 2x4 || 2x4 || 3x6 > 5 6x8 / 4x5 / 3x4 < 3 [8] [9] 16 Lax8 17 Ф 8x12 2x4 II 14 4x9 / 18 15 13 12 3x6 =6x8 < 5x12 = 3x6 II 5x7 = 2x4 || 3x6 II 3-6-1 7-8-7 8-8-6 8-0-0 5-9-10 Plate Offsets (X,Y)--[1:Edge,0-0-1], [2:0-5-14,Edge], [2:0-1-10,0-2-2], [4:0-4-0,Edge], [11:0-3-4,0-2-0], [12:0-2-8,0-2-8] SPACING-CSL DFFI (loc) **PLATES** GRIP LOADING (psf) 2-0-0 in I/defl L/d **TCLL** 25.0 Plate Grip DOL 1.15 TC 0.91 Vert(LL) -0.28 16-17 >999 360 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 вс 0.80 Vert(CT) -0.58 16-17 >743 240 **BCLL** 0.0 Rep Stress Incr WB 0.99 Horz(CT) 0.31 YES 11 n/a n/a BCDL Code IRC2018/TPI2014 Matrix-S Wind(LL) 0.15 16-17 >999 240 Weight: 172 lb FT = 10% 10.0 LUMBER-**BRACING-**TOP CHORD 2x4 SPF No.2 *Except* TOP CHORD Structural wood sheathing directly applied, except end verticals. Rigid ceiling directly applied or 10-0-0 oc bracing.

BOT CHORD

1 Row at midpt

3-16, 9-13

WEBS

4-6: 2x6 SPF No.2, 1-4: 2x8 SP DSS

BOT CHORD 2x4 SPF No.2 *Except*

2-16: 2x4 SPF 2100F 1.8E, 5-15: 2x3 SPF No.2

2x3 SPF No.2 *Except* WEBS

2-18,10-11: 2x6 SPF No.2

REACTIONS. (size) 1=0-3-8, 11=Mechanical

Max Horz 1=116(LC 5)

Max Uplift 1=-19(LC 8), 11=-19(LC 9) Max Grav 1=1603(LC 1), 11=1603(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

1-2=-860/60, 2-3=-3967/81, 3-5=-2652/57, 5-6=-2598/151, 6-7=-2231/147, TOP CHORD

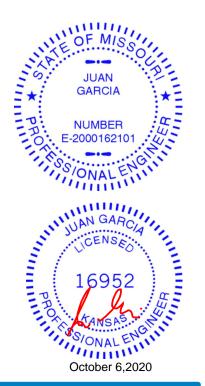
7-9=-2270/53. 9-10=-2774/49. 10-11=-1537/46

BOT CHORD 2-17=-130/3819, 16-17=-126/3814, 5-16=-458/158, 12-13=-1/2417, 11-12=-13/447 **WEBS** 3-16=-1619/147, 13-16=0/1525, 6-16=-115/1348, 6-13=-124/834, 7-13=-478/164,

9-13=-581/115, 10-12=0/1977

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 11.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





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ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job Lot 33 HT Truss Type Truss Qty Ply 143094499 400692 G6 Roof Special Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:25 2020 Page 1

18-0-0

4-2-7

ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-?b1Bk6?XdSyWPAIhVWWJDh8k0vrNoFdTvOMC53yW8rS 23-11-0 30-2-8 36-0-0

6-3-8

5-9-9

Scale = 1:61.9



5-11-0

in (loc)

0.33

0.14

-0.40 14-15

-0.68 14-15

11

17

I/defl

>999

>626

>999

except end verticals

1 Row at midpt

2-2-0 oc bracing: 15-17.

n/a

L/d

360

240

n/a

240

MT20

Structural wood sheathing directly applied or 2-9-12 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing, Except:

3-15

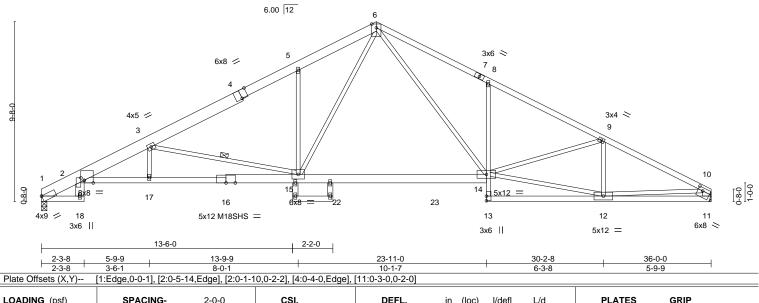
M18SHS

Weight: 180 lb

197/144

197/144

FT = 10%



Vert(LL)

Vert(CT)

Horz(CT)

Wind(LL)

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-TOP CHORD

LOADING (psf)

25.0

10.0

0.0

10.0

TCLL

TCDL

BCLL

BCDL

-0-10-8 2-3-8 0-10-8 2-3-8

5-9-9

3-6-1

13-9-9

8-0-1

2x4 SPF No.2 *Except*

4-6: 2x6 SPF No.2, 1-4: 2x8 SP DSS 2x4 SPF No.2 *Except*

BOT CHORD

2-16: 2x4 SPF 2100F 1.8E, 8-13: 2x3 SPF No.2, 14-16: 2x6 SPF No.2

2x3 SPF No.2 *Except* WEBS

2-18,10-11: 2x6 SPF No.2, 15-19,20-21: 2x4 SPF No.2

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

REACTIONS. (size) 1=0-3-8, 11=Mechanical

Max Horz 1=116(LC 5)

Max Uplift 1=-19(LC 8), 11=-19(LC 9) Max Grav 1=1686(LC 2), 11=1688(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

1-2=-933/60, 2-3=-4112/96, 3-5=-2863/39, 5-6=-2813/133, 6-8=-2991/142, TOP CHORD

8-9=-2973/44. 9-10=-2882/40. 10-11=-1584/47

BOT CHORD 2-17=-143/4048, 15-17=-140/4043, 14-15=0/1838, 8-14=-455/151, 11-12=-29/525 **WEBS** 3-15=-1608/179, 5-15=-460/157, 6-15=-82/1401, 6-14=-112/1343, 12-14=0/2484,

