RELEASE FOR CONSTRUCTION
AS NOTED ON PLANS REVIEW
DEVELOPMENT SERVICES
LEE'S SUMMIT, MISSOURI
06/28/2021

RE: 210459
Lot 141 HT

MiTek USA, Inc.
16023 Swingley Ridge Rd
Chesterfield, MO 63017
314-434-1200

Site Information:

Customer: Project Name: 210459
Lot/Block: Model:
Address: Subdivision:
City: State:

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: ASCE716LowRise Wind Speed: 115 mph
Roof Load: 45.0 psf Floor Load: N/A psf

This package includes 59 individual, dated Truss Design Drawings and 0 Additional Drawings.

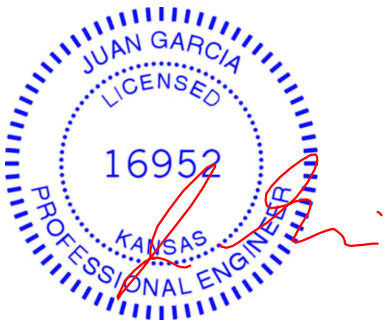
No.	Seal#	Truss Name	Date	No.	Seal#	Truss Name	Date
1	I46485483	A5	6/9/2021	21	I46485503	E3	6/9/2021
2	I46485484	A6	6/9/2021	22	I46485504	E4	6/9/2021
3	I46485485	A7	6/9/2021	23	I46485505	E5	6/9/2021
4	I46485486	A8	6/9/2021	24	I46485506	E6	6/9/2021
5	I46485487	B1	6/9/2021	25	I46485507	E7	6/9/2021
6	I46485488	B2	6/9/2021	26	I46485508	E8	6/9/2021
7	I46485489	C1	6/9/2021	27	I46485509	E9	6/9/2021
8	I46485490	C2	6/9/2021	28	I46485510	E10	6/9/2021
9	I46485491	C3	6/9/2021	29	I46485511	E11	6/9/2021
10	I46485492	C4	6/9/2021	30	I46485512	G1	6/9/2021
11	I46485493	C5	6/9/2021	31	I46485513	G2	6/9/2021
12	I46485494	C6	6/9/2021	32	I46485514	H1	6/9/2021
13	I46485495	C7	6/9/2021	33	I46485515	H2	6/9/2021
14	I46485496	C8	6/9/2021	34	I46485516	H3	6/9/2021
15	I46485497	C9	6/9/2021	35	I46485517	J4	6/9/2021
16	I46485498	C10	6/9/2021	36	I46485518	J5	6/9/2021
17	I46485499	D1	6/9/2021	37	I46485519	J6	6/9/2021
18	I46485500	D2	6/9/2021	38	I46485520	J7	6/9/2021
19	I46485501	E1	6/9/2021	39	I46485521	J8	6/9/2021
20	I46485502	E2	6/9/2021	40	I46485522	J9	6/9/2021

The truss drawing(s) referenced above have been prepared by MiTek USA, Inc under my direct supervision 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.

Kansas COA: E-943



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.

June 09, 2021

Garcia, Juan

MiTek USA, Inc.
16023 Swingley Ridge Rd
Chesterfield, MO 63017
314-434-1200

RE: 210459 - Lot 141 HT

Site Information:

Project Customer: Project Name: 210459
Lot/Block: Subdivision:
Address:
City, County: State:

No.	Seal#	Truss Name	Date
41	I46485523	J10	6/9/2021
42	I46485524	J11	6/9/2021
43	I46485525	J12	6/9/2021
44	I46485526	J13	6/9/2021
45	I46485527	J16	6/9/2021
46	I46485528	J17	6/9/2021
47	I46485529	J18	6/9/2021
48	I46485530	J19	6/9/2021
49	I46485531	K1	6/9/2021
50	I46485532	K2	6/9/2021
51	I46485533	L1	6/9/2021
52	I46485534	L2	6/9/2021
53	I46485535	L3	6/9/2021
54	I46485536	LAY2	6/9/2021
55	I46485537	LAY3	6/9/2021
56	I46485538	V1	6/9/2021
57	I46485539	V2	6/9/2021
58	I46485540	V3	6/9/2021
59	I46485541	V4	6/9/2021

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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: ASCE716LowRise Wind Speed: 115 mph
Roof Load: 45.0 psf Floor Load: N/A psf

This package includes 59 individual, dated Truss Design Drawings and 0 Additional Drawings.

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1	I46485483	A5	6/9/2021	21	I46485503	E3	6/9/2021
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12	I46485494	C6	6/9/2021	32	I46485514	H1	6/9/2021
13	I46485495	C7	6/9/2021	33	I46485515	H2	6/9/2021
14	I46485496	C8	6/9/2021	34	I46485516	H3	6/9/2021
15	I46485497	C9	6/9/2021	35	I46485517	J4	6/9/2021
16	I46485498	C10	6/9/2021	36	I46485518	J5	6/9/2021
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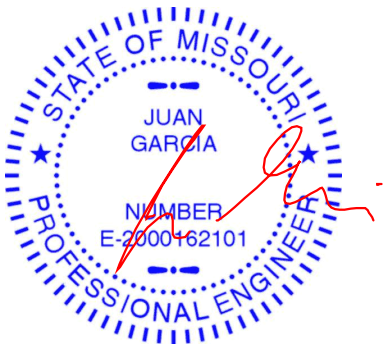
20	I46485502	E2	6/9/2021	40	I46485522	J9	6/9/2021

The truss drawing(s) referenced above have been prepared by MiTek USA, Inc under my direct supervision 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, 2022.

Missouri COA: 001193



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.

June 09, 2021

Garcia, Juan

MiTek USA, Inc.
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City, County: State:

No.	Seal#	Truss Name	Date
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42	I46485524	J11	6/9/2021
43	I46485525	J12	6/9/2021
44	I46485526	J13	6/9/2021
45	I46485527	J16	6/9/2021
46	I46485528	J17	6/9/2021
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50	I46485532	K2	6/9/2021
51	I46485533	L1	6/9/2021
52	I46485534	L2	6/9/2021
53	I46485535	L3	6/9/2021
54	I46485536	LAY2	6/9/2021
55	I46485537	LAY3	6/9/2021
56	I46485538	V1	6/9/2021
57	I46485539	V2	6/9/2021
58	I46485540	V3	6/9/2021
59	I46485541	V4	6/9/2021

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	A5	Hip Girder	1	1	I46485483
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:21 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-fhCHsN8TR?ZObkjhDx_OKKIvuYo4fzL6p3BQXzz8Hku

-0-10-8	2-0-0	5-0-0	9-0-0	12-0-0	14-0-0	14-10-8
0-10-8	2-0-0	3-0-0	4-0-0	3-0-0	2-0-0	0-10-8

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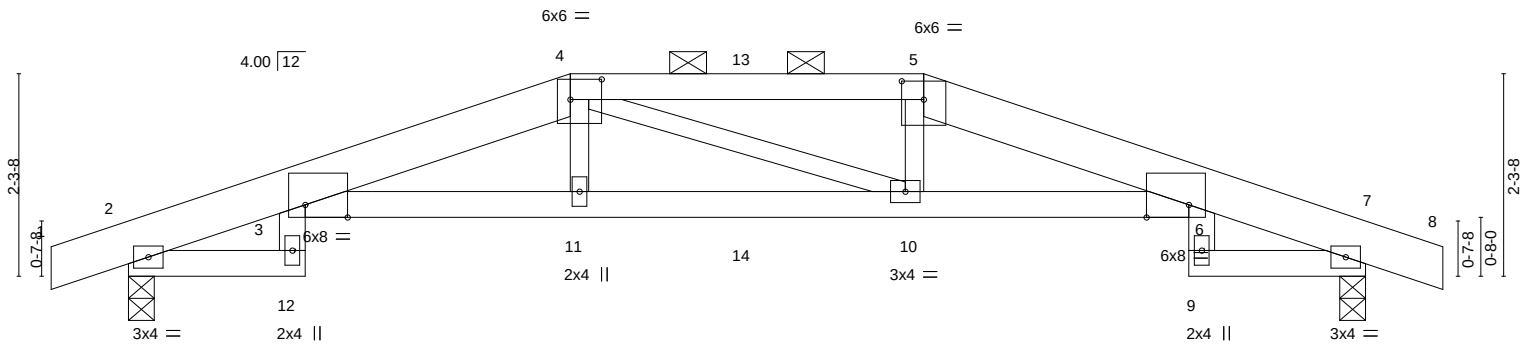

2-0-0	5-0-0	9-0-0	12-0-0	14-0-0
2-0-0	3-0-0	4-0-0	3-0-0	2-0-0

Plate Offsets (X,Y)-- [3:0-5-12,Edge], [4:0-4-4,0-2-12], [5:0-3-0,0-2-8], [6:0-5-12,Edge]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.73	Vert(LL)	-0.21	10-11	>791	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.64	Vert(CT)	-0.37	10-11	>441	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.12	Horz(CT)	0.29	7	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.16	10-11	>999	240	Weight: 56 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SP DSS *Except*
4-5: 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
3-6: 2x4 SPF 2100F 1.8E
WEBS 2x3 SPF No.2 *Except*
3-12,6-9: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-5-8 oc purlins, except 2-0-0 oc purlins (2-9-8 max.): 4-5.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 2=0-3-8, 7=0-3-8
Max Horz 2=35(LC 8)
Max Uplift 2=-238(LC 4), 7=-238(LC 5)
Max Grav 2=1141(LC 1), 7=1141(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-493/113, 3-4=-3349/600, 4-5=-3293/591, 5-6=-3336/584, 6-7=-493/108
BOT CHORD 3-11=-558/3284, 10-11=-554/3305, 6-10=-523/3272
WEBS 4-11=0/309, 5-10=0/335

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) 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) 2=238, 7=238.
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) 95 lb down and 67 lb up at 5-0-0, and 95 lb down and 67 lb up at 7-0-0, and 95 lb down and 67 lb up at 9-0-0 on top chord, and 277 lb down and 82 lb up at 5-0-0, and 277 lb down and 82 lb up at 9-0-0 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

June 9,2021

Continued on page 2

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
   Uniform Loads (plf)
   Vert: 1-4=-70, 4-5=-70, 5-8=-70, 2-12=-20, 3-6=-20, 7-9=-20
   Concentrated Loads (lb)
   Vert: 4=-69(F) 5=-69(F) 11=-325(F=-277) 10=-325(F=-277) 13=-69(F) 14=-48

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	A6	Roof Special	2	1	I46485484
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:22 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-7umg3j95CIhFDuItneVdsXr68y9?OQ6F2jx_4Pz8Hkt

-0-10-8 | 2-0-0 | 7-0-0 | 12-0-0 | 14-0-0 | 14-10-8
0-10-8 | 2-0-0 | 5-0-0 | 5-0-0 | 2-0-0 | 0-10-8

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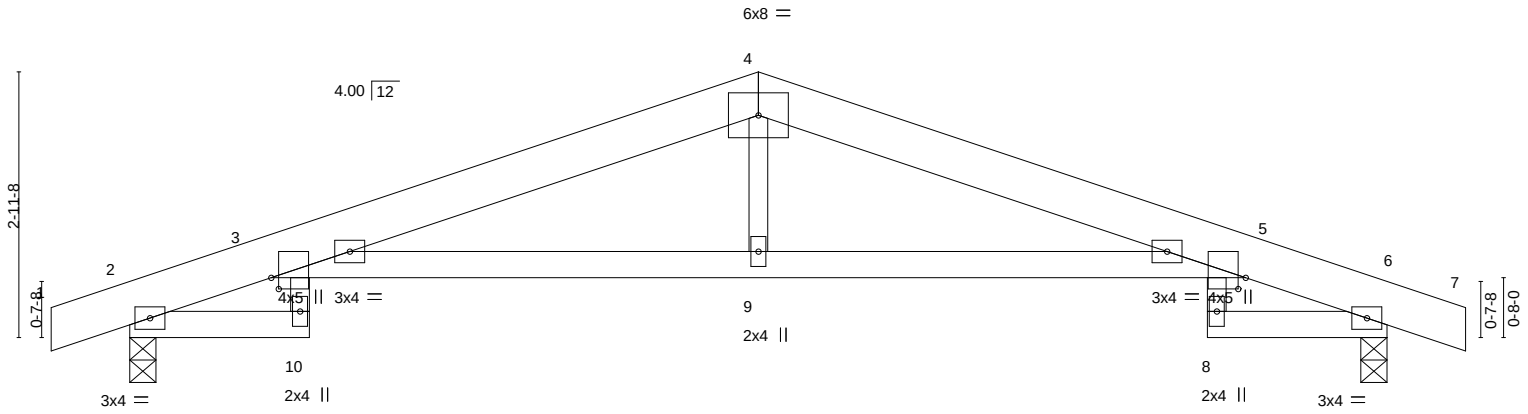


2-0-0 | 7-0-0 | 12-0-0 | 14-0-0
2-0-0 | 5-0-0 | 5-0-0 | 2-0-0

Plate Offsets (X,Y)-- [3:0-1-8,0-1-0], [5:0-1-8,0-1-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.64	Vert(LL)	-0.13	3-9	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.60	Vert(CT)	-0.24	3-9	>673	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.08	Horz(CT)	0.20	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.09	3-9	>999	240	Weight: 49 lb	FT = 10%

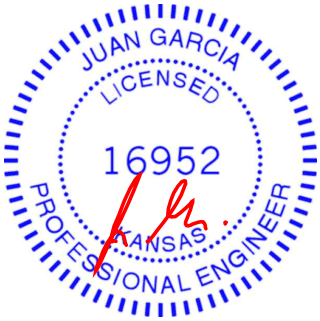
LUMBER-
TOP CHORD 2x6 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-5-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 2=0-3-8, 6=0-3-8
Max Horz 2=-46(LC 13)
Max Uplift 2=-130(LC 4), 6=-130(LC 5)
Max Grav 2=696(LC 1), 6=696(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-282/71, 3-4=-1368/140, 4-5=-1368/155, 5-6=-282/62
BOT CHORD 3-9=-94/1298, 5-9=-94/1298
WEBS 4-9=0/262

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 3 = 0%, joint 5 = 0%, joint 3 = 0%, joint 5 = 0%
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) 2=130, 6=130.
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.



June 9,2021

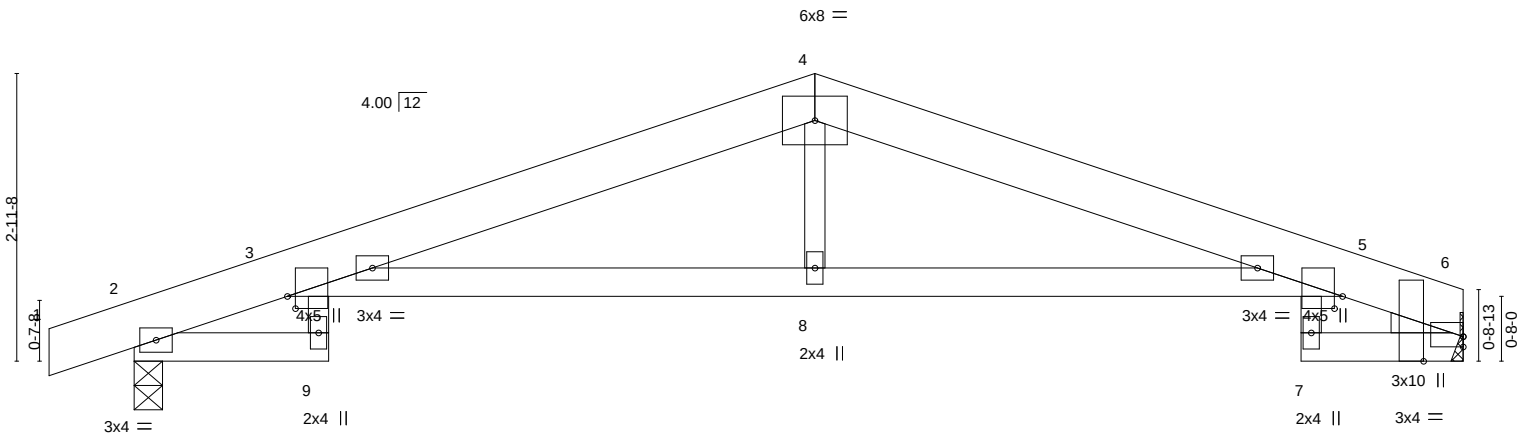
MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	A7	Roof Special	1	1	I46485485
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:23 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-b4J2H39jzcp6r2t4KM0sPlNH1MWq7tLPHNgXcrz8Hks

-0-10-8 2-0-0 7-0-0 12-0-0 13-8-0
0-10-8 2-0-0 5-0-0 5-0-0 1-8-0

Scale = 1:23.7



2-0-0 7-0-0 12-0-0 13-8-0
2-0-0 5-0-0 5-0-0 1-8-0

Plate Offsets (X,Y)-- [3:0-1-8,0-1-0], [5:0-1-8,0-1-0], [6:0-0-0,0-1-4], [6:0-3-1,Edge]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.63	Vert(LL)	-0.12	3-8	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.23	3-8	>704	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.08	Horz(CT)	0.18	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.09	3-8	>999	240	Weight: 47 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2
WEDGE
Right: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-6-12 oc purlins.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 2=0-3-8, 6=Mechanical
Max Horz 2=47(LC 8)
Max Uplift 2=-129(LC 4), 6=-82(LC 5)
Max Grav 2=688(LC 1), 6=611(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-278/69, 3-4=-1326/142, 4-5=-1329/153, 5-6=-322/62
BOT CHORD 3-8=-94/1258, 5-8=-94/1258
WEBS 4-8=0/260

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 3 = 0%, joint 3 = 0%
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) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6 except (jt=lb) 2=129.
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.