2-0-0

1.15

1.15

YES

CSL

TC

вс

WB

Matrix-S

0.78

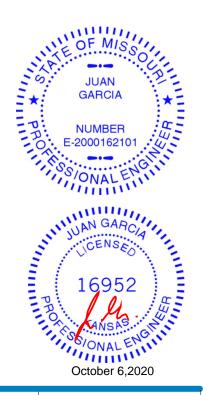
0.98

0.99

9-12=-458/74, 10-12=0/1996

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) All plates are MT20 plates unless otherwise indicated.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 11.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not

a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPH Quality Criteria, DSB-89 and BCSI Building Component fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANS/TPI1 Qu
Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job Lot 33 HT Truss Type Qty Truss Ply 143094500 400692 G7 Roof Special Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:26 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-TnbaxS09Om4N1Ktt3D1Ylvhw8JFPXkJd826ldVyW8rR -0-10-8 2-3-8 0-10-8 2-3-8 5-9-9 13-9-9 18-0-0 30-7-0 33-2-7 36-0-0 3-6-1 8-0-1 4-2-7 4-2-7 2-7-6 2-9-10 Scale = 1:61.9 6x8 II 6.00 12 6 3x6 <> 5 6x8 / 8 4x5 / 6x8 < 3 5x7 > 10 15 6x10 M18SHS 19 16 25 4x9 6x8 / 20 14 13 12 4x9 =3x6 6x8 = 6x8 = 5x12 = 3-6-1 8-0-1 8-4-13 8-4-9 2-9-10 Plate Offsets (X,Y)-[1:Edge,0-0-1], [2:0-6-14,Edge], [4:0-4-0,Edge], [12:Edge,0-3-13], [15:0-7-4,0-4-0] SPACING-CSL DFFI **PLATES** GRIP LOADING (psf) 2-0-0 in (loc) I/defl L/d **TCLL** 25.0 Plate Grip DOL 1.15 TC 0.76 Vert(LL) -0.35 16-18 >999 360 MT20 197/144 **TCDL** 10.0 Lumber DOL 1.15 ВС 0.73 Vert(CT) -0.63 15-16 >676 240 M18SHS 197/144 **BCLL** Rep Stress Incr WB 0.84 Horz(CT) 0.40 0.0 YES 12 n/a n/a BCDL Code IRC2018/TPI2014 Matrix-S Wind(LL) 0.15 18-19 240 Weight: 183 lb FT = 10% 10.0 >999 LUMBER-**BRACING-**TOP CHORD Structural wood sheathing directly applied or 2-10-2 oc purlins,

BOT CHORD

WERS

except end verticals

1 Row at midpt

Rigid ceiling directly applied or 10-0-0 oc bracing.

3-18, 9-16

TOP CHORD 2x6 SPF No.2 *Except*

6-8: 2x4 SPF No.2, 1-4: 2x8 SP DSS, 8-11: 2x4 SPF 2100F 1.8E

BOT CHORD 2x4 SPF No.2 *Except*

2-17: 2x6 SPF 1650F 1.4E, 9-14: 2x3 SPF No.2

15-17: 2x4 SPF 2100F 1.8E 2x3 SPF No.2 *Except*

2-20: 2x6 SPF No.2, 3-18,9-16,11-12,18-21,22-23: 2x4 SPF No.2

REACTIONS. (size) 1=0-3-8, 12=Mechanical

Max Horz 1=115(LC 5)

Max Uplift 1=-19(LC 8), 12=-19(LC 9) Max Grav 1=1685(LC 2), 12=1685(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 1-2=-932/61, 2-3=-4358/97, 3-5=-2824/48, 5-6=-2783/140, 6-7=-2725/129,

7-9=-2770/34. 9-10=-4642/68. 10-11=-2625/25. 11-12=-1592/33

BOT CHORD 2-19=-142/4224, 18-19=-140/4227, 16-18=0/1849, 15-16=-30/4263, 9-15=0/912,

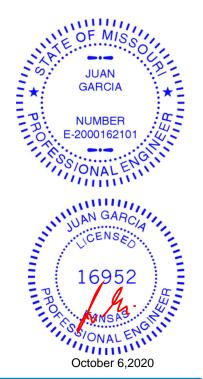
WEBS 3-18=-1836/171, 5-18=-462/158, 6-18=-112/1324, 6-16=-108/1243, 7-16=-490/168,

9-16=-1946/155, 13-15=0/2436, 10-15=-24/1927, 10-13=-1327/22, 11-13=0/1860

NOTES-

WEBS

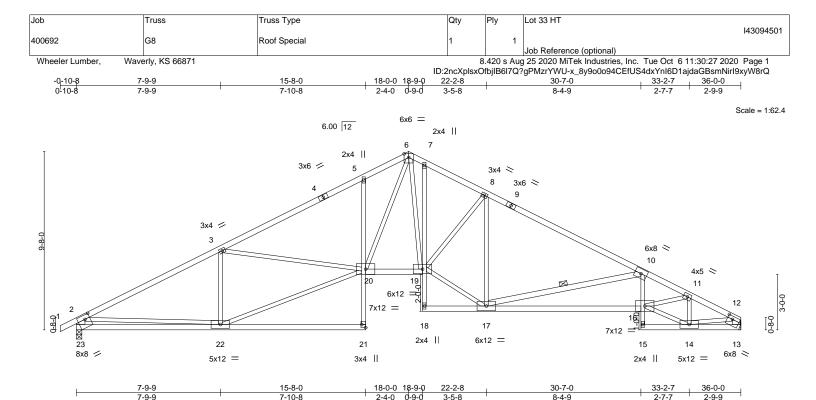
- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) All plates are MT20 plates unless otherwise indicated.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 12.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not





	0010 (71,1)	[10.0 0 1,0 2 0], [21.2ug	-,,,	- /							
LOADIN	G (psf)	SPACING-	2-0-0	CSI.		DEFL.	in (lo	c) I/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.97	Vert(LL)	-0.26 19-2	999	360	MT20	197/144
ΓCDL	10.0	Lumber DOL	1.15	BC	0.61	Vert(CT)	-0.51 16-1	7 >830	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.88	Horz(CT)	0.29	13 n/a	n/a		
BCDL	10.0	Code IRC2018/TF	PI2014	Matri	x-S	Wind(LL)	0.17 5-2	20 >999	240	Weight: 166 lb	FT = 10%

BRACING-

WEBS

TOP CHORD

BOT CHORD

8-4-9

9-7-12 oc bracing: 22-23

1 Row at midpt

6-0-0 oc bracing: 18-19,17-18.

Structural wood sheathing directly applied, except end verticals.

Rigid ceiling directly applied or 10-0-0 oc bracing, Except:

10-17

LUMBER-TOP CHORD

2x4 SPF No.2 *Except*

1-4: 2x4 SPF 2100F 1.8E

7-9-9

BOT CHORD 2x4 SPF No.2 *Except*

5-21,7-18,10-15: 2x3 SPF No.2, 16-18: 2x4 SPF 2100F 1.8E

WEBS 2x3 SPF No.2 *Except*

10-17: 2x4 SPF No.2, 2-23,12-13: 2x6 SP DSS

REACTIONS. (size) 23=0-3-8, 13=Mechanical

Max Horz 23=160(LC 8)

Max Uplift 23=-224(LC 8), 13=-199(LC 9) Max Grav 23=1678(LC 1), 13=1598(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-3=-2729/328, 3-5=-3198/383, 5-6=-3131/498, 6-7=-2568/347, 7-8=-2760/348, TOP CHORD

[13:0-3-4 0-2-0] [21:Edge 0-2-8] [23:0-3-4 0-2-12]

8-10=-2614/297, 10-11=-3944/497, 11-12=-2415/287, 2-23=-1604/264, 12-13=-1523/207

7-10-8

BOT CHORD 22-23=-364/893, 5-20=-415/238, 19-20=-101/2233, 16-17=-419/3632, 10-16=0/497,

13-14=-68/379

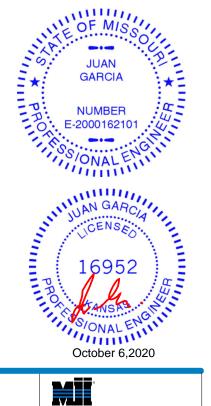
WEBS 3-22=-818/241, 20-22=-377/2472, 3-20=0/447, 6-20=-356/1416, 6-19=-158/988,

17-19=-114/2569, 8-19=-10/344, 8-17=-815/134, 10-17=-1450/368, 2-22=-8/1443,

12-14=-160/1746, 11-16=-179/1513, 14-16=-184/2128, 11-14=-1137/144

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb)
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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16023 Swingley Ridge Rd Chesterfield, MO 63017

Job Lot 33 HT Truss Type Truss Qty Ply 143094502 400692 J1 Diagonal Hip Girder Job Reference (optional) Waverly, KS 66871 Wheeler Lumber, 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:28 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-PAiKM81QwNK5Ge1GBe30rKmL573R?ruvbMbsiNyW8rP -1-2-14 5-6-6 1-2-14 Scale = 1:16.9 3x4 II 3 4.24 12 0-8-0 7 4 2x4 || 5-6-6 5-6-6

LOADING (psf) SPACING-**PLATES** GRIP CSI. DEFL. 2-0-0 (loc) I/defl I/d Plate Grip DOL 197/144 **TCLL** 25.0 1.15 TC 0.41 Vert(LL) -0.03 4-5 >999 360 MT20 TCDL 10.0 Lumber DOL 1.15 BC 0.25 Vert(CT) -0.07 4-5 >967 240 **BCLL** 0.0 Rep Stress Incr NO WB 0.00 Horz(CT) -0.00 4 n/a n/a 10.0 Code IRC2018/TPI2014 Wind(LL) >999 240 Weight: 16 lb FT = 10% BCDL Matrix-R 0.01 4-5

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2

2x4 SPF No.2 *Except* WFBS 3-4: 2x3 SPF No.2

REACTIONS. (size) 5=0-4-9, 4=Mechanical

Max Horz 5=111(LC 7)

Max Uplift 5=-101(LC 4), 4=-50(LC 8) Max Grav 5=346(LC 1), 4=224(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-5=-306/140

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4 except (jt=lb) 5=101.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 7) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 69 lb down and 36 lb up at 2-9-8, and 69 lb down and 36 lb up at 2-9-8 on top chord, and 3 lb down and 1 lb up at 2-9-8, and 3 lb down and 1 lb up at 2-9-8 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
- 8) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

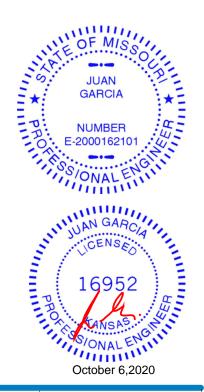
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-2=-70, 2-3=-70, 4-5=-20

Concentrated Loads (lb)

Vert: 7=2(F=1, B=1)



Structural wood sheathing directly applied or 5-6-6 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE



Job Lot 33 HT Truss Truss Type Qty Ply 143094503 J2 400692 Jack-Open Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:28 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-PAiKM81QwNK5Ge1GBe30rKmOG75M?ruvbMbsiNyW8rP -0-10-8 4-0-0 0-10-8 4-0-0 Scale = 1:16.2 6.00 12 0-8-0 3x6 II

> 4-0-0 4-0-0

LOADING	G (psf)	SPACING- 2-0-0	CSI.	DEFL.	in (le	oc) I/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL 1.15	TC 0.20	Vert(LL)	-0.01	4-5 >999	360	MT20	197/144
TCDL	10.0	Lumber DOL 1.15	BC 0.13	Vert(CT)	-0.02	4-5 >999	240		
BCLL	0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT)	0.01	3 n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014	Matrix-R	Wind(LL)	0.01	4-5 >999	240	Weight: 11 lb	FT = 10%

LUMBER-

WFBS

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 4-0-0 oc purlins,

except end verticals.

BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 5=0-3-8, 3=Mechanical, 4=Mechanical

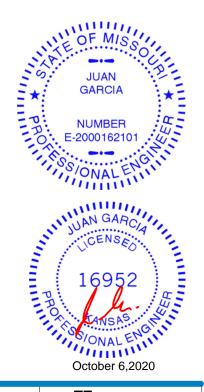
Max Horz 5=89(LC 8)

Max Uplift 5=-30(LC 8), 3=-66(LC 8)

Max Grav 5=252(LC 1), 3=116(LC 1), 4=71(LC 3)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.









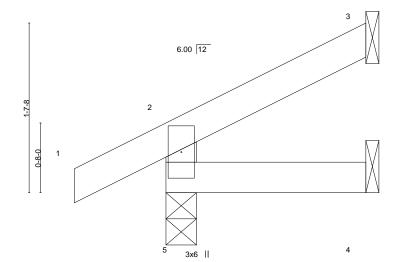
Job Lot 33 HT Truss Truss Type Qty Ply 143094504 J3 400692 Jack-Open Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:29 2020 Page 1 ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-tMGiaU22hhSyuocSkMbFNXJb5XSEkI73q?KPEqyW8rO

-0-10-8 1-10-15 0-10-8 1-10-15

Scale = 1:11.0



1-10-15 1-10-15

LOADING (psf TCLL 25.0 TCDL 10.0	Ó O	SPACING- Plate Grip DOL Lumber DOL	2-0-0 1.15 1.15	CSI. TC BC	0.07 0.02	DEFL. Vert(LL) Vert(CT)	in -0.00 -0.00	(loc) 5 5	l/defl >999 >999	L/d 360 240	PLATES MT20	GRIP 197/144	
BCLL 0.0 BCDL 10.0	0 *	Rep Stress Incr Code IRC2018/TF	YES	WB Matri	0.00 v-P	Horz(CT) Wind(LL)	-0.00 0.00	3	n/a >999	n/a 240	Weight: 6 lb	FT = 10%	
BCDL 10.0	١	Code INC2016/1F	12014	iviatii	X-IX	VVIIId(LL)	0.00	5	>555	240	Weight. 6 ib	F1 = 1076	

LUMBER-

WFBS

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2 **BRACING-**TOP CHORD

Structural wood sheathing directly applied or 1-10-15 oc purlins,

except end verticals.

BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 5=0-3-8, 3=Mechanical, 4=Mechanical

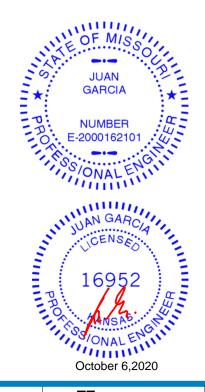
Max Horz 5=48(LC 8)

Max Uplift 5=-26(LC 8), 3=-30(LC 8)

Max Grav 5=171(LC 1), 3=44(LC 1), 4=31(LC 3)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Job Lot 33 HT Truss Truss Type Qty Ply 143094505 J8 400692 Jack-Closed Supported Gable Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:29 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-tMGiaU22hhSyuocSkMbFNXJciXSXkl73q?KPEqyW8rO

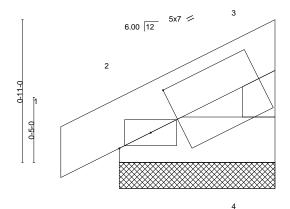
Structural wood sheathing directly applied or 1-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

-0-4-8 1-0-0 0-4-8

Scale = 1:7.4



2x4 =

Plate Offsets (X Y)-- [3:0-5-0 0-2-8]

LOADING	G (psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.03	Vert(LL)	0.00	1	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.00	Vert(CT)	-0.00	1	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TI	PI2014	Matri	x-P	, ,					Weight: 3 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2 WEBS 2x3 SPF No.2

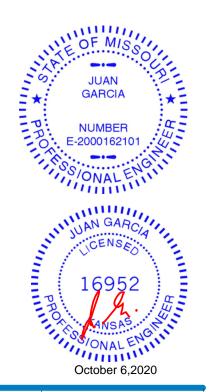
REACTIONS. (size) 4=1-0-0, 2=1-0-0

Max Horz 2=25(LC 5) Max Uplift 4=-9(LC 16), 2=-26(LC 8) Max Grav 4=12(LC 4), 2=106(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 3) Gable requires continuous bottom chord bearing.
- 4) Gable studs spaced at 2-0-0 oc.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.









Job Lot 33 HT Truss Truss Type Qty Ply 143094506 J9 400692 Jack-Closed Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:30 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-LZq4nq3gS?apWxBfl36UwlrnlwoiTlNC3f4zmGyW8rN

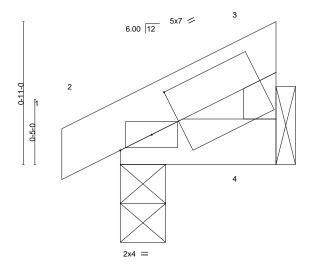
Structural wood sheathing directly applied or 1-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

-0-4-8 1-0-0 0-4-8

Scale = 1:7.4



1-0-0 1-0-0

BRACING-

TOP CHORD

BOT CHORD

Plate Offsets (X,Y)	[3:0-5-0,0-2-8]
---------------------	-----------------

LOADIN	G (psf)	SPACING- 2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL 1.15	TC 0.01	Vert(LL)	-0.00	2	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL 1.15	BC 0.01	Vert(CT)	-0.00	2	>999	240		
BCLL	0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014	Matrix-P	Wind(LL)	0.00	2	****	240	Weight: 3 lb	FT = 10%

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

WEBS 2x3 SPF No.2

REACTIONS. (size) 4=Mechanical, 2=0-3-8

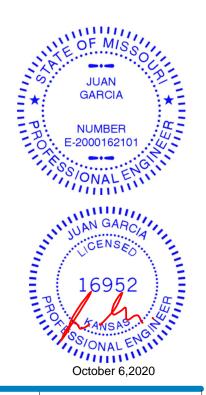
Max Horz 2=25(LC 5)

Max Uplift 4=-9(LC 8), 2=-15(LC 8) Max Grav 4=32(LC 1), 2=74(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 4) Refer to girder(s) for truss to truss connections.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Ply Lot 33 HT Truss Type Truss Qty 143094507 R1 400692 Common Girder 2 Job Reference (optional) Wheeler Lumber, Waverly, KS 66871 8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:31 2020 Page 1 ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-pIOT?A3IDlig75mrsmdjSyOopK2MC1RMIJpWliyW8rM -0-10-8 0-10-8 5-9-10 13-9-10 18-0-0 22-2-6 25-10-8 30-2-6 36-0-0 5-9-10 8-0-0 4-2-6 4-2-6 3-8-2 4-3-14 5-9-10 Scale = 1:60.3 6x6 II 6.00 12 6 2x4 II 2x4 || 3x6 / 3x6 < 5 8 6x8 ≥ 9 3x4 🖊 3x6 ≥ 10 3 [% 15 17 12 16 14 13 4x9 5x12 < 6x8 = 3x6 || 3x6 || 4x9 = 8x8 = 12x12 = 5-9-10 8-0-0 8-4-12 3-8-2 4-3-14 5-9-10

DFFI

Vert(LL)

Vert(CT)

Horz(CT)

Wind(LL)

BRACING-

TOP CHORD

BOT CHORD

in (loc)

> 13 >999

13

11

13

-0.19

-0.34

0.07

0.12

I/defl

>999

>999

n/a

L/d

360

240

n/a

240

Rigid ceiling directly applied or 10-0-0 oc bracing.

LUMBER-

TCLL

TCDL

BCLL

BCDL

TOP CHORD 2x4 SPF No.2 *Except*

1-4.8-11: 2x4 SPF 2100F 1.8E

BOT CHORD 2x8 SP 2400F 2.0E WEBS 2x4 SPF No.2

WEDGE

Right: 2x4 SP No.3

Plate Offsets (X,Y)-

25.0

10.0

0.0

10.0

LOADING (psf)

REACTIONS. (size) 2=0-3-8, 11=0-5-8

Max Horz 2=108(LC 24)

Max Uplift 2=-193(LC 8), 11=-594(LC 9) Max Grav 2=3144(LC 2), 11=6326(LC 1)

[11:0-0-15,0-1-10], [13:0-3-8,0-6-0]

Code IRC2018/TPI2014

2-0-0

1.15

1.15

NO

SPACING-

Plate Grip DOL

Rep Stress Incr

Lumber DOL

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-3=-5931/375, 3-5=-5449/400, 5-6=-5412/494, 6-7=-7210/696, 7-9=-7209/630, TOP CHORD

9-10=-10168/935, 10-11=-11530/1079

BOT CHORD 2-17=-372/5146, 16-17=-372/5146, 14-16=-248/4365, 13-14=-704/9043, 12-13=-886/10008. 11-12=-886/10008

WEBS 6-14=-548/4919, 7-14=-272/114, 10-13=-1422/224, 10-12=-146/1587, 6-16=-146/1101,

5-16=-472/166, 3-16=-637/228, 9-14=-4622/567, 9-13=-544/4883

NOTES-

1) 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:

Top chords connected as follows: 2x4 - 1 row at 0-4-0 oc.