STATE OF MISSOURI
JUAN GARCIA
NUMBER E-2000162101
PROFESSIONAL ENGINEER

JUAN GARCIA
LICENSED
16952
KANSAS
PROFESSIONAL ENGINEER

June 9,2021

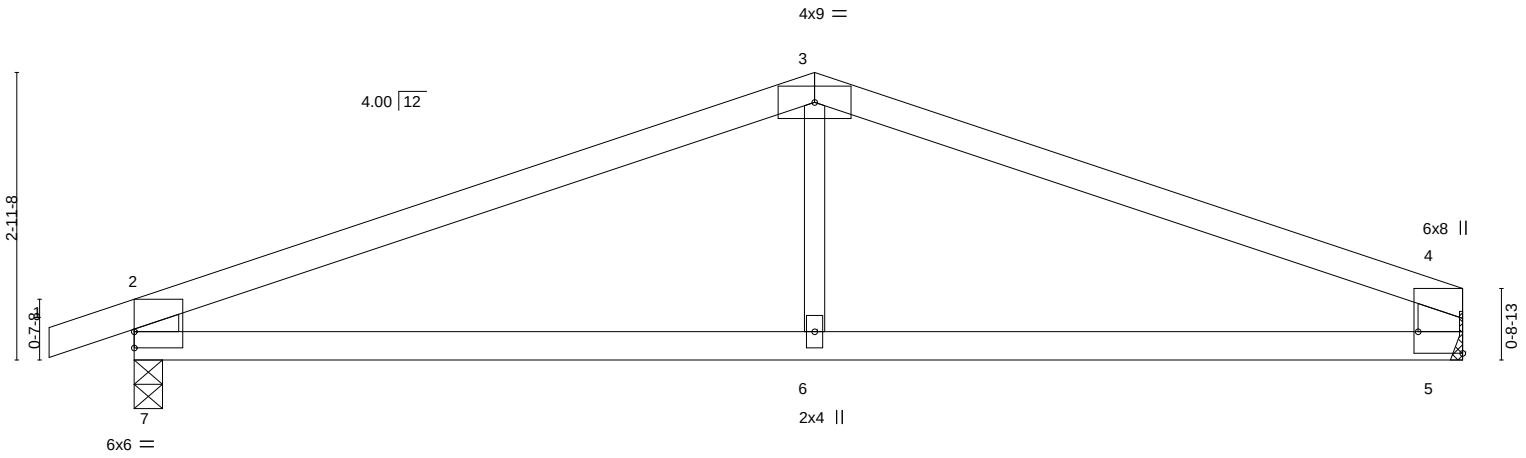
MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	A8	Common	2	1	I46485486
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:23 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-b4J2H39jzcp6r2t4KM0sPlNI4MYi7tKPHNgXcrz8Hks

-0-10-8 0-10-8 | 7-0-0 7-0-0 | 13-8-0 6-8-0

Scale = 1:23.7



7-0-0 7-0-0 | 13-8-0 6-8-0

Plate Offsets (X,Y)-- [4:Edge,0-5-8], [7:0-0-0,0-2-0]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.56	Vert(LL)	-0.06	6-7	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.44	Vert(CT)	-0.14	6-7	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.08	Horz(CT)	0.02	5	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.04	6-7	>999	240	Weight: 36 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x6 SPF No.2 *Except*
3-6: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-3-11 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 7=0-3-8, 5=Mechanical
Max Horz 7=39(LC 8)
Max Uplift 7=-136(LC 4), 5=-85(LC 5)
Max Grav 7=675(LC 1), 5=591(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-915/120, 3-4=-909/120, 2-7=-606/179, 4-5=-510/123
BOT CHORD 6-7=-62/788, 5-6=-62/788
WEBS 3-6=0/264

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) 5 except (jt=lb) 7=136.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	B1	Monopitch	5	1	I46485487
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:24 2021 Page 1
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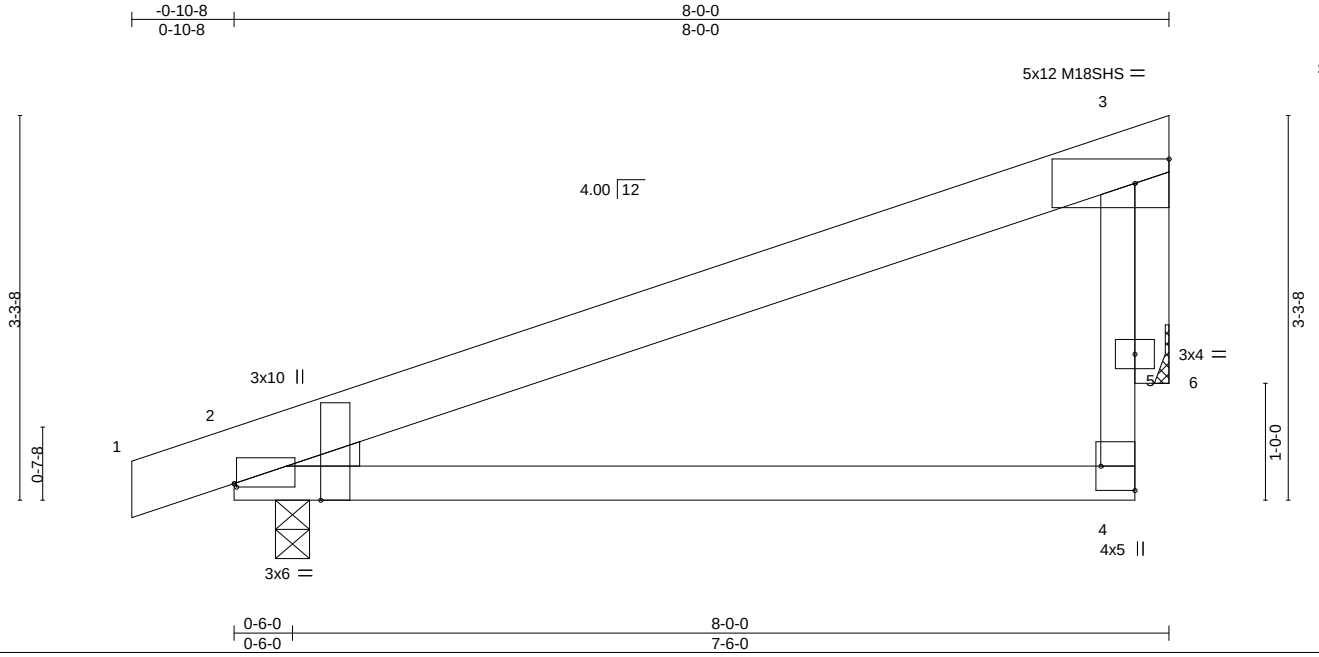

Plate Offsets (X,Y)-- [2:0-1-11,Edge], [2:0-0-4,0-0-6], [4:Edge,0-3-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.34	Vert(LL)	-0.06	2-4	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.33	Vert(CT)	-0.12	2-4	>789	240	M18SHS	197/144
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.36	Horz(CT)	-0.01	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.02	2-4	>999	240	Weight: 31 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2
WEDGE
Left: 2x3 SPF No.2

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.

REACTIONS. (size) 2=0-3-8, 6=Mechanical
Max Horz 2=97(LC 8)
Max Uplift 2=-92(LC 4), 6=-77(LC 8)
Max Grav 2=426(LC 1), 6=313(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-278/6, 3-5=-305/220

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) All plates are MT20 plates unless otherwise indicated.
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) 2, 6.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	B2	Monopitch	3	1	I46485488
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:24 2021 Page 1
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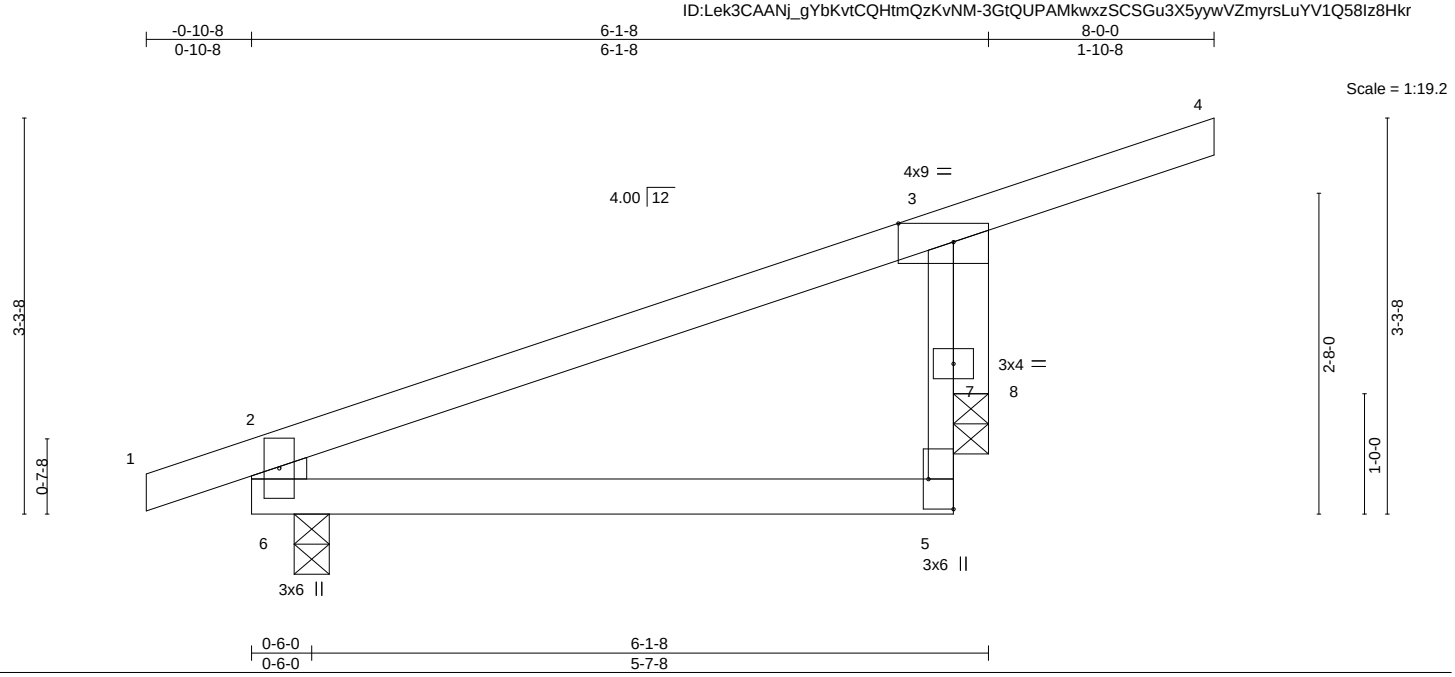

Plate Offsets (X,Y)-- [3:0-5-8,Edge], [5:Edge,0-2-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.39	Vert(LL)	-0.02	5-6	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.19	Vert(CT)	-0.05	5-6	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.06	Horz(CT)	-0.00	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.01	5-6	>999	240	Weight: 21 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-6: 2x6 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.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 6=0-3-8, 8=0-3-8
Max Horz 6=113(LC 5)
Max Uplift 6=-63(LC 4), 8=-130(LC 8)
Max Grav 6=318(LC 1), 8=413(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-6=-278/108

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) Bearing at joint(s) 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6 except (jt=lb) 8=130.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C1	Roof Special Supported Gable	1	1	I46485489
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:25 2021 Page 1
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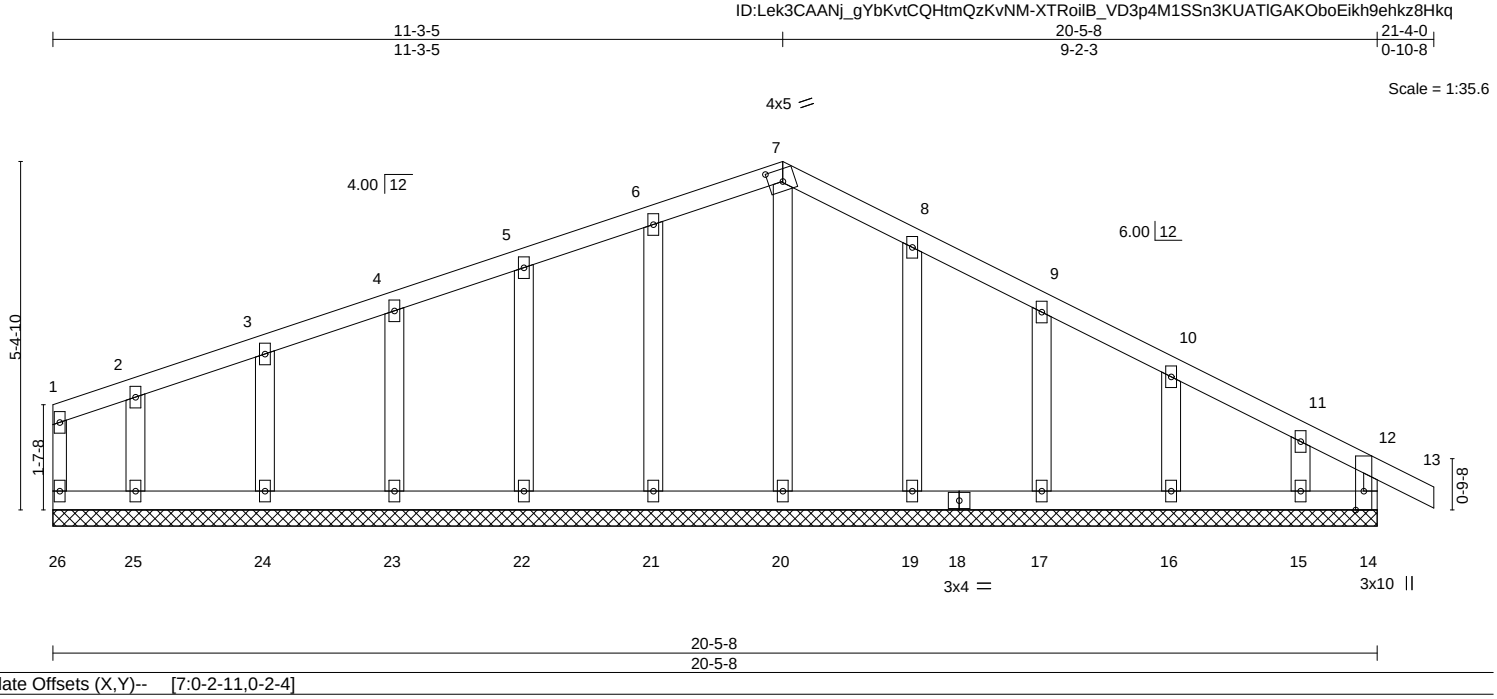


Plate Offsets (X,Y)-- [7:0-2-11,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	13	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	-0.00	13	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.06	Horz(CT)	0.00	14	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 83 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 20-5-8.
(lb) - Max Horz 26=84(LC 7)
Max Uplift All uplift 100 lb or less at joint(s) 26, 14, 21, 22, 23, 24, 25, 19, 17, 16, 15
Max Grav All reactions 250 lb or less at joint(s) 26, 14, 20, 21, 22, 23, 24, 25, 19, 17, 16, 15

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) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) 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) 26, 14, 21, 22, 23, 24, 25, 19, 17, 16, 15.
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.