Bottom chords connected as follows: 2x8 - 2 rows staggered at 0-2-0 oc.

Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.

2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.

CSL

TC

вс

WB

Matrix-S

0.63

0.36

0.72

- 3) Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=193 11=594
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 9) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 4163 lb down and 450 lb up at 25-10-7, 539 lb down and 82 lb up at 27-11-4, 539 lb down and 82 lb up at 29-11-4, and 539 lb down and 82 lb up at 31-11-4, and 539 lb down and 82 lb up at 33-11-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of

Continues on page 2



PLATES

Weight: 459 lb

MT20

Structural wood sheathing directly applied or 4-3-12 oc purlins.

GRIP

197/144

FT = 10%

MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use Only with New Controlled S. This costign is based only upon parameters shown, and is for an individual druining Component, not a fundamental property incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job	Truss	Truss Type	Qty	Ply	Lot 33 HT
400600	R1	Common Cirdor	_		143094507
400692	K I	Common Girder		2	Job Reference (optional)

Wheeler Lumber,

Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:31 2020 Page 2 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-plOT?A3lDlig75mrsmdjSyOopK2MC1RMIJpWliyW8rM

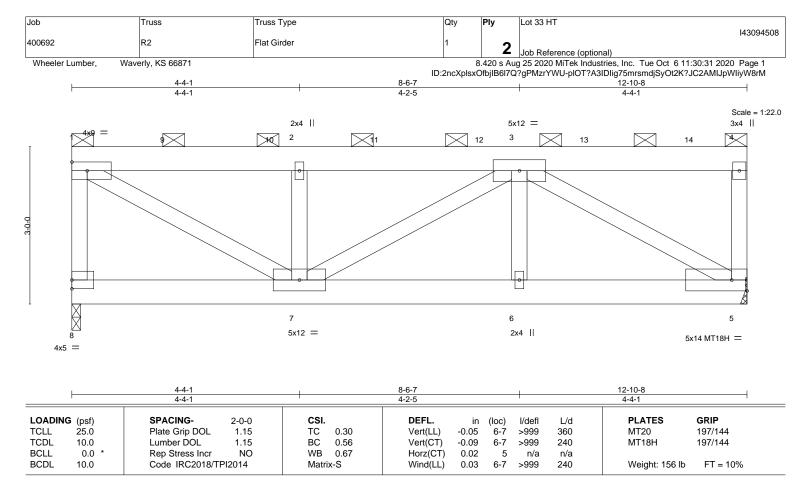
LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-6=-70, 6-11=-70, 2-11=-20

Concentrated Loads (lb)

Vert: 13=-3956(F) 12=-539(F) 20=-539(F) 21=-539(F) 22=-539(F)



WFBS

TOP CHORD 2x6 SP DSS 2x6 SPF No.2 **BOT CHORD** 2x4 SPF No.2 **BRACING-**

TOP CHORD 2-0-0 oc purlins (6-0-0 max.): 1-4, except end verticals. **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 8=0-2-0 (req. 0-2-15), 5=Mechanical

Max Horz 8=-77(LC 4)

Max Uplift 8=-378(LC 4), 5=-430(LC 5) Max Grav 8=3713(LC 2), 5=4198(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

1-8=-3608/390, 1-2=-4787/489, 2-3=-4787/489, 4-5=-1234/150 TOP CHORD

BOT CHORD 6-7=-514/4839, 5-6=-514/4839

WEBS 1-7=-561/5455, 2-7=-2772/342, 3-5=-5514/569

NOTES-

- 1) 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
 - Top chords connected as follows: 2x4 1 row at 0-9-0 oc, 2x6 2 rows staggered at 0-9-0 oc.

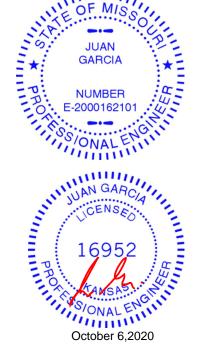
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc.

Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.

- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 3) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 4) Provide adequate drainage to prevent water ponding.
- 5) All plates are MT20 plates unless otherwise indicated.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) WARNING: Required bearing size at joint(s) 8 greater than input bearing size.
- 9) Refer to girder(s) for truss to truss connections.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb)
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 12) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 13) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1155 lb down and 142 lb up at 1-10-8, 1155 lb down and 142 lb up at 3-10-8, 1155 lb down and 142 lb up at 5-10-8, 1155 lb down and 142 lb up at 7-10-8, and 1155 lb down and 142 lb up at 9-10-8, and 1159 lb down and 142 lb up at 11-10-8 on top chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

Continued on page 2



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use Only with New Controlled S. This costign is based only upon parameters shown, and is for an individual druining Component, not a fundamental property incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job	Truss	Truss Type	Qty	Ply	Lot 33 HT
400000	D2	Flot Cirdor	,		143094508
400692	R2	Flat Girder	'	2	Job Reference (optional)

Wheeler Lumber,

Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:31 2020 Page 2 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-plOT?A3lDlig75mrsmdjSyOt2K?JC2AMIJpWliyW8rM

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-4=-70, 5-8=-20 Concentrated Loads (lb)

Vert: 9=-1061 10=-1061 11=-1061 12=-1061 13=-1061 14=-1066



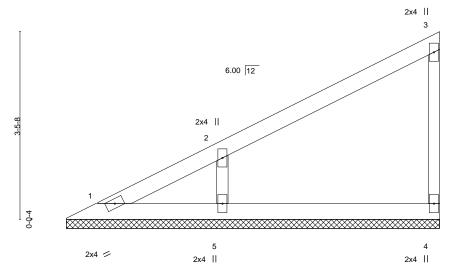
Job Lot 33 HT Truss Type Qty Truss Ply 143094509 400692 Valley Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:32 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-lxyrCV4w_cqXlFK1QU8y?9x4WkSixe4VWzZ3r9yW8rL

6-11-0 6-11-0

Scale = 1:21.2



LOADING	(psf)	SPACING- 2	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.19	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.10	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.05	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI20	014	Matri	x-P						Weight: 19 lb	FT = 10%

LUMBER-

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2

WFBS 2x3 SPF No.2 OTHERS 2x3 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

except end verticals.

Rigid ceiling directly applied or 10-0-0 oc bracing. **BOT CHORD**

REACTIONS. (size) 1=6-10-8, 4=6-10-8, 5=6-10-8

Max Horz 1=129(LC 5)

Max Uplift 4=-27(LC 8), 5=-110(LC 8)

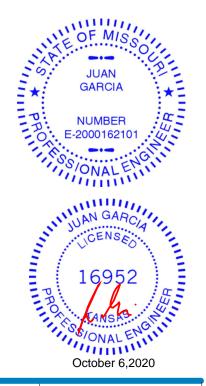
Max Grav 1=66(LC 16), 4=142(LC 1), 5=368(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

WEBS 2-5=-286/159

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4 except (jt=lb) 5=110.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.



Job Lot 33 HT Truss Truss Type Qty 143094510 V2 400692 Valley Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:33 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-m7WDPr5YkwyONPvDzBfBYNTEf8ocg57fldldNbyW8rK

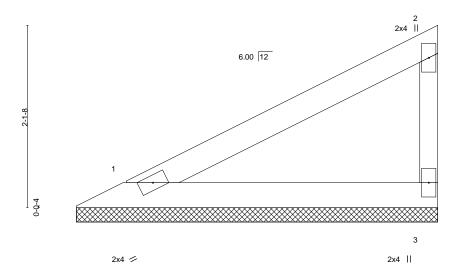
Structural wood sheathing directly applied or 4-3-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

4-3-0

Scale = 1:13.4



LOADING (psf) TCLL 25.0 TCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15	CSI. TC 0.23 BC 0.12	DEFL. in (loc) l/defl L/d Vert(LL) n/a - n/a 999 Vert(CT) n/a - n/a 999	PLATES GRIP MT20 197/144
BCLL 0.0 * BCDL 10.0	Rep Stress Incr YES Code IRC2018/TPI2014	WB 0.00 Matrix-P	Horz(CT) -0.00 3 n/a n/a	Weight: 11 lb FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

WFBS

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

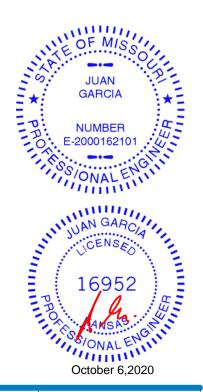
2x3 SPF No.2

REACTIONS. (size) 1=4-2-8, 3=4-2-8 Max Horz 1=73(LC 5)

Max Uplift 1=-20(LC 8), 3=-39(LC 8) Max Grav 1=158(LC 1), 3=158(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Lot 33 HT Truss Truss Type Qty Ply 143094511 V3 400692 Valley Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:33 2020 Page 1 ID:2ncXplsxOfbjlB6l7Q?gPMzrYWU-m7WDPr5YkwyONPvDzBfBYNTGw8pqg57fldldNbyW8rK

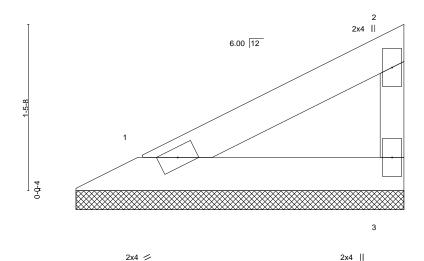
Structural wood sheathing directly applied or 2-11-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

2-11-0 2-11-0

Scale = 1:10.1



LOADING (psf) SPACING-**PLATES** GRIP 2-0-0 CSI. DEFL. I/d in (loc) I/defl Plate Grip DOL TC 197/144 **TCLL** 25.0 1.15 0.08 Vert(LL) n/a n/a 999 MT20 BC TCDL 10.0 Lumber DOL 1.15 0.04 Vert(CT) n/a n/a 999 BCLL 0.0 Rep Stress Incr YES WB 0.00 Horz(CT) -0.00 3 BCDL 10.0 Code IRC2018/TPI2014 Matrix-P Weight: 7 lb FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD**

WFBS 2x3 SPF No.2

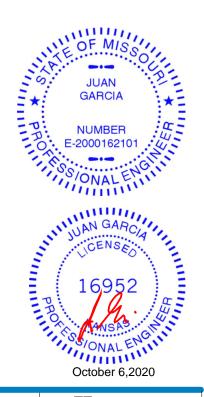
> (size) 1=2-10-8, 3=2-10-8 Max Horz 1=46(LC 5)

Max Uplift 1=-13(LC 8), 3=-24(LC 8)

Max Grav 1=98(LC 1), 3=98(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Lot 33 HT Truss Truss Type Qty Ply 143094512 V4 400692 Valley Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

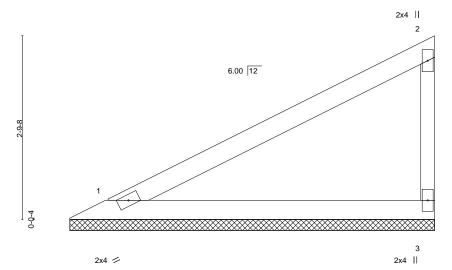
8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:34 2020 Page 1 ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-EK4bdB6BVD4F_ZUQXvAQ4a0LsY6wPYNo_H2Av1yW8rJ

Structural wood sheathing directly applied or 5-7-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

Scale = 1:17.5



LOADING (psf) TCLL 25.0	SPACING- 2-0-0 Plate Grip DOL 1.15	CSI. TC 0.45	DEFL. in (loc) I/defl L/d Vert(LL) n/a - n/a 999	PLATES GRIP MT20 197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.24	Vert(CT) n/a - n/a 999	
BCLL 0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT) -0.00 3 n/a n/a	
BCDL 10.0	Code IRC2018/TPI2014	Matrix-P		Weight: 14 lb FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 BOT CHORD 2x4 SPF No.2

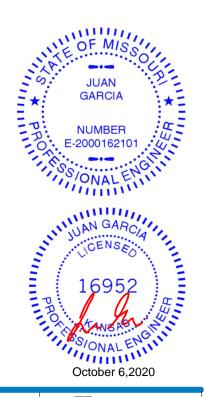
WFBS 2x3 SPF No.2

REACTIONS. (size) 1=5-6-8, 3=5-6-8 Max Horz 1=101(LC 5)

Max Uplift 1=-28(LC 8), 3=-53(LC 8) Max Grav 1=218(LC 1), 3=218(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.



Job Lot 33 HT Truss Type Truss Qty Ply 143094513 V5 400692 Valley Job Reference (optional)

Wheeler Lumber, Waverly, KS 66871

8.420 s Aug 25 2020 MiTek Industries, Inc. Tue Oct 6 11:30:34 2020 Page 1 ID:2ncXplsxOfbjlB6I7Q?gPMzrYWU-EK4bdB6BVD4F_ZUQXvAQ4a0PKY8uPYPo_H2Av1yW8rJ

Structural wood sheathing directly applied or 6-0-0 oc purlins,

Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.