June 9,2021

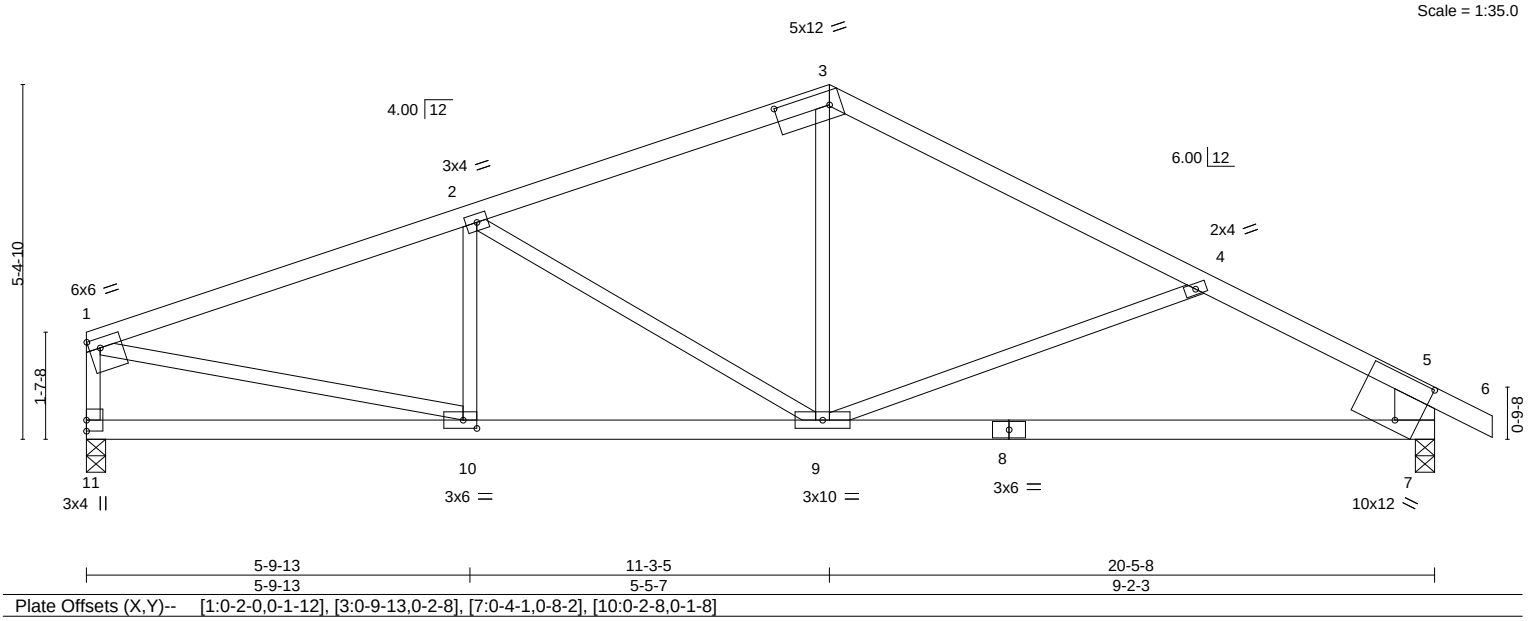
MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C2	Roof Special	1	1	I46485490
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:27 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-TrZZ6RDE0rJXJfBrZC5oZbYxazsN3cV?C?ellcz8Hko

5-9-13	11-3-5	16-9-15	20-5-8	21-4-0
5-9-13	5-5-7	5-6-11	3-7-9	0-10-8

Scale = 1:35.0



5-9-13	11-3-5	20-5-8
5-9-13	5-5-7	9-2-3

Plate Offsets (X,Y)-- [1:0-2-0,0-1-12], [3:0-9-13,0-2-8], [7:0-4-1,0-8-2], [10:0-2-8,0-1-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.72	Vert(LL)	-0.17	7-9	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.58	Vert(CT)	-0.33	7-9	>721	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.39	Horz(CT)	0.03	7	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.05	9-10	>999	240	Weight: 73 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2 *Except*
3-6: 2x4 SPF 2100F 1.8E
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
5-7: 2x8 SP DSS

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-7-1 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 11=0-3-8, 7=0-3-8
Max Horz 11=86(LC 7)
Max Uplift 11=-130(LC 4), 7=-130(LC 9)
Max Grav 11=900(LC 1), 7=987(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1319/196, 2-3=-1034/150, 3-4=-1083/158, 4-5=-1296/210, 1-11=-841/160, 5-7=-889/178
BOT CHORD 9-10=-159/1198, 7-9=-128/1046
WEBS 2-9=-388/153, 3-9=-0/409, 1-10=-141/1142

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) 11=130, 7=130.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C3	Roof Special Girder	1	1	I46485491
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:29 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-QEhJX6EUYSZFZzKEhc7Gf0dGEnV3XOzHfJ7sqVz8Hkm

	2-9-0	9-6-12	16-4-8	21-0-0	27-7-13	33-5-7	36-10-0	37-8-8
0-10-8	2-9-0	6-9-12	6-9-12	4-7-8	6-7-13	5-9-10	3-4-9	0-10-8

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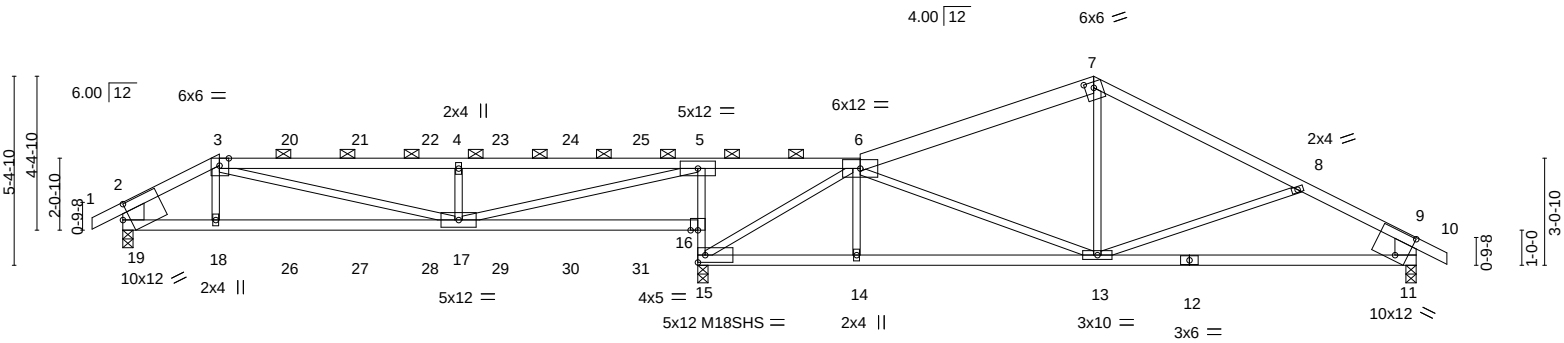

	2-9-0	9-6-12	16-4-8	16-6-4	21-0-0	27-7-13	33-5-7	36-10-0
	2-9-0	6-9-12	6-9-12	0-1-12	4-5-12	6-7-13	5-9-10	3-4-9

Plate Offsets (X,Y)-- [3:0-3-3,Edge], [7:0-3-0,0-1-15], [11:0-4-1,0-8-2], [19:0-2-7,0-4-14]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.78	Vert(LL)	-0.17	17-18	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.83	Vert(CT)	-0.33	17-18	>597	240	M18SHS	197/144
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.91	Horz(CT)	-0.03	15	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.14	17-18	>999	240	Weight: 133 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF 2100F 1.8E *Except*
	6-7: 2x6 SPF No.2
BOT CHORD	2x4 SPF No.2 *Except*
	16-19: 2x4 SPF 2100F 1.8E, 5-15: 2x3 SPF No.2
WEBS	2x3 SPF No.2 *Except*
	2-19,9-11: 2x8 SP DSS

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 4-9-13 oc purlins, except end verticals, and 2-0-0 oc purlins (4-0-1 max.): 3-6.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 16-17 3-2-4 oc bracing: 15-16.

REACTIONS. (size) 19=0-3-8, 15=0-3-8, 11=0-3-8
Max Horz 19=-90(LC 9)
Max Uplift 19=-267(LC 8), 15=-363(LC 8), 11=-153(LC 30)
Max Grav 19=1130(LC 21), 15=2021(LC 1), 11=939(LC 1)

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

TOP CHORD	2-3=-1539/336, 3-4=-2338/540, 4-5=-2335/538, 5-6=-6/261, 6-7=-950/181, 7-8=-1014/170, 8-9=-1214/249, 2-19=-960/220, 9-11=-846/199
BOT CHORD	18-19=-280/1287, 17-18=-283/1276, 15-16=-1299/314, 5-16=-1187/356, 14-15=-189/903, 13-14=-192/898, 11-13=-163/976
WEBS	3-18=0/281, 3-17=-265/1096, 4-17=-707/334, 5-17=-552/2638, 6-15=-1340/172, 7-13=0/348

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) Provide adequate drainage to prevent water ponding.
4) All plates are MT20 plates 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.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 19=267, 15=363, 11=153.
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) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 100 lb down and 68 lb up at 4-8-2, 100 lb down and 68 lb up at 6-8-2, 100 lb down and 68 lb up at 8-8-2, 100 lb down and 68 lb up at 10-8-2, and 100 lb down and 68 lb up at 12-8-2, and 100 lb down and 68 lb up at 14-8-2 on top chord, and 217 lb down and 84 lb up at 2-9-0, 33 lb down at 4-8-2, 33 lb down at 6-8-2, 33 lb down at 8-8-2, 33 lb down at 10-8-2, and 33 lb down at 12-8-2, and 33 lb down at 14-8-2 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
11) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

Continued on page 2

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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, 3-6=-70, 6-7=-70, 7-9=-70, 9-10=-70, 16-19=-20, 11-15=-20
   Concentrated Loads (lb)
   Vert: 18=-217(B) 20=-50(B) 21=-50(B) 22=-50(B) 23=-50(B) 24=-50(B) 25=-50(B) 26=-24(B) 27=-24(B) 28=-24(B) 29=-24(B) 30=-24(B) 31=-24(B)

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C4	Roof Special	1	1	I46485492
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:30 2021 Page 1
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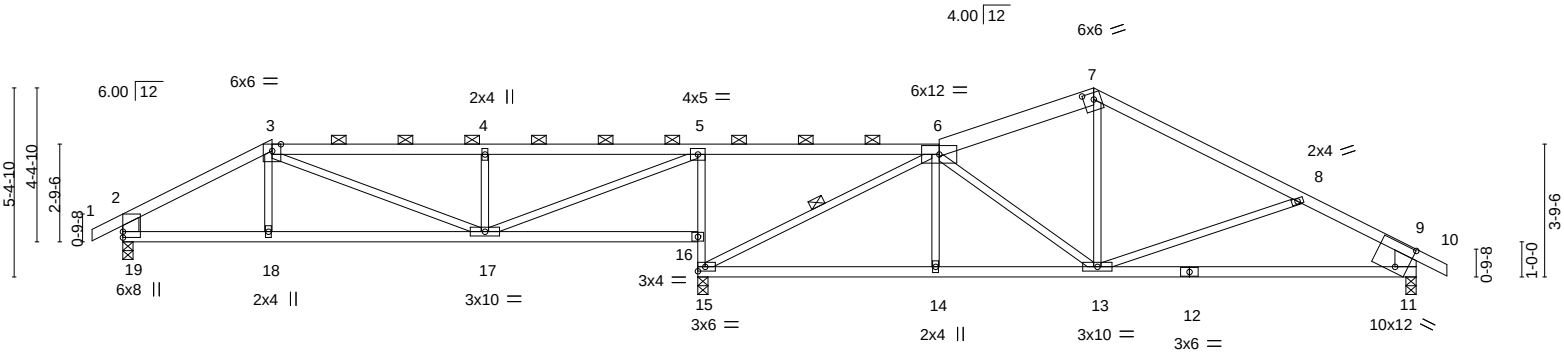
-0-10-8	4-3-0	10-3-12	16-4-8	23-3-0	27-7-13	33-5-7	36-10-0	37-8-8
0-10-8	4-3-0	6-0-12	6-0-12	6-10-8	4-4-13	5-9-10	3-4-9	0-10-8

Scale = 1:65.6



4-3-0	10-3-12	16-4-8	16-6-4	21-10-10	27-7-13	36-10-0
4-3-0	6-0-12	6-0-12	0-1-12	5-4-6	5-9-3	9-2-3

Plate Offsets (X,Y)-- [7:0-3-8,0-2-4], [11:0-4-1,0-8-2]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.67	Vert(LL)	-0.16	11-13	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.32	11-13	>758	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.71	Horz(CT)	-0.04	15	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.06	17-18	>999	240	Weight: 132 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF No.2 *Except*
	6-7: 2x6 SPF No.2, 7-10: 2x4 SPF 2100F 1.8E
BOT CHORD	2x4 SPF No.2 *Except*
	5-15: 2x3 SPF No.2
WEBS	2x3 SPF No.2 *Except*
	2-19: 2x6 SPF No.2, 9-11: 2x8 SP DSS

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 4-9-13 oc purlins, except end verticals, and 2-0-0 oc purlins (4-9-13 max.): 3-6.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 16-17 4-0-1 oc bracing: 15-16.
WEBS	1 Row at midpt 6-15

REACTIONS. (size) 19=0-3-8, 15=0-3-8, 11=0-3-8
Max Horz 19=-90(LC 9)
Max Uplift 19=-150(LC 8), 15=-285(LC 8), 11=-144(LC 9)
Max Grav 19=763(LC 21), 15=1725(LC 1), 11=944(LC 1)

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

TOP CHORD	2-3=-974/180, 3-4=-1039/223, 4-5=-1037/222, 6-7=-942/168, 7-8=-1016/139, 8-9=-1224/234, 2-19=-675/164, 9-11=-848/191
BOT CHORD	18-19=-125/792, 17-18=-128/791, 15-16=-1053/257, 5-16=-988/287, 14-15=-93/1034, 13-14=-95/1030, 11-13=-151/986
WEBS	3-17=-96/267, 4-17=-455/188, 5-17=-231/1305, 6-15=-1334/153, 6-13=-302/103, 7-13=0/387

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) 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) 19=150, 15=285, 11=144.
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.

June 9,2021

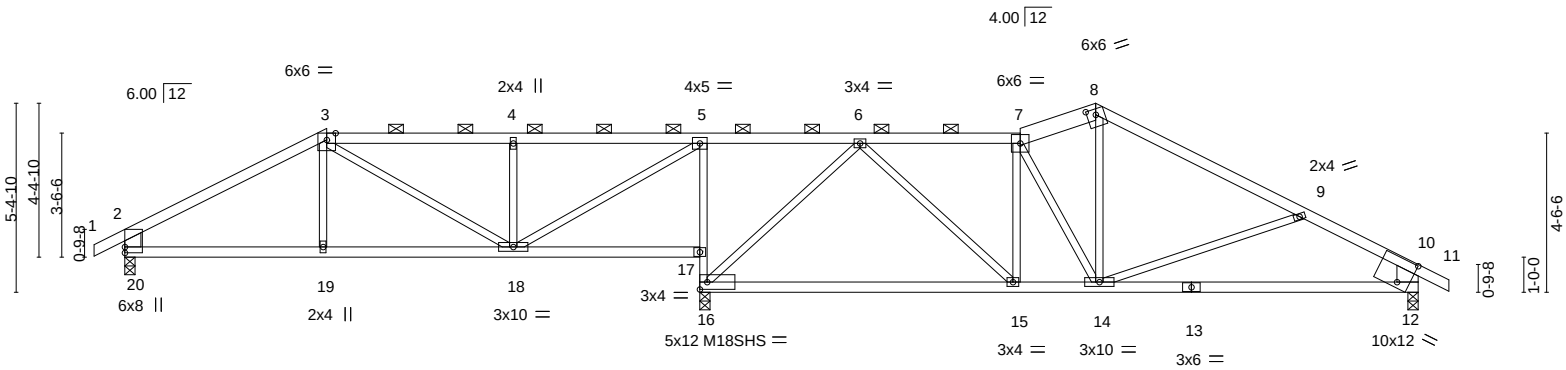
MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C5	Roof Special	1	1	I46485493
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:31 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-Mco3yoGl43pzoHUco19kkRieFaDR?Hva6dcyuOz8Hkk

-0-10-8 5-9-0 11-0-12 16-4-8 20-11-4 25-6-0 27-7-13 33-5-7 36-10-0 37-8-8
0-10-8 5-9-0 5-3-12 5-3-12 4-6-12 4-6-12 2-1-13 5-9-10 3-4-9 0-10-8

Scale = 1:65.6



5-9-0 11-0-12 16-4-8 16-6-4 25-6-0 27-7-13 36-10-0
5-9-0 5-3-12 5-3-12 0-1-12 8-11-12 2-1-13 9-2-3

Plate Offsets (X,Y)-- [8:0-3-0,0-1-15], [12:0-4-1,0-8-2]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.68	Vert(LL)	-0.19	15-16	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.64	Vert(CT)	-0.39	15-16	>614	240	M18SHS	197/144
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.94	Horz(CT)	-0.04	16	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.05	18-19	>999	240	Weight: 136 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2 *Except*
7-8: 2x6 SPF No.2, 8-11: 2x4 SPF 2100F 1.8E
BOT CHORD 2x4 SPF No.2 *Except*
5-16: 2x3 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-20: 2x6 SPF No.2, 10-12: 2x8 SP DSS

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-11-5 oc purlins, except end verticals, and 2-0-0 oc purlins (5-6-14 max.): 3-7.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 17-18
4-4-0 oc bracing: 16-17.

REACTIONS. (size) 20=0-3-8, 16=0-3-8, 12=0-3-8
Max Horz 20=-90(LC 9)
Max Uplift 20=-154(LC 8), 16=-277(LC 8), 12=-147(LC 9)
Max Grav 20=776(LC 21), 16=1706(LC 1), 12=953(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-956/186, 3-4=-764/199, 4-5=-762/197, 6-7=-994/162, 7-8=-921/174, 8-9=-1032/147, 9-10=-1236/239, 2-20=-699/188, 10-12=-855/194
BOT CHORD 19-20=-111/760, 18-19=-113/758, 16-17=-941/211, 5-17=-878/236, 15-16=-73/608, 14-15=-55/998, 12-14=-155/996
WEBS 4-18=-411/173, 5-18=-182/1016, 6-16=-1000/175, 6-15=0/532, 7-14=-365/86, 8-14=-25/415

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) Provide adequate drainage to prevent water ponding.
4) All plates are MT20 plates 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.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 20=154, 16=277, 12=147.
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) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C6	Monopitch	1	1	I46485494
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:31 2021 Page 1
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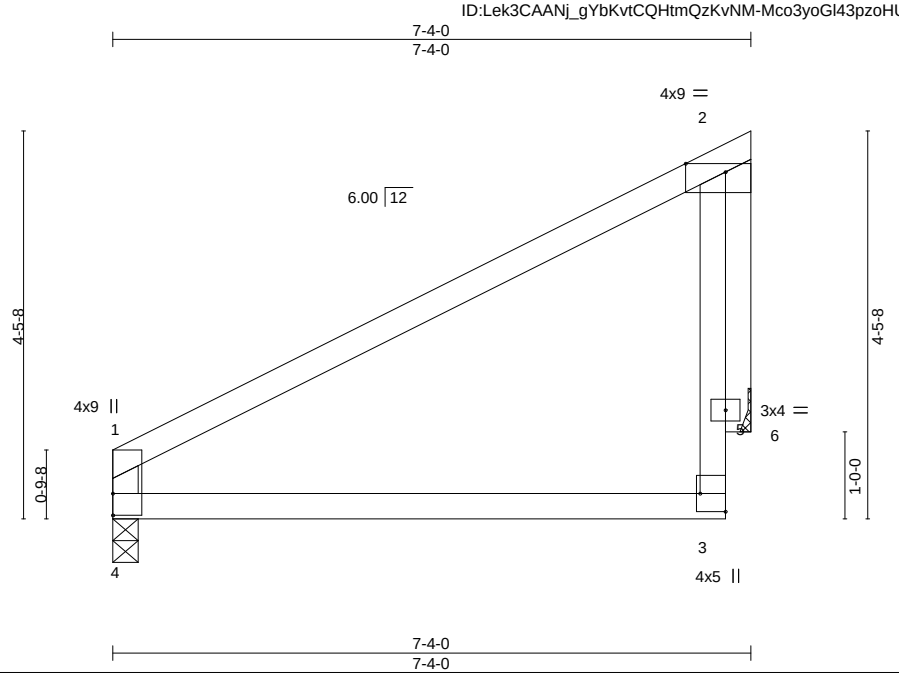

Plate Offsets (X,Y)-- [2:0-5-8,Edge], [3:Edge,0-3-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.53	Vert(LL)	-0.05	3-4	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.30	Vert(CT)	-0.10	3-4	>822	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.34	Horz(CT)	-0.01	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.04	3-4	>999	240	Weight: 26 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 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.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 4=0-3-8, 6=Mechanical
Max Horz 4=113(LC 8)
Max Uplift 4=-18(LC 8), 6=-96(LC 8)
Max Grav 4=320(LC 1), 6=288(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-4=-281/78

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, 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C7	Roof Special Girder	1	1	I46485495
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:32 2021 Page 1
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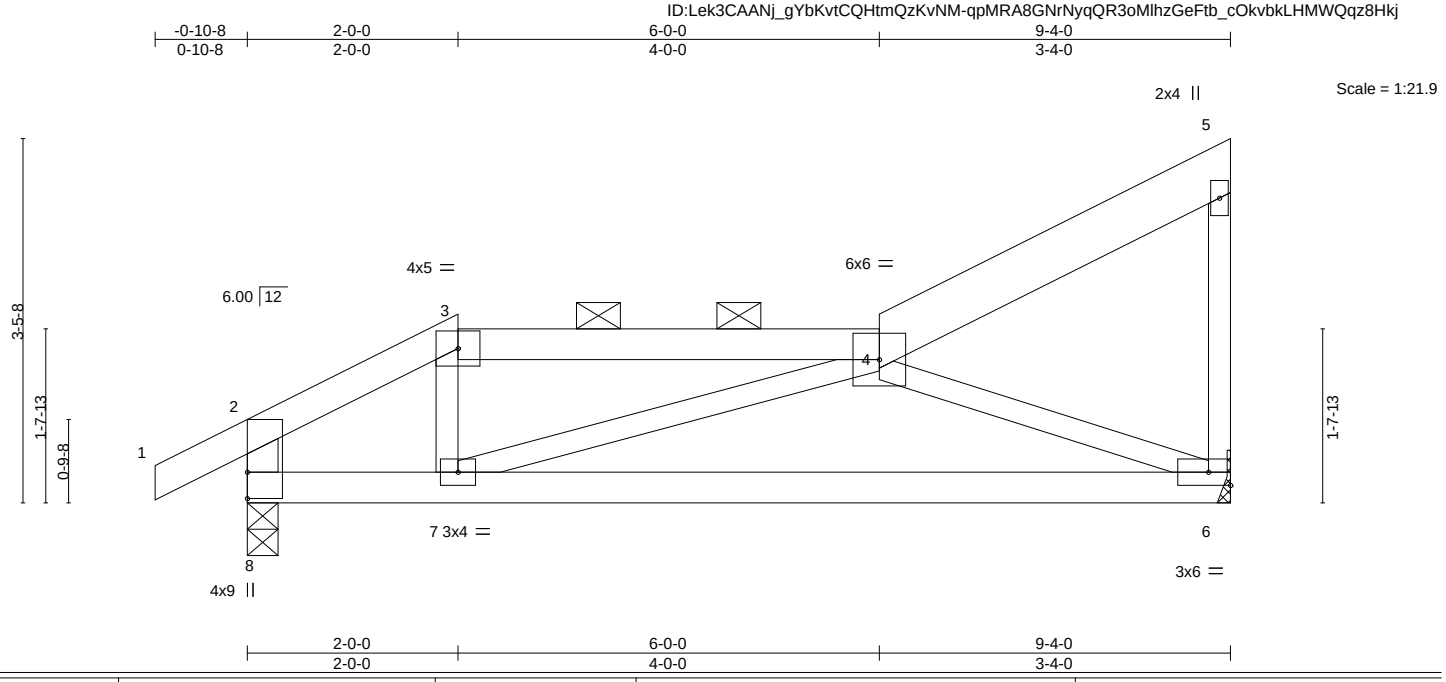

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.38	Vert(LL)	-0.09	6-7	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.47	Vert(CT)	-0.19	6-7	>565	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.21	Horz(CT)	0.01	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.02	6-7	>999	240	Weight: 36 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2 *Except*
4-5: 2x6 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-8: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 6=Mechanical, 8=0-3-8
Max Horz 8=133(LC 5)
Max Uplift 6=-95(LC 8), 8=-129(LC 8)
Max Grav 6=404(LC 1), 8=482(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-560/94, 3-4=-442/103, 2-8=-434/91
BOT CHORD 7-8=-112/449, 6-7=-171/582
WEBS 4-6=-618/222

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) Provide adequate drainage to prevent water ponding.
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) 6 except (jt=lb) 8=129.
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) 92 lb down and 95 lb up at 2-0-0 on top chord, and 7 lb down and 5 lb up at 2-0-0 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
1) 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, 6-8=-20

June 9,2021

Continued on page 2

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

LOAD CASE(S) Standard
Concentrated Loads (lb)
Vert: 7=3(F)

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C8	Roof Special	1	1	I46485496
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:33 2021 Page 1
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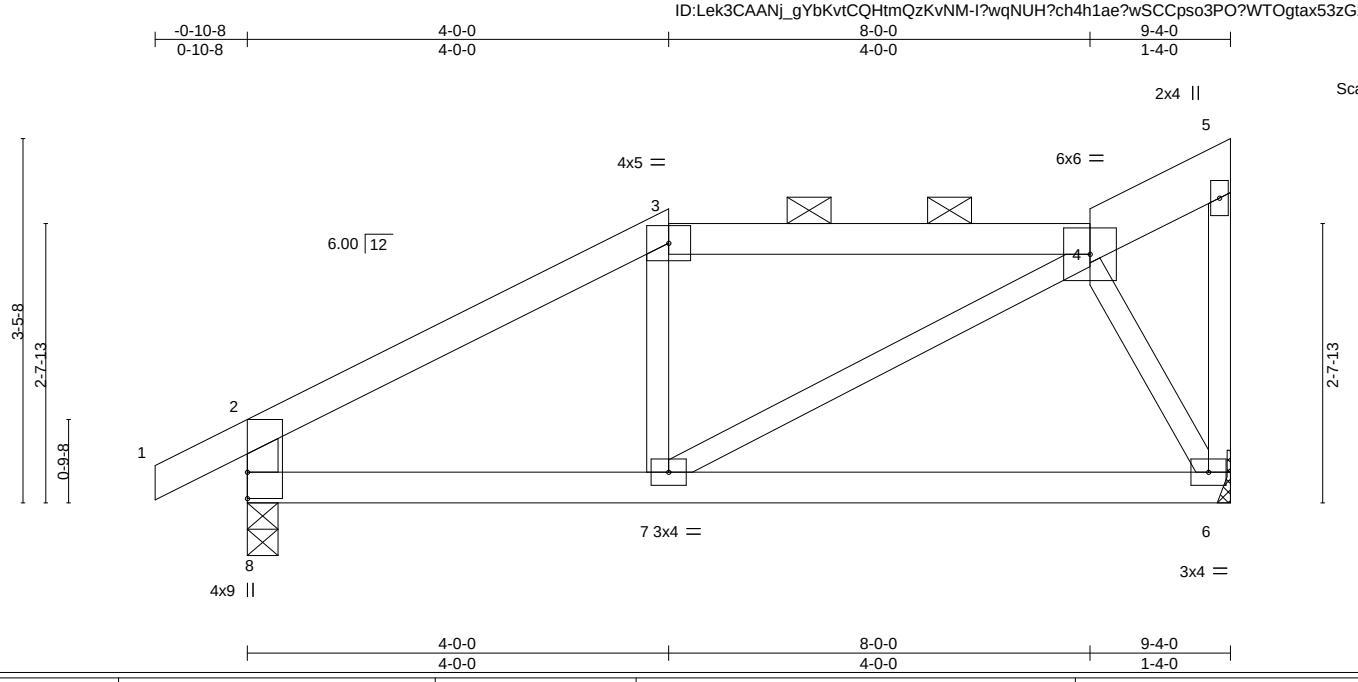

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.32	Vert(LL)	-0.03	6-7	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.22	Vert(CT)	-0.07	6-7	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.09	Horz(CT)	0.00	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.01	6-7	>999	240	Weight: 34 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2 *Except*
4-5: 2x6 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-8: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 6=Mechanical, 8=0-3-8
Max Horz 8=133(LC 5)
Max Uplift 6=-85(LC 8), 8=-91(LC 8)
Max Grav 6=405(LC 1), 8=484(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-506/78, 3-4=-391/102, 2-8=-433/110
BOT CHORD 7-8=-63/388
WEBS 4-6=-405/130

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) Provide adequate drainage to prevent water ponding.
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) 6, 8.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C9	Half Hip	1	1	I46485497
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:34 2021 Page 1
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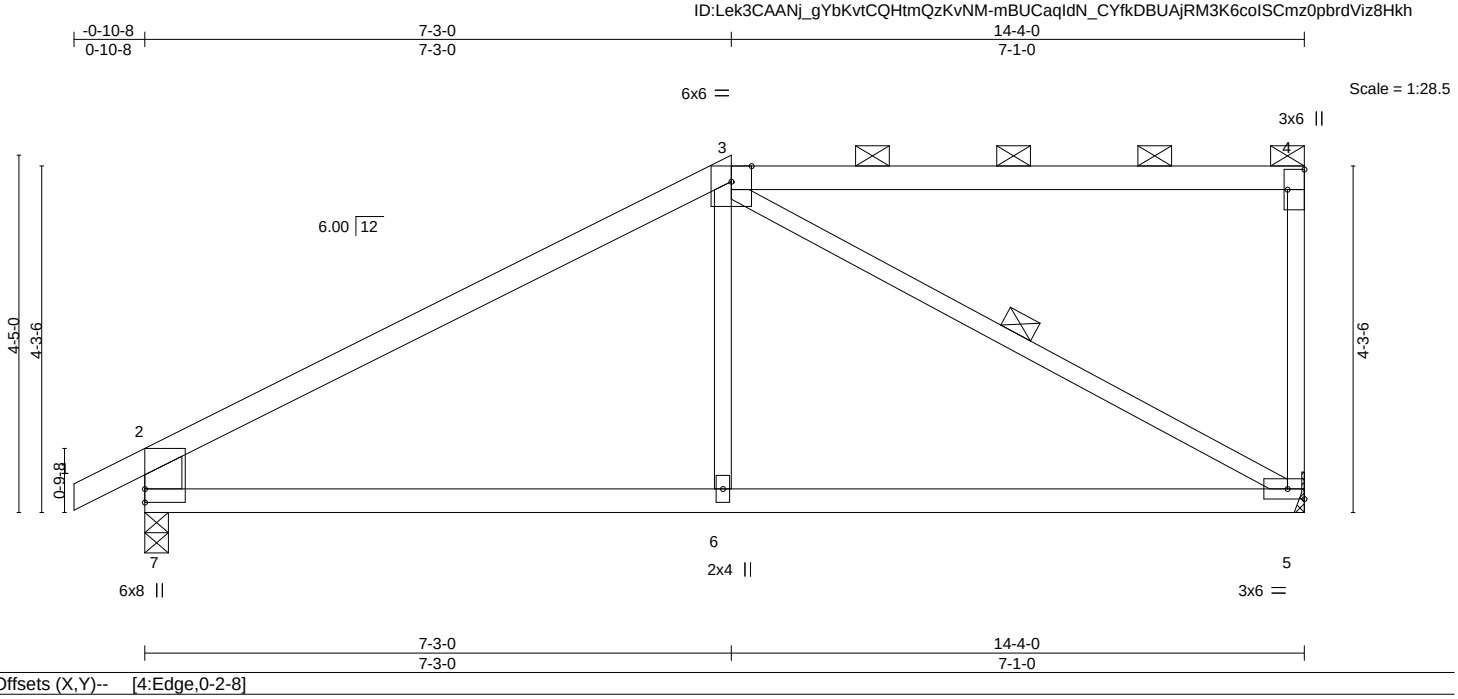

Plate Offsets (X,Y)-- [4:Edge,0-2-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.80	Vert(LL)	-0.08	5-6	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.43	Vert(CT)	-0.15	5-6	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.41	Horz(CT)	0.01	5	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.02	6-7	>999	240	Weight: 48 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-7: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-9-2 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 3-5

REACTIONS. (size) 5=Mechanical, 7=0-3-8
Max Horz 7=174(LC 5)
Max Uplift 5=-113(LC 5), 7=-101(LC 8)
Max Grav 5=627(LC 1), 7=710(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-796/72, 2-7=-646/151
BOT CHORD 6-7=-130/607, 5-6=-133/603
WEBS 3-6=0/314, 3-5=-663/108