Scale = 1:24.9

8-3-0

2x4 | 3 6.00 12 2x4 || 2 0-0-4 5 4 2x4 || 2x4 / 2x4 ||

LOADING (psf) TCLL 25.0	SPACING- 2-0-0 Plate Grip DOL 1.15	CSI. TC 0.23	DEFL. i	n (loc)	l/defl n/a	L/d 999	PLATES MT20	GRIP 197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.12	Vert(CT) n/		n/a	999	IVITZU	197/144
BCLL 0.0 *	Rep Stress Incr YES	WB 0.06	Horz(CT) -0.0) 4	n/a	n/a		
BCDL 10.0	Code IRC2018/TPI2014	Matrix-P					Weight: 23 lb	FT = 10%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

TOP CHORD 2x4 SPF No.2 **BOT CHORD** 2x4 SPF No.2

WFBS 2x3 SPF No.2 OTHERS 2x3 SPF No.2

(size) 1=8-2-8, 4=8-2-8, 5=8-2-8

Max Horz 1=157(LC 5)

Max Uplift 4=-26(LC 5), 5=-127(LC 8)

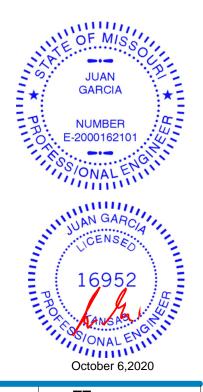
Max Grav 1=125(LC 16), 4=135(LC 1), 5=423(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

WEBS 2-5=-329/183

NOTES-

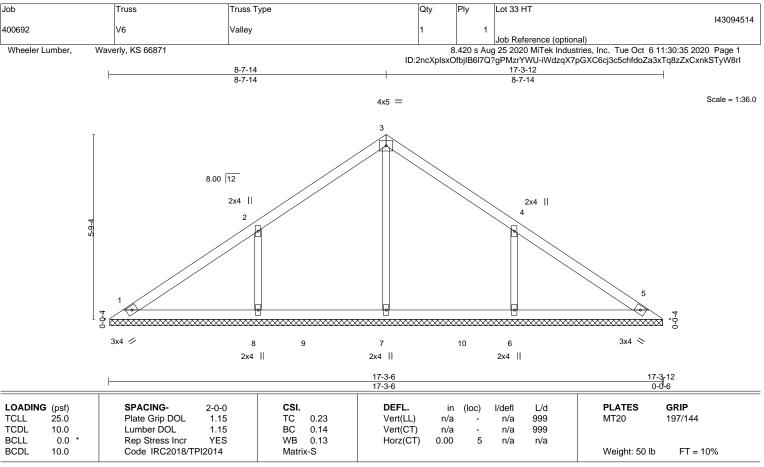
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4 except (jt=lb) 5=127.
- 6) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.





OTHERS

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD** 2x3 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins. **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 17-3-0. (lb) -Max Horz 1=142(LC 7)

Max Uplift All uplift 100 lb or less at joint(s) 1 except 8=-176(LC 8), 6=-175(LC 9)

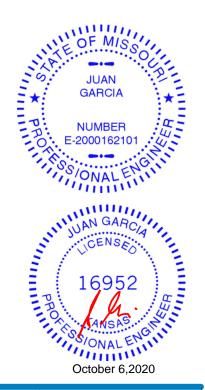
All reactions 250 lb or less at joint(s) 1, 5 except 7=350(LC 15), 8=535(LC 15), 6=535(LC 16)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-8=-355/222, 4-6=-355/222 WFBS

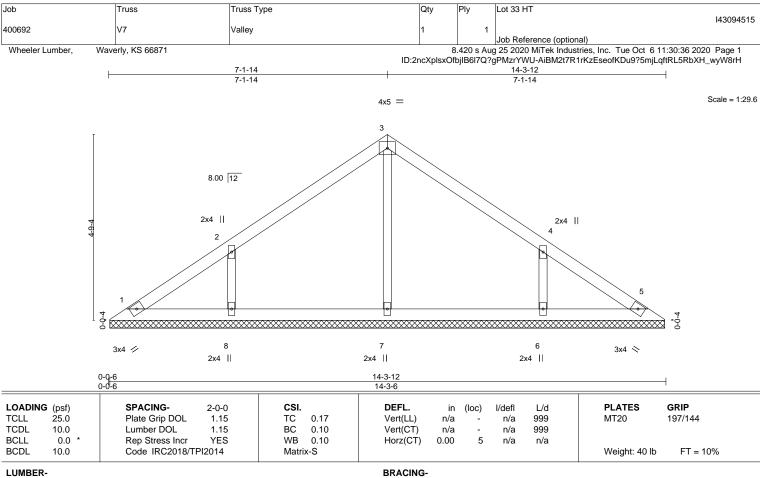
NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1 except (jt=lb) 8=176, 6=175.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE





TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x4 SPF No.2 2x4 SPF No.2

BOT CHORD OTHERS 2x3 SPF No.2

REACTIONS. All bearings 14-3-0. (lb) -

Max Horz 1=-116(LC 4)

Max Uplift All uplift 100 lb or less at joint(s) 1 except 8=-146(LC 8), 6=-146(LC 9)

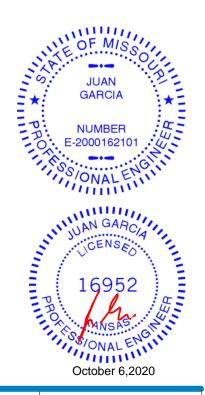
Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=280(LC 1), 8=370(LC 15), 6=370(LC 16)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

2-8=-294/187, 4-6=-294/187 WFBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1 except (jt=lb) 8=146, 6=146.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 6-0-0 oc purlins.

Rigid ceiling directly applied or 10-0-0 oc bracing.

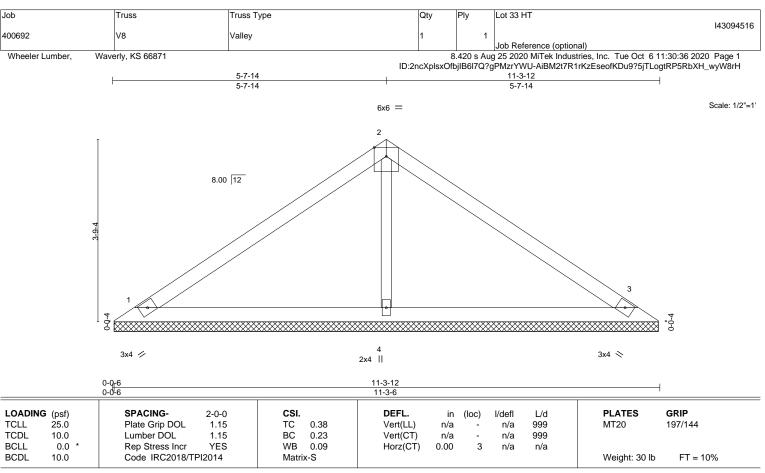


MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not Design Valid to Use Only with New Controlled S. This costign is based only upon parameters shown, and is for an individual druining Component, not a fundamental property incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see

ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601





TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD** OTHERS 2x3 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins. **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 1=11-3-0, 3=11-3-0, 4=11-3-0