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) 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) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 5=113, 7=101.
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) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	C10	Half Hip	1	1	I46485498
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:26 2021 Page 1
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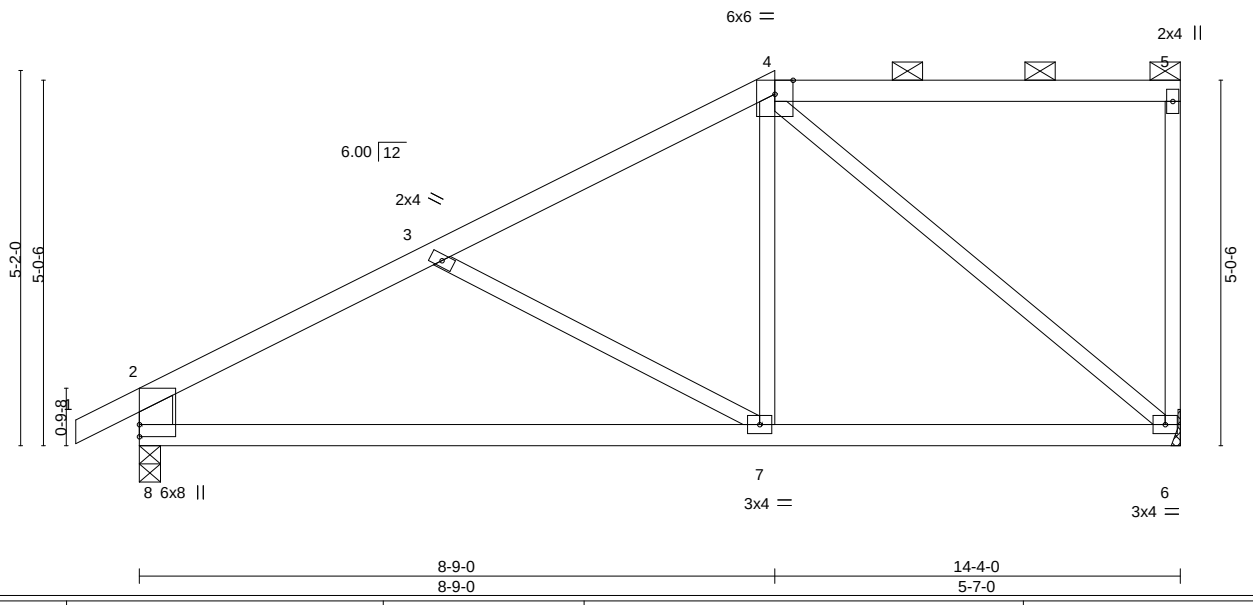

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.56	Vert(LL)	-0.12	7-8	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.49	Vert(CT)	-0.24	7-8	>707	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.81	Horz(CT)	0.01	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.02	6-7	>999	240	Weight: 53 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-8: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-4-1 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 4-5.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 6=Mechanical, 8=0-3-8
Max Horz 8=205(LC 5)
Max Uplift 6=-110(LC 5), 8=-108(LC 8)
Max Grav 6=627(LC 1), 8=710(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-842/157, 3-4=-584/80, 2-8=-621/153
BOT CHORD 7-8=-178/670, 6-7=-107/475
WEBS 4-7=0/351, 4-6=-616/85

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) 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) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 6=110, 8=108.
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) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	D1	Common Supported Gable	1	1	I46485499
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:35 2021 Page 1
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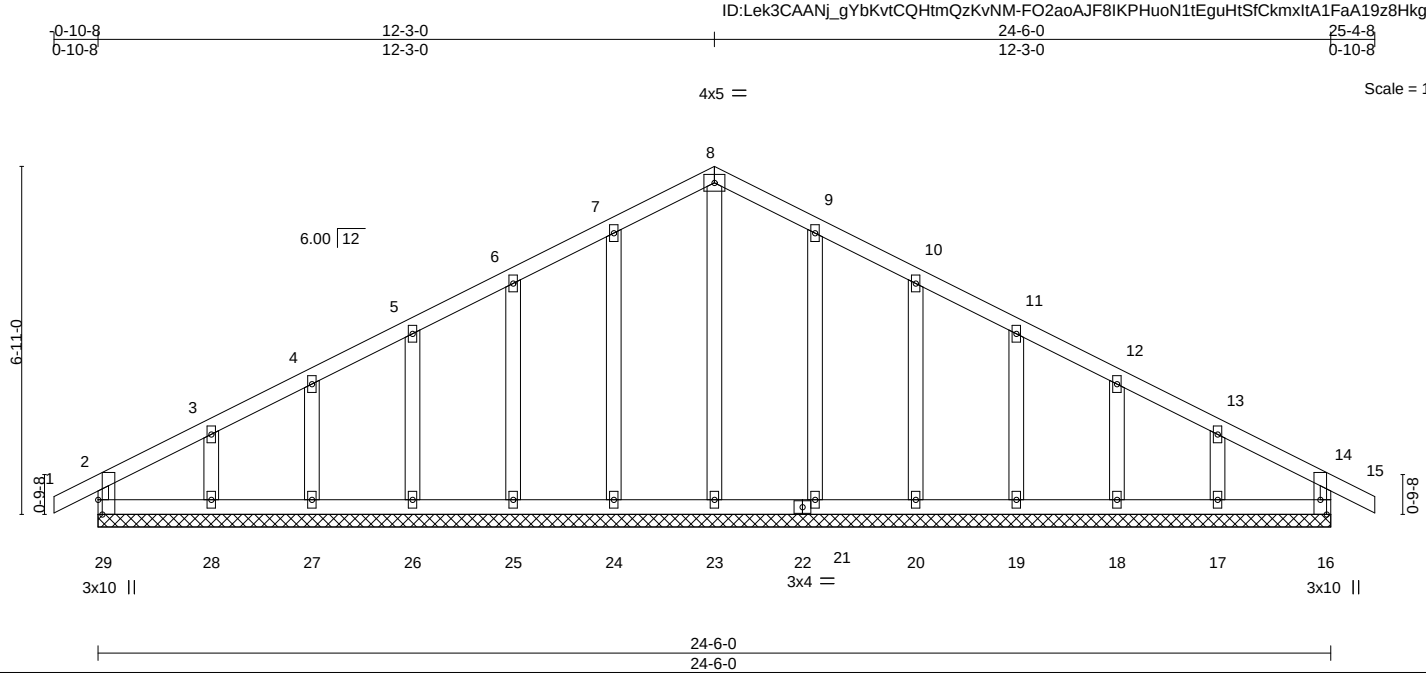

Plate Offsets (X,Y)-- [29:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.08	Vert(LL)	-0.00	15	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	-0.00	15	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.11	Horz(CT)	0.00	16	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 108 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 24-6-0.
(lb) - Max Horz 29=105(LC 7)
Max Uplift All uplift 100 lb or less at joint(s) 29, 16, 24, 25, 26, 27, 28, 21, 20, 19, 18, 17
Max Grav All reactions 250 lb or less at joint(s) 29, 16, 23, 24, 25, 26, 27, 28, 21, 20, 19, 18, 17

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) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) 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) 29, 16, 24, 25, 26, 27, 28, 21, 20, 19, 18, 17.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	D2	Common	7	1	I46485500
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:36 2021 Page 1
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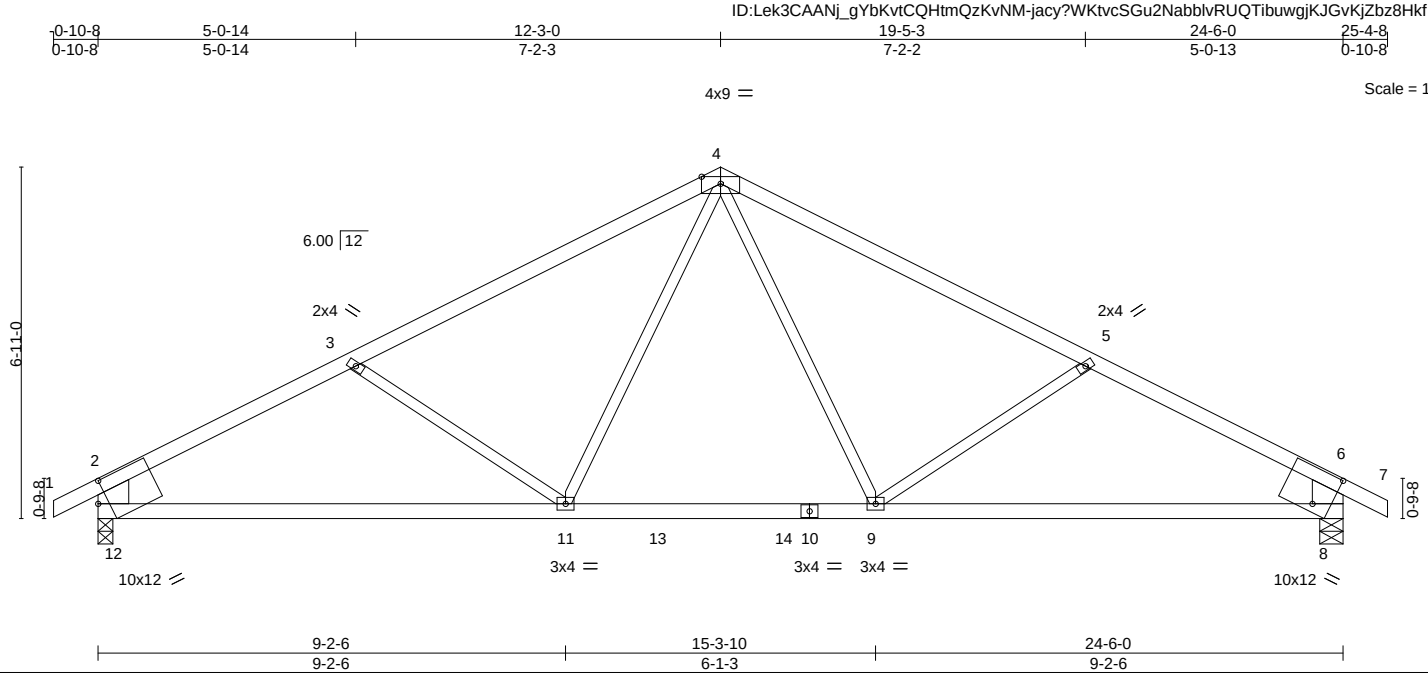

Plate Offsets (X,Y)-- [8:0-4-1,0-8-2], [12:0-2-7,0-4-14]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.76	Vert(LL)	-0.19	9-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.81	Vert(CT)	-0.35	11-12	>825	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.23	Horz(CT)	0.05	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.12	9-11	>999	240	Weight: 84 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF 2100F 1.8E
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-12,6-8: 2x8 SP DSS

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-11-15 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 12=0-3-8, 8=0-5-8
Max Horz 12=109(LC 7)
Max Uplift 12=-160(LC 8), 8=-160(LC 9)
Max Grav 12=1191(LC 2), 8=1191(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1665/262, 3-4=-1432/184, 4-5=-1432/184, 5-6=-1665/262, 2-12=-1050/207, 6-8=-1050/207
BOT CHORD 11-12=-258/1398, 9-11=-39/1048, 8-9=-164/1384
WEBS 4-9=-45/443, 5-9=-332/243, 4-11=-45/443, 3-11=-332/243

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) 12=160, 8=160.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E1	GABLE	1	1	I46485501
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:37 2021 Page 1
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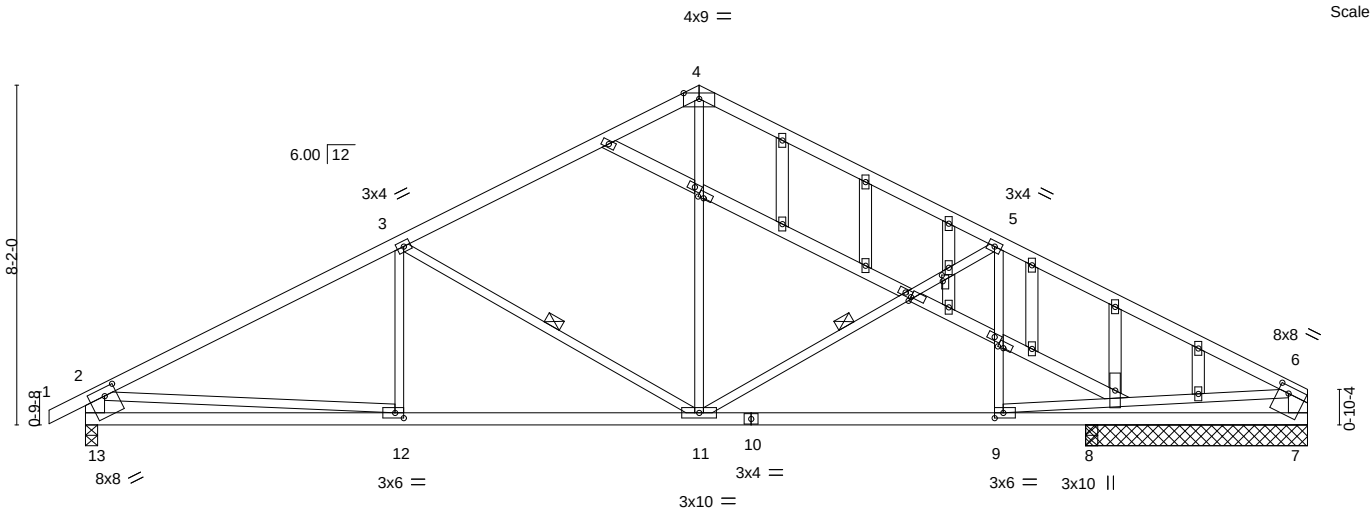

7-6-9 7-6-9 | 14-9-0 7-2-8 | 21-11-8 7-2-8 | 24-4-0 2-4-8 | 29-4-8 5-0-8

Plate Offsets (X,Y)-- [6:0-3-0,0-2-0], [9:0-2-8,0-1-8], [12:0-2-8,0-1-8], [13:0-3-8,0-2-4], [15:0-1-10,0-0-4], [16:0-0-3,0-1-4], [17:0-1-10,0-0-4], [25:0-1-12,0-0-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.68	Vert(LL)	-0.12	9-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.60	Vert(CT)	-0.26	9-11	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.44	Horz(CT)	0.05	7	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.08	9-11	>999	240	Weight: 140 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF No.2
BOT CHORD	2x4 SPF No.2
WEBS	2x3 SPF No.2 *Except* 2-13,6-7: 2x6 SPF No.2, 14-15,15-16,16-17,17-18: 2x4 SPF No.2
OTHERS	2x4 SPF No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 3-3-7 oc purlins, except end verticals.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	1 Row at midpt 3-11, 5-11

REACTIONS. (size) 7=5-4-0, 13=0-3-8, 8=0-3-8
Max Horz 13=129(LC 7)
Max Uplift 7=-171(LC 9), 13=-190(LC 8)
Max Grav 7=1132(LC 1), 13=1345(LC 1), 8=206(LC 3)

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

TOP CHORD	2-3=-2010/261, 3-4=-1427/238, 4-5=-1429/241, 5-6=-1828/267, 2-13=-1270/231, 6-7=-1116/206
BOT CHORD	12-13=-285/603, 11-12=-261/1695, 9-11=-165/1544, 8-9=-92/271, 7-8=-92/271
WEBS	3-11=-657/235, 4-11=-59/710, 5-11=-509/247, 2-12=-12/1095, 6-9=-79/1278

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 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) except (jt=lb) 7=171, 13=190.
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.

STATE OF MISSOURI
JUAN GARCIA
NUMBER E-2000162101
PROFESSIONAL ENGINEER

JUAN GARCIA
LICENSED
16952
KANSAS
PROFESSIONAL ENGINEER

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E2	Common	2	1	I46485502
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:40 2021 Page 1
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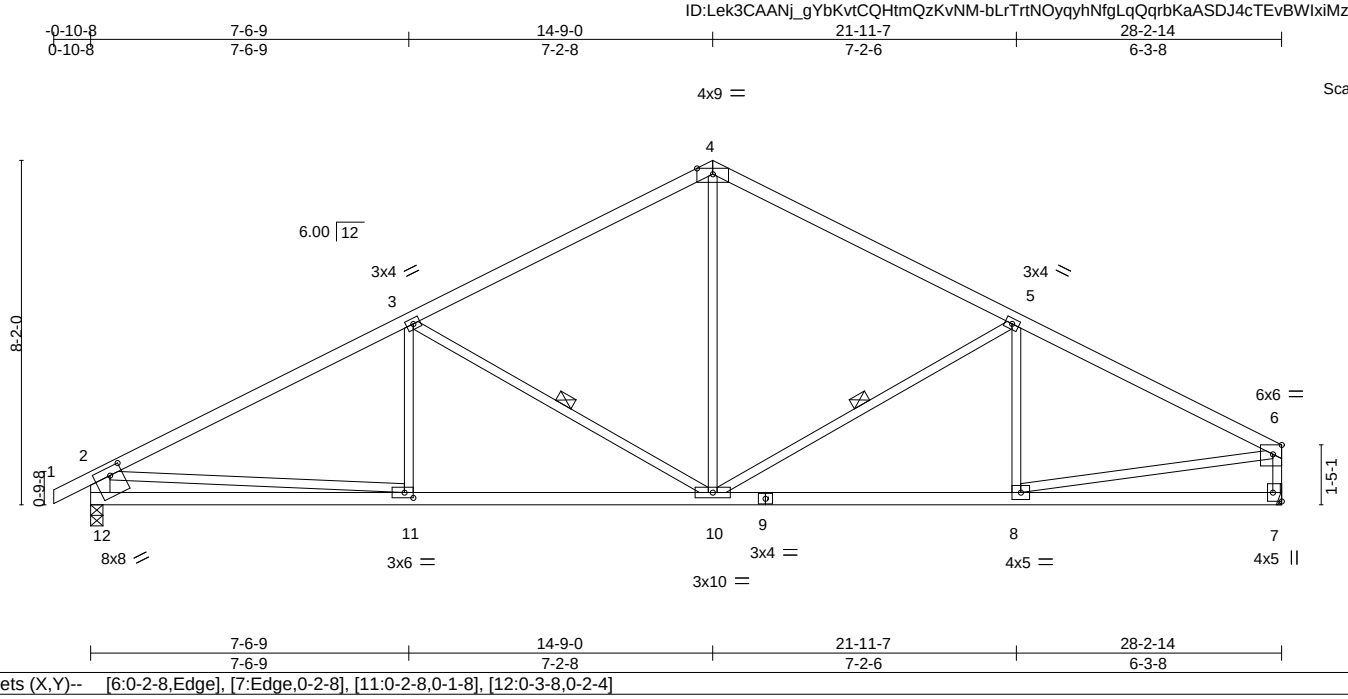

Plate Offsets (X,Y)-- [6:0-2-8,Edge], [7:Edge,0-2-8], [11:0-2-8,0-1-8], [12:0-3-8,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.65	Vert(LL)	-0.09	10-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.54	Vert(CT)	-0.18	10-11	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.49	Horz(CT)	0.05	7	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.06	10-11	>999	240	Weight: 108 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-12: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-6-13 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 3-10, 5-10

REACTIONS. (size) 12=0-3-8, 7=Mechanical
Max Horz 12=143(LC 7)
Max Uplift 12=-184(LC 8), 7=-150(LC 9)
Max Grav 12=1335(LC 1), 7=1254(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1991/250, 3-4=-1401/220, 4-5=-1401/228, 5-6=-1765/217, 2-12=-1261/225, 6-7=-1195/179
BOT CHORD 11-12=-286/599, 10-11=-252/1678, 8-10=-143/1507
WEBS 3-10=-661/235, 4-10=-47/681, 5-10=-492/207, 2-11=-0/1083, 6-8=-112/1420

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) 12=184, 7=150.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E3	Common	4	1	I46485503
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:41 2021 Page 1
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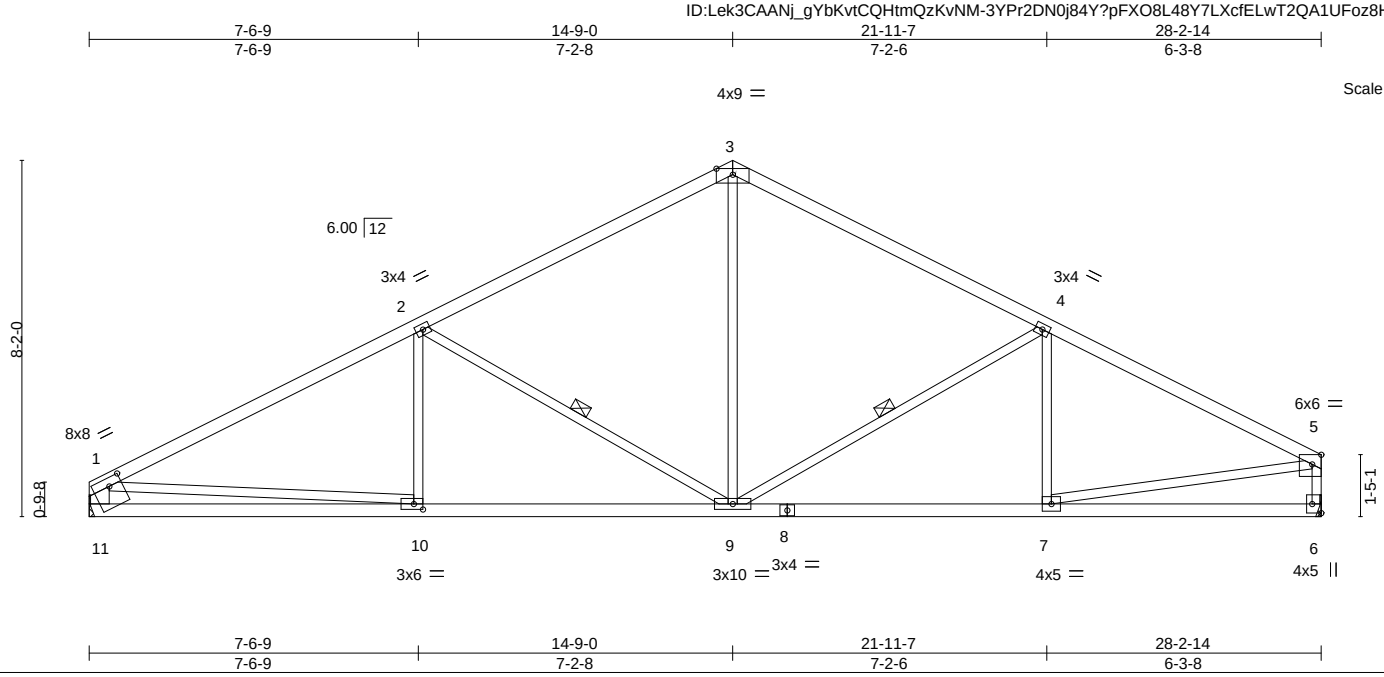

Plate Offsets (X,Y)-- [1:0-3-8,0-2-4], [5:0-2-8,Edge], [6:Edge,0-2-8], [10:0-2-8,0-1-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.69	Vert(LL)	-0.09	9-10	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.55	Vert(CT)	-0.19	9-10	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.49	Horz(CT)	0.04	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.04	9-10	>999	240	Weight: 106 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
1-11: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 2-9, 4-9

REACTIONS. (size) 11=Mechanical, 6=Mechanical
Max Horz 11=113(LC 7)
Max Uplift 11=-16(LC 8), 6=-11(LC 9)
Max Grav 11=1256(LC 1), 6=1256(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1997/42, 2-3=-1406/69, 3-4=-1403/74, 4-5=-1768/35, 1-11=-1181/57, 5-6=-1196/41
BOT CHORD 10-11=-93/455, 9-10=-41/1694, 7-9=0/1510
WEBS 2-9=-676/115, 3-9=0/690, 4-9=-493/108, 1-10=0/1250, 5-7=0/1422

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) 11, 6.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E4	Common	1	1	I46485504
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:42 2021 Page 1
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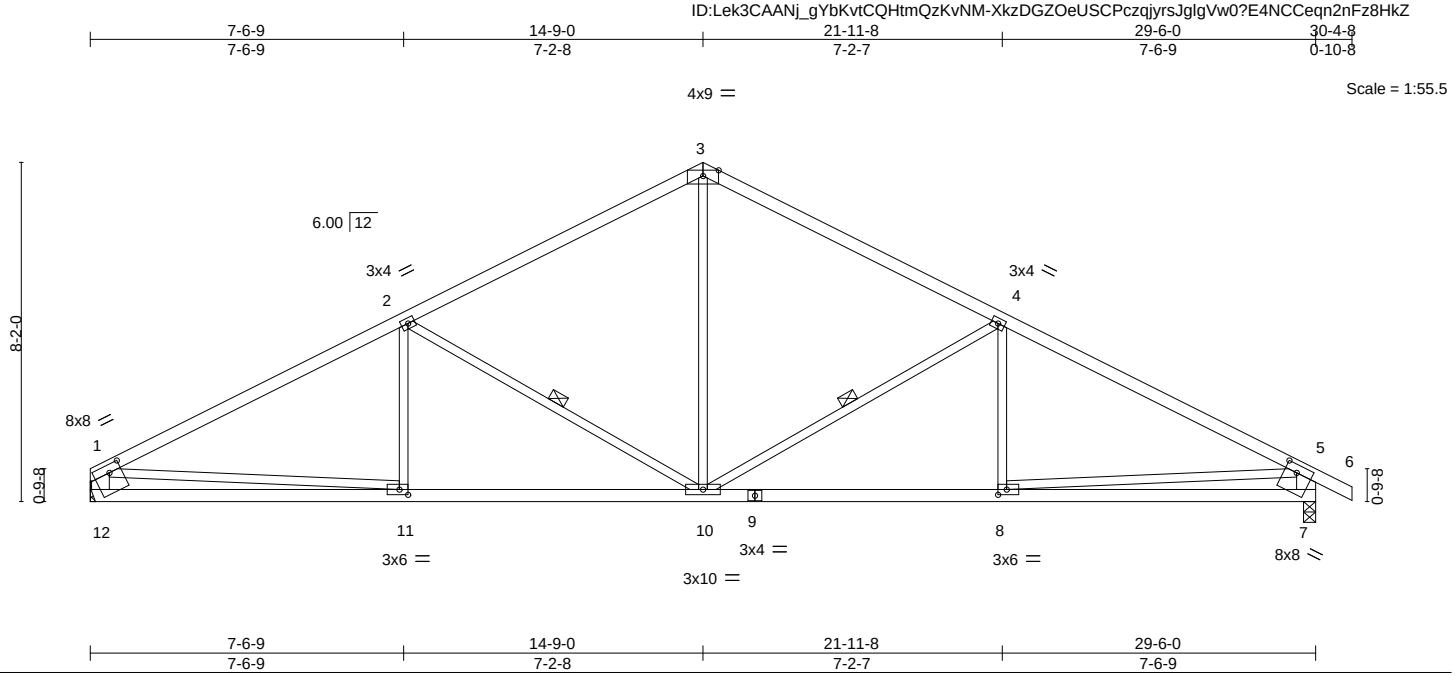

Plate Offsets (X,Y)-- [1:0-3-8,0-2-4], [7:0-3-8,0-2-4], [8:0-2-8,0-1-8], [11:0-2-8,0-1-8]

LOADING (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)	-0.10	10-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.21	10-11	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.46	Horz(CT)	0.05	7	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.05	10-11	>999	240	Weight: 111 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
1-12,5-7: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 4-10, 2-10

REACTIONS. (size) 12=Mechanical, 7=0-3-8
Max Horz 12=-109(LC 4)
Max Uplift 12=-15(LC 8), 7=-27(LC 9)
Max Grav 12=1305(LC 1), 7=1386(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-2092/40, 2-3=-1508/71, 3-4=-1506/71, 4-5=-2089/40, 1-12=-1230/55, 5-7=-1312/67
BOT CHORD 11-12=-86/468, 10-11=-31/1778, 8-10=0/1766, 7-8=-73/609
WEBS 3-10=0/781, 4-10=-657/112, 2-10=-671/115, 1-11=0/1327, 5-8=0/1161

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) 12, 7.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E5	Common	1	1	I46485505
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:42 2021 Page 1

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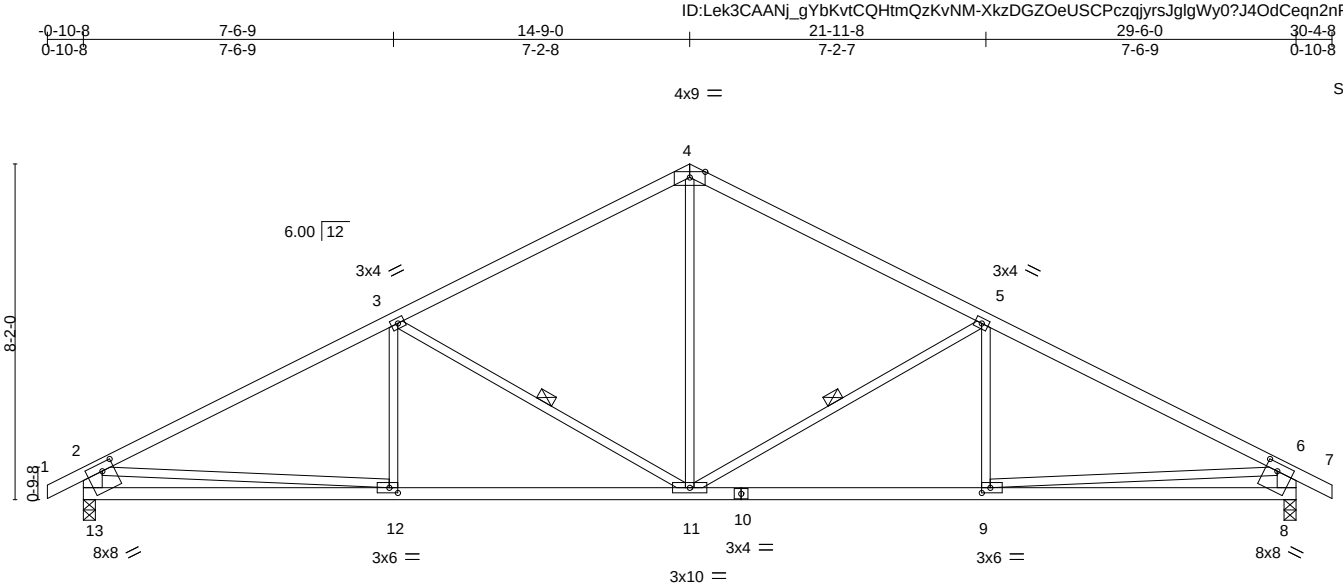


Plate Offsets (X,Y)-- [8:0-3-8,0-2-4], [9:0-2-8,0-1-8], [12:0-2-8,0-1-8], [13:0-3-8,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.65	Vert(LL)	-0.10	11-12	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.20	11-12	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.43	Horz(CT)	0.06	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.06	11-12	>999	240	Weight: 112 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF No.2
BOT CHORD	2x4 SPF No.2
WEBS	2x3 SPF No.2 *Except* 2-13,6-8: 2x6 SPF No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 3-4-9 oc purlins, except end verticals.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	1 Row at midpt 5-11, 3-11

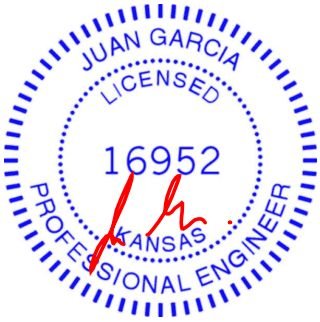
REACTIONS. (size) 13=0-3-8, 8=0-3-8
Max Horz 13=123(LC 7)
Max Uplift 13=-187(LC 8), 8=-187(LC 9)
Max Grav 13=1384(LC 1), 8=1384(LC 1)

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

TOP CHORD	2-3=-2086/255, 3-4=-1503/235, 4-5=-1503/235, 5-6=-2086/255, 2-13=-1310/227, 6-8=-1310/227
BOT CHORD	12-13=-276/609, 11-12=-246/1763, 9-11=-128/1763, 8-9=-167/609
WEBS	4-11=-53/772, 5-11=-657/234, 3-11=-657/234, 2-12=-7/1158, 6-9=-16/1158

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) 13=187, 8=187.
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.