Max Horz 1=-90(LC 4)

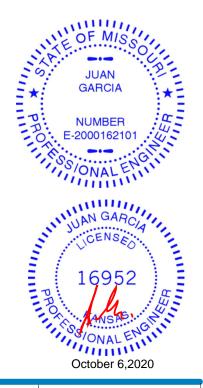
Max Uplift 1=-45(LC 8), 3=-57(LC 9), 4=-18(LC 8) Max Grav 1=239(LC 1), 3=239(LC 1), 4=453(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

WEBS

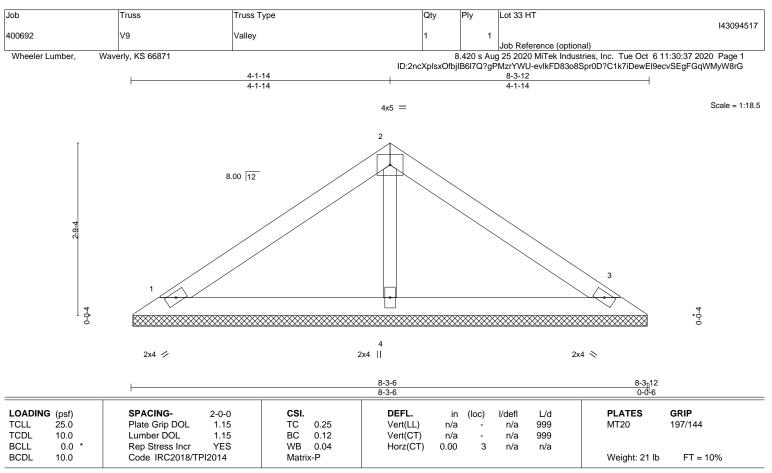
NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3, 4.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE





TOP CHORD 2x4 SPF No.2 2x4 SPF No.2 **BOT CHORD** OTHERS 2x3 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins. **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=8-3-0, 3=8-3-0, 4=8-3-0

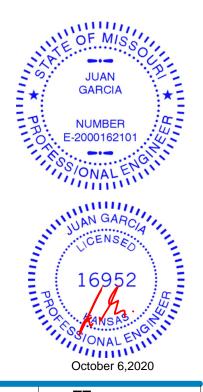
Max Horz 1=-64(LC 4)

Max Uplift 1=-41(LC 8), 3=-49(LC 9)

Max Grav 1=186(LC 1), 3=186(LC 1), 4=289(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

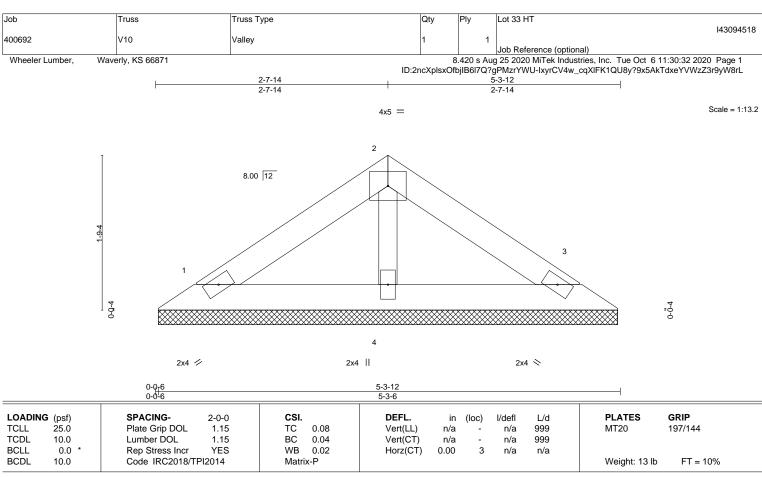
- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate arip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE





TOP CHORD 2x4 SPF No.2

2x4 SPF No.2 **BOT CHORD** OTHERS 2x3 SPF No.2 **BRACING-**

TOP CHORD Structural wood sheathing directly applied or 5-3-12 oc purlins. **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=5-3-0, 3=5-3-0, 4=5-3-0

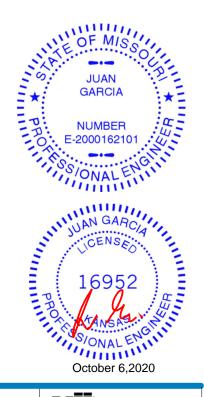
Max Horz 1=-38(LC 4)

Max Uplift 1=-24(LC 8), 3=-29(LC 9)

Max Grav 1=110(LC 1), 3=110(LC 1), 4=171(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate arip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



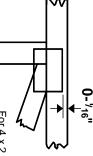


Symbols

PLATE LOCATION AND ORIENTATION



Center plate on joint unless x, y offsets are indicated.
Dimensions are in ft-in-sixteenths.
Apply plates to both sides of truss and fully embed teeth.



For 4 x 2 orientation, locate plates 0- ¹/16" from outside edge of truss.

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This symbol indicates the required direction of slots in connector plates.

* Plate location details available in MiTek 20/20 software or upon request.

PLATE SIZE



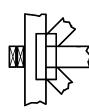
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION



Indicated by symbol shown and/or by text in the bracing section of the output. Use T or I bracing if indicated.

BEARING



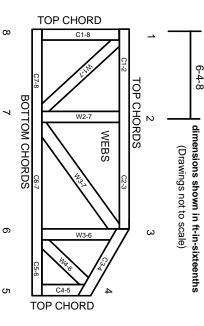
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only

Industry Standards:

National Design Specification for Metal Plate Connected Wood Truss Construction. Design Standard for Bracing.
Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

ANSI/TPI1: DSB-89:

Numbering System



JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.

CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.

PRODUCT CODE APPROVALS

ICC-ES Reports:

ESR-1311, ESR-1352, ESR1988 ER-3907, ESR-2362, ESR-1397, ESR-3282

Trusses are designed for wind loads in the plane of the truss unless otherwise shown.

Lumber design values are in accordance with ANSI/TPI 1 section 6.3 These truss designs rely on lumber values established by others.

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MiTek Engineering Reference Sheet: MII-7473 rev. 5/19/2020

General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

- Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI
- Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.

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Never exceed the design loading shown and never stack materials on inadequately braced trusses.

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Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.

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- Cut members to bear tightly against each other.
- Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1.

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- Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
- Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.

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Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.

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- Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
- Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
- Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
- Top chords must be sheathed or purlins provided at spacing indicated on design.
- Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
- Connections not shown are the responsibility of others
- Do not cut or alter truss member or plate without prior approval of an engineer.
- 17. Install and load vertically unless indicated otherwise.
- Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
- Review all portions of this design (front, back, words and pictures) before use. Reviewing pictures alone is not sufficient.
- 20. Design assumes manufacture in accordance with ANSI/TPI 1 Quality Criteria.
- 21. The design does not take into account any dynamic or other loads other than those expressly stated.