June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E6	Roof Special	1	1	I46485506
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:43 2021 Page 1
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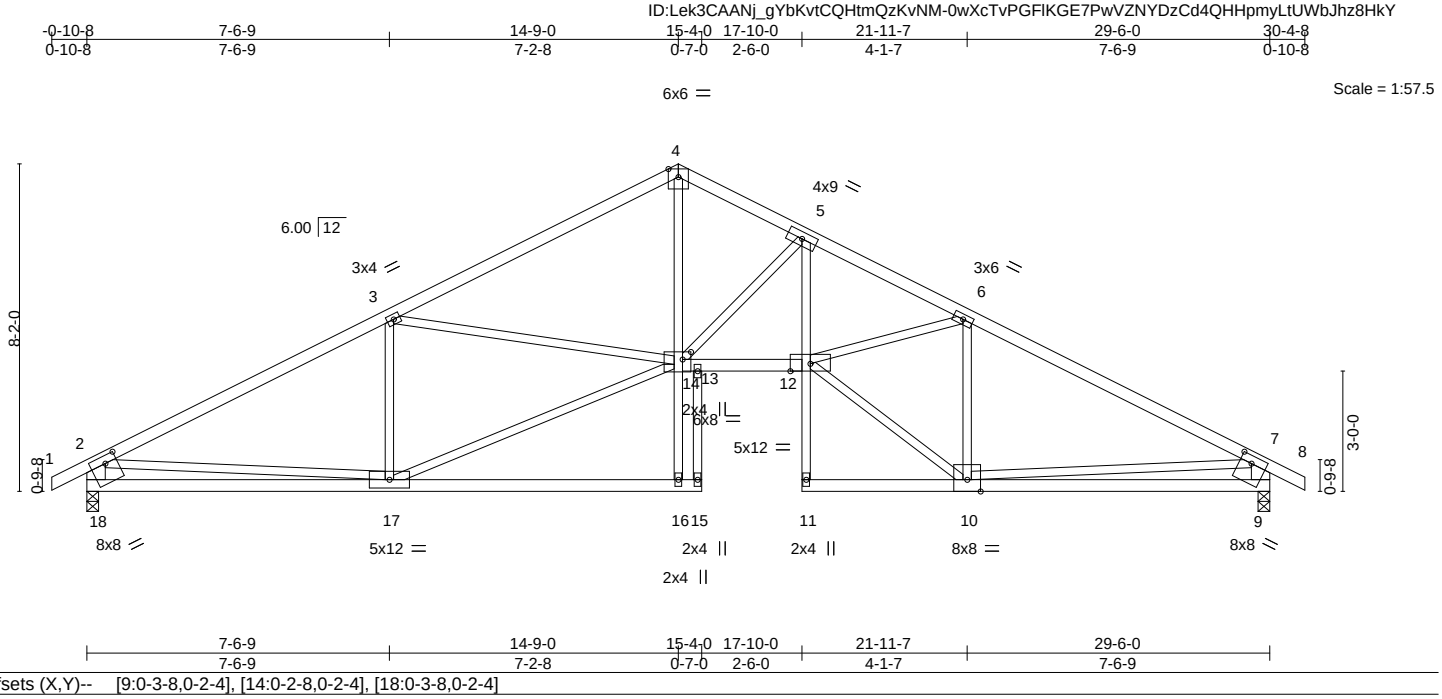

Plate Offsets (X,Y)-- [9:0-3-8,0-2-4], [14:0-2-8,0-2-4], [18:0-3-8,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.94	Vert(LL)	-0.20	11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.83	Vert(CT)	-0.37	11	>952	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.74	Horz(CT)	0.22	9	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.12	12	>999	240	Weight: 129 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
5-11: 2x3 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-18,7-9: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 18=0-3-8, 9=0-3-8
Max Horz 18=123(LC 7)
Max Uplift 18=-187(LC 8), 9=-187(LC 9)
Max Grav 18=1384(LC 1), 9=1384(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-2090/254, 3-4=-2319/240, 4-5=-2255/275, 5-6=-3262/281, 6-7=-2063/246, 2-18=-1312/227, 7-9=-1308/229
BOT CHORD 17-18=-278/603, 13-14=-107/2836, 12-13=-108/2838, 5-12=-96/1155, 9-10=-208/690
WEBS 3-17=-667/195, 3-14=-37/324, 14-16=0/398, 4-14=-93/1598, 5-14=-1218/190, 10-12=-144/2168, 6-12=-39/1149, 6-10=-1295/163, 2-17=-12/1168, 7-10=-6/1047, 14-17=-269/1897

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) 18=187, 9=187.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E7	Roof Special	2	1	I46485507
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:44 2021 Page 1
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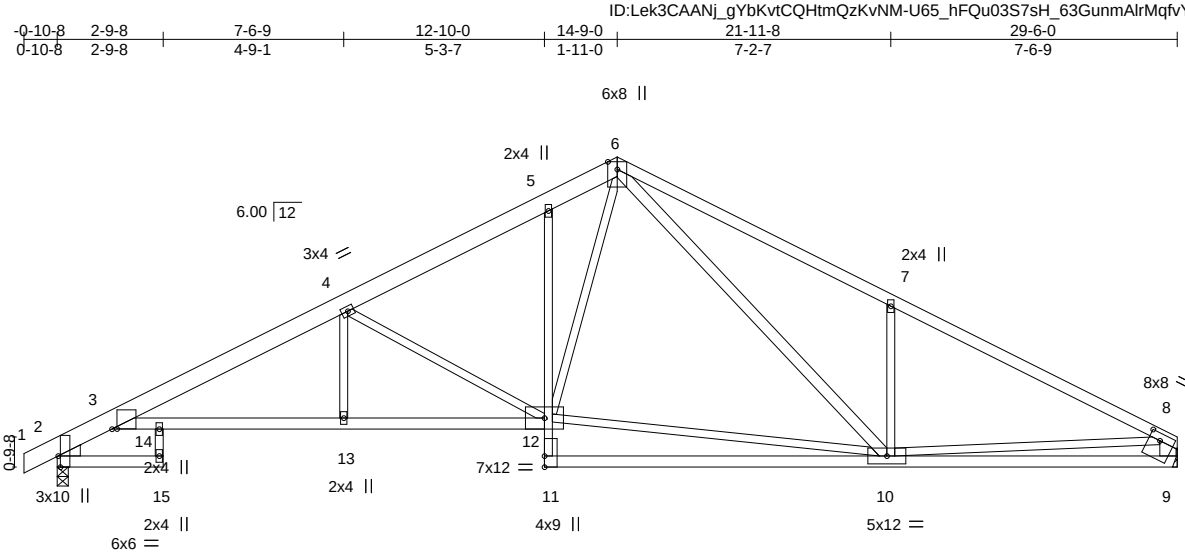

Plate Offsets (X,Y)-- [2:0-3-8,Edge], [3:0-1-9,0-0-1], [8:0-3-8,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.72	Vert(LL)	-0.23	13-14	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.68	Vert(CT)	-0.47	10-11	>749	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	1.00	Horz(CT)	0.26	9	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.13	13-14	>999	240	Weight: 143 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SP DSS *Except*
6-8: 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
3-12: 2x4 SPF 2100F 1.8E, 5-11: 2x3 SPF No.2
WEBS 2x3 SPF No.2 *Except*
6-10: 2x4 SPF No.2, 8-9: 2x6 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 2=0-3-8, 9=Mechanical
Max Horz 2=102(LC 5)
Max Uplift 2=-26(LC 8), 9=-15(LC 9)
Max Grav 2=1383(LC 1), 9=1309(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-820/43, 3-4=-2772/51, 4-5=-1902/55, 5-6=-1740/97, 6-7=-2098/147, 7-8=-2113/34, 8-9=-1239/52
BOT CHORD 3-14=-48/2494, 13-14=-48/2494, 12-13=-48/2494, 9-10=-42/448
WEBS 4-13=0/321, 4-12=-1060/106, 10-12=0/1226, 6-12=-49/841, 6-10=-121/712, 7-10=-539/187, 8-10=0/1353

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) 2, 9.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E8	Roof Special	1	1	I46485508
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:45 2021 Page 1
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-0-10-8 2-9-8 7-6-9 14-9-0 21-11-7 25-11-8 29-6-0
0-10-8 2-9-8 4-9-1 7-2-7 7-2-7 4-0-1 3-6-8

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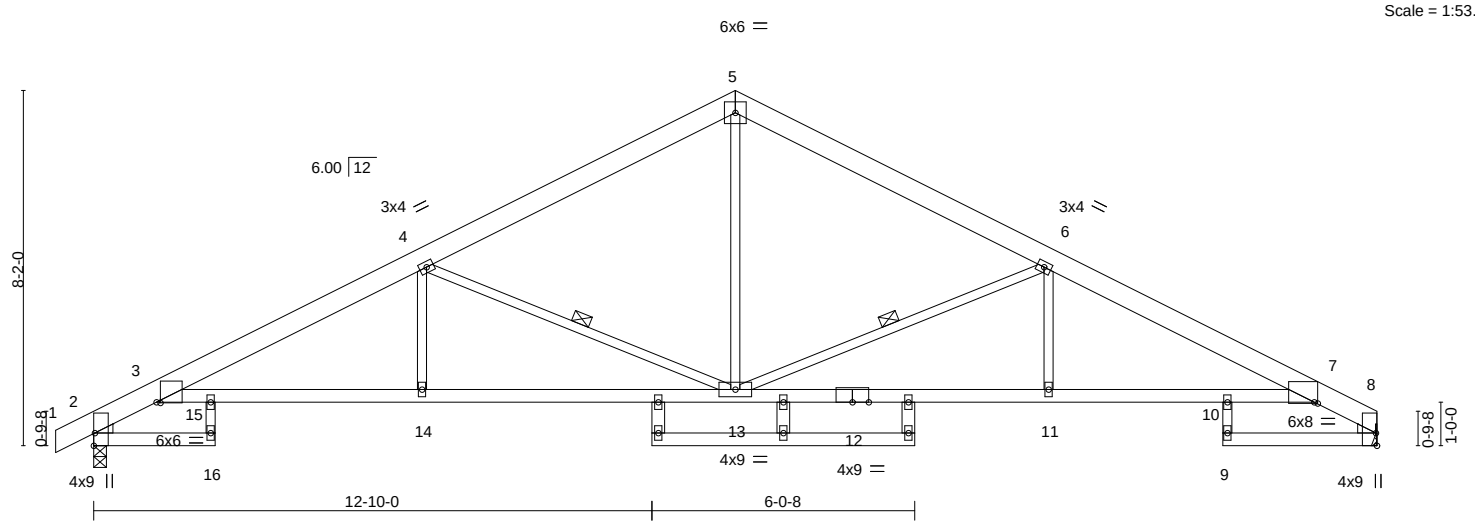

2-9-8 7-6-9 14-9-0 21-11-7 25-11-8 29-6-0
2-9-8 4-9-1 7-2-7 7-2-7 4-0-1 3-6-8

Plate Offsets (X,Y)-- [2:Edge,0-0-5], [3:0-1-1,0-0-3], [7:0-0-15,0-0-5], [8:Edge,0-0-5]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.66	Vert(LL)	-0.27	10-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.70	Vert(CT)	-0.51	10-11	>696	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.69	Horz(CT)	0.48	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.14	14-15	>999	240	Weight: 151 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SP DSS
BOT CHORD 2x4 SPF No.2 *Except*
3-12,7-12: 2x4 SPF 2100F 1.8E
WEBS 2x3 SPF No.2 *Except*
17-19,18-20,21-22: 2x4 SPF No.2
WEDGE
Left: 2x3 SPF No.2 , Right: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-5-8 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. Except:
10-0-0 oc bracing: 11-13
WEBS 1 Row at midpt 4-13, 6-13

REACTIONS. (size) 2=0-3-8, 8=Mechanical
Max Horz 2=89(LC 5)
Max Uplift 2=-26(LC 8), 8=-16(LC 9)
Max Grav 2=1391(LC 1), 8=1317(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-825/58, 3-4=-2786/54, 4-5=-1761/45, 5-6=-1762/58, 6-7=-2812/27, 7-8=-780/33
BOT CHORD 3-15=-51/2507, 14-15=-51/2507, 13-14=-51/2507, 11-13=0/2538, 10-11=0/2538, 7-10=0/2538
WEBS 4-14=0/330, 4-13=-1153/135, 5-13=0/1063, 6-13=-1187/116, 6-11=0/337

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 2x4 MT20 unless otherwise indicated.
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) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 8.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E9	Roof Special	1	1	I46485509
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:46 2021 Page 1
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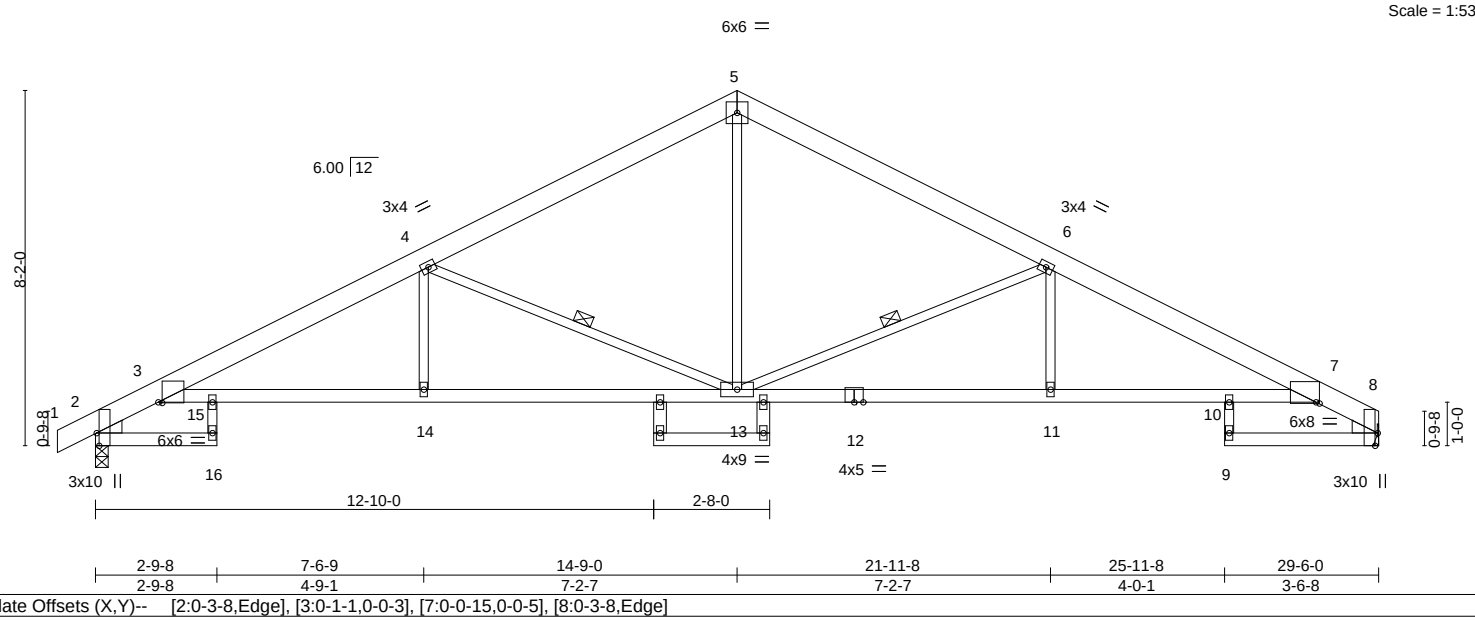
-0-10-8 2-9-8 7-6-9 14-9-0 21-11-8 25-11-8 29-6-0
0-10-8 2-9-8 4-9-1 7-2-7 7-2-7 4-0-1 3-6-8

Scale = 1:53.0



2-9-8 7-6-9 14-9-0 21-11-8 25-11-8 29-6-0
2-9-8 4-9-1 7-2-7 7-2-7 4-0-1 3-6-8

Plate Offsets (X,Y)-- [2:0-3-8,Edge], [3:0-1-1,0-0-3], [7:0-0-15,0-0-5], [8:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.66	Vert(LL)	-0.27	10-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.70	Vert(CT)	-0.50	10-11	>696	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.69	Horz(CT)	0.48	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.14	14-15	>999	240	Weight: 147 lb	FT = 10%

LUMBER-
TOP CHORD 2x6 SP DSS
BOT CHORD 2x4 SPF No.2 *Except*
3-12,7-12: 2x4 SPF 2100F 1.8E
WEBS 2x3 SPF No.2 *Except*
17-19,18-20: 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2 , Right: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-5-8 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 4-13, 6-13

REACTIONS. (size) 2=0-3-8, 8=Mechanical
Max Horz 2=89(LC 5)
Max Uplift 2=-26(LC 8), 8=-16(LC 9)
Max Grav 2=1391(LC 1), 8=1317(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-825/58, 3-4=-2786/54, 4-5=-1761/45, 5-6=-1762/58, 6-7=-2812/27, 7-8=-780/33
BOT CHORD 3-15=-51/2507, 14-15=-51/2507, 13-14=-51/2507, 11-13=0/2538, 10-11=0/2538, 7-10=0/2538
WEBS 4-14=0/330, 4-13=-1153/135, 5-13=0/1063, 6-13=-1187/116, 6-11=0/337

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 2x4 MT20 unless otherwise indicated.
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) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 8.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	E10	Roof Special	1	1	I46485510
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:38 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-fzjjQBL8RDiz8MXyj?oNWvVrGPcj8V5ckCpqeUz8Hkd

-0-10-8	7-6-9	14-9-0	17-7-6	21-11-7	25-11-8	29-6-0	30-4-8
0-10-8	7-6-9	7-2-8	2-10-6	4-4-1	4-0-1	3-6-8	0-10-8

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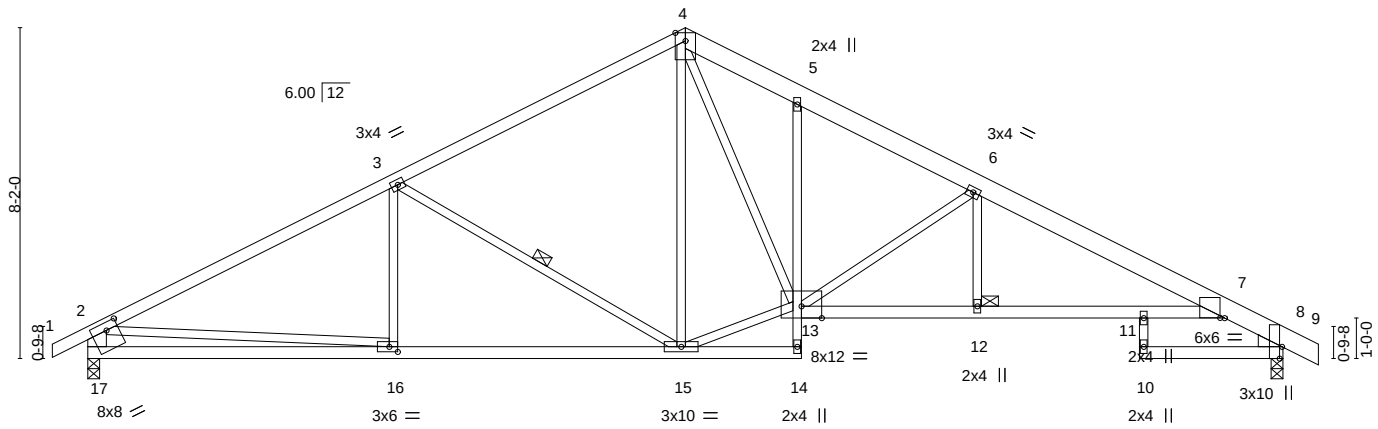

7-6-9	14-9-0	17-7-6	21-11-7	25-11-8	29-6-0
7-6-9	7-2-8	2-10-6	4-4-1	4-0-1	3-6-8

Plate Offsets (X,Y)-- [7:0-1-5,0-0-1], [8:0-3-8,Edge], [16:0-2-8,0-1-8], [17:0-3-8,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.63	Vert(LL)	-0.22	11-12	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.66	Vert(CT)	-0.42	11-12	>832	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.72	Horz(CT)	0.26	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.16	11-12	>999	240	Weight: 140 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF No.2 *Except* 4-9: 2x6 SP DSS
BOT CHORD	2x4 SPF No.2 *Except* 5-14: 2x3 SPF No.2, 7-13: 2x4 SPF 2100F 1.8E
WEBS	2x3 SPF No.2 *Except* 2-17: 2x6 SPF No.2
WEDGE	Right: 2x4 SPF No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 3-5-4 oc purlins, except end verticals.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing. Except: 10-0-0 oc bracing: 12-13, 11-12
WEBS	1 Row at midpt 3-15
JOINTS	1 Brace at Jt(s): 12

REACTIONS. (size) 17=0-3-8, 8=0-3-8
Max Horz 17=-132(LC 9)
Max Uplift 17=-188(LC 8), 8=-186(LC 9)
Max Grav 17=1388(LC 1), 8=1382(LC 1)

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

TOP CHORD	2-3=-2095/254, 3-4=-1518/236, 4-5=-1870/306, 5-6=-2007/245, 6-7=-2768/300, 7-8=-807/129, 2-17=-1315/227
BOT CHORD	16-17=-286/607, 15-16=-250/1771, 12-13=-161/2490, 11-12=-161/2490, 7-11=-161/2490
WEBS	3-15=-639/225, 13-15=-50/1265, 4-13=-176/1108, 6-13=-1004/223, 6-12=0/306, 2-16=-11/1167

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) 17=188, 8=186.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT	
210459	E11	Roof Special Structural Gable	1	1	Job Reference (optional)	I46485511

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:39 2021 Page 1
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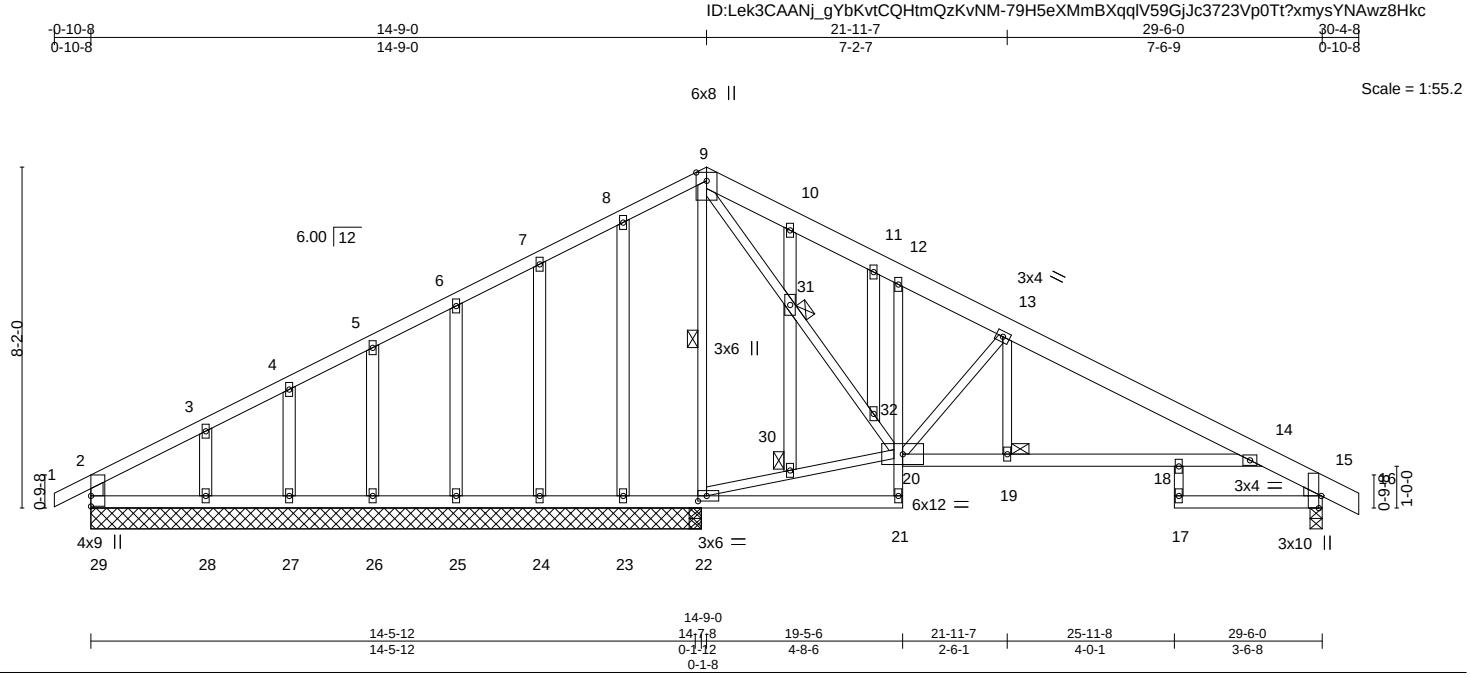

Plate Offsets (X,Y)-- [15:0-3-8,Edge], [22:0-2-8,0-1-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.40	Vert(LL)	-0.08	18	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.37	Vert(CT)	-0.18	18-19	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.55	Horz(CT)	0.08	15	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.07	18	>999	240	Weight: 154 lb	FT = 10%

LUMBER-

TOP CHORD	2x4 SPF No.2 *Except* 9-16: 2x6 SPF No.2
BOT CHORD	2x4 SPF No.2 *Except* 12-21: 2x3 SPF No.2
WEBS	2x3 SPF No.2 *Except* 2-29: 2x4 SPF No.2
OTHERS	2x4 SPF No.2
WEDGE	Right: 2x3 SPF No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing, Except: 10-0-0 oc bracing: 21-22,20-21,15-17. 10-0-0 oc bracing: 19-20, 18-19
WEBS	1 Row at midpt 9-22
JOINTS	1 Brace at Jt(s): 19, 30, 31

REACTIONS. All bearings 14-7-8 except (jt=length) 15=0-3-8.
(lb) - Max Horz 29=-132(LC 9)
Max Uplift All uplift 100 lb or less at joint(s) 23, 24, 25, 26, 27 except 29=-292(LC 22), 15=-104(LC 9), 22=-131(LC 9), 28=-121(LC 8)
Max Grav All reactions 250 lb or less at joint(s) 29, 23, 24, 25, 26, 27 except 15=488(LC 1), 22=1238(LC 1), 22=1238(LC 1), 28=395(LC 1)

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

TOP CHORD	2-3=-145/587, 3-4=-76/529, 4-5=-37/548, 5-6=-8/544, 6-7=0/543, 7-8=0/550, 8-9=0/534, 13-14=-391/99, 2-29=-35/261
BOT CHORD	28-29=-463/243, 27-28=-463/243, 26-27=-463/243, 25-26=-463/243, 24-25=-463/243, 23-24=-463/243, 22-23=-463/243, 19-20=-14/321, 18-19=-14/321, 14-18=-14/321
WEBS	9-31=-178/655, 31-32=-166/613, 20-32=-174/650, 22-30=-500/240, 20-30=-480/230, 13-20=-648/168, 13-19=0/256, 3-28=-268/127, 9-22=-966/106

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 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) 23, 24, 25, 26, 27 except (jt=lb) 29=292, 15=104, 22=131, 28=121.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	G1	Roof Special	1	1	I46485512
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:47 2021 Page 1
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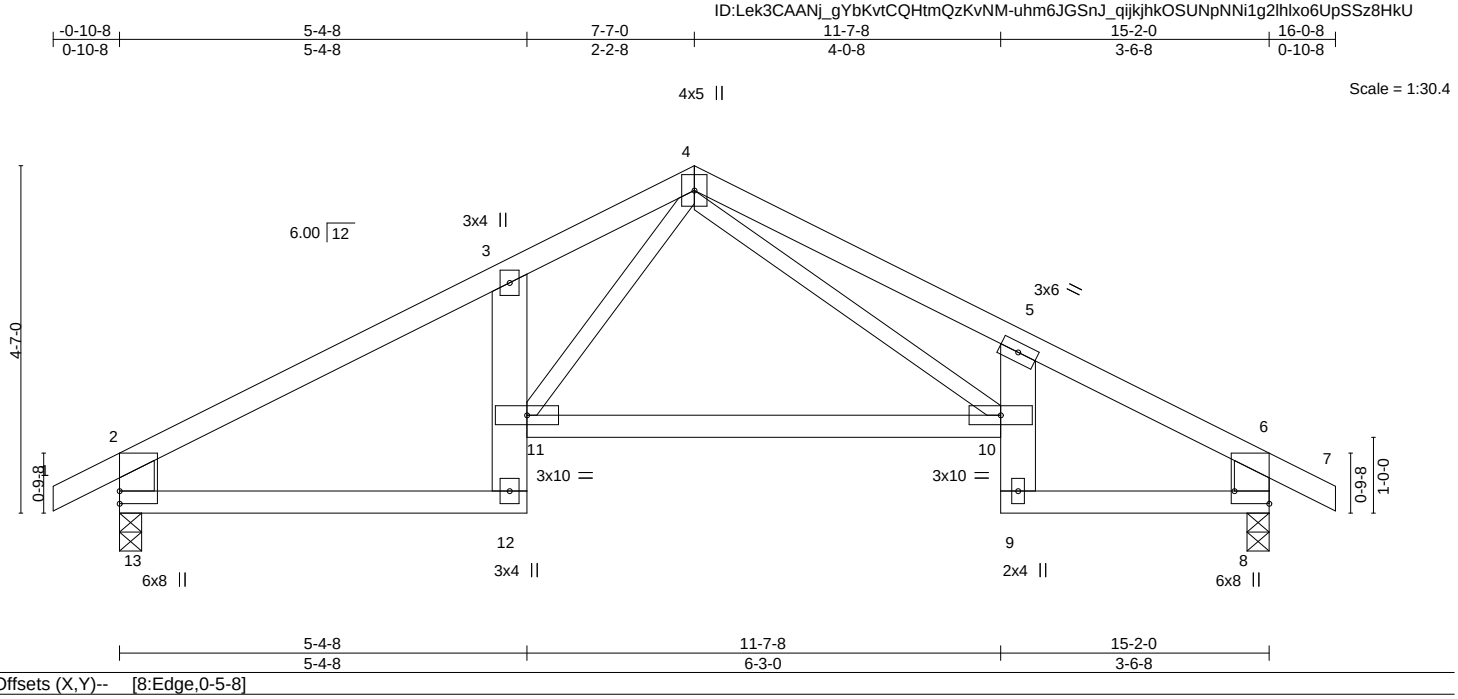

Plate Offsets (X,Y)-- [8:Edge,0-5-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.65	Vert(LL)	-0.11	10-11	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.65	Vert(CT)	-0.25	10-11	>701	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.31	Horz(CT)	0.11	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S		Wind(LL)	0.06	10-11	>999	240	Weight: 56 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
3-12,5-9: 2x6 SPF No.2
WEBS 2x6 SPF No.2 *Except*
4-11,4-10: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-2-4 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 9-10.

REACTIONS. (size) 13=0-3-8, 8=0-3-8
Max Horz 13=-77(LC 6)
Max Uplift 13=-107(LC 8), 8=-107(LC 9)
Max Grav 13=739(LC 1), 8=739(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-883/117, 3-4=-1211/208, 4-5=-1675/258, 5-6=-845/113, 2-13=-674/141, 6-8=-667/122
BOT CHORD 12-13=-87/689, 3-11=-345/158, 10-11=-26/725, 5-10=-493/171, 8-9=-48/650
WEBS 4-11=-115/561, 4-10=-177/901

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) 13=107, 8=107.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	G2	Common Supported Gable	1	1	I46485513
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:48 2021 Page 1
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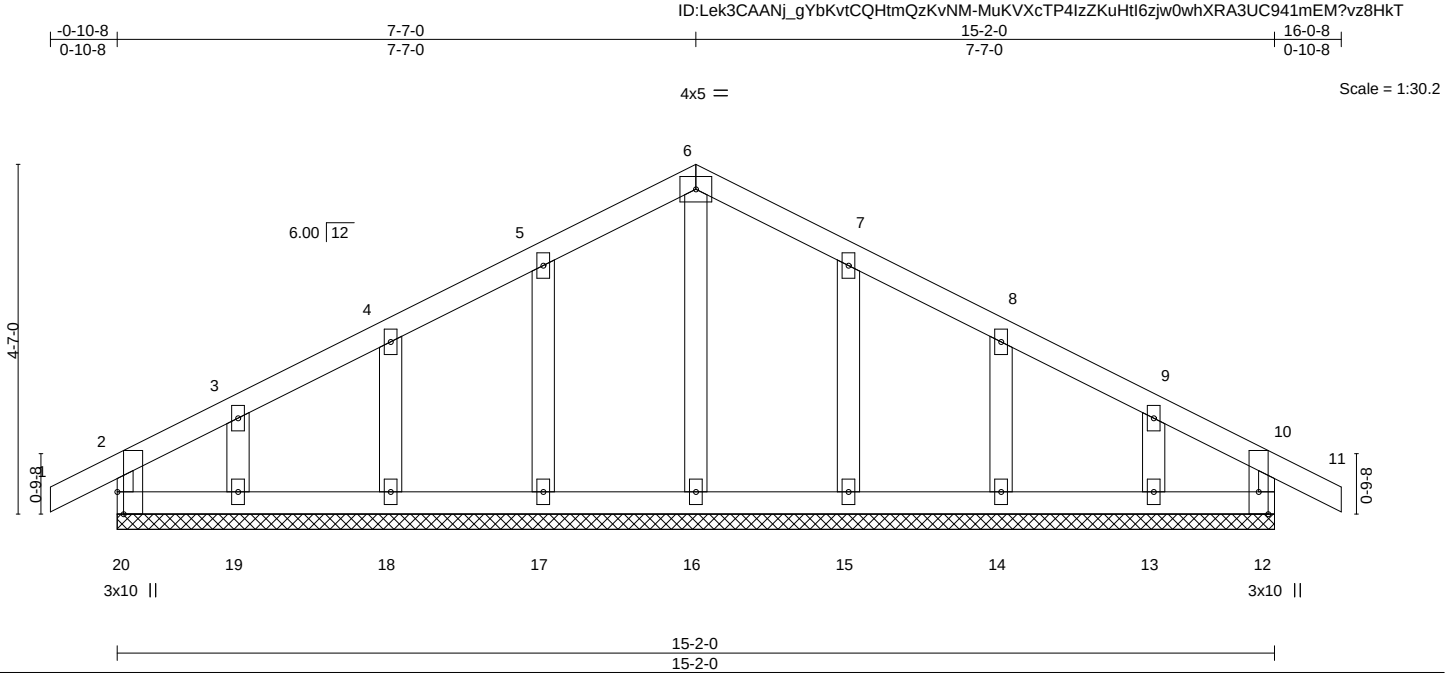

Plate Offsets (X,Y)-- [20:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	11	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.02	Vert(CT)	-0.00	11	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.04	Horz(CT)	0.00	12	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 58 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 15-2-0.
(lb) - Max Horz 20=-75(LC 6)
Max Uplift All uplift 100 lb or less at joint(s) 20, 12, 17, 18, 19, 15, 14, 13
Max Grav All reactions 250 lb or less at joint(s) 20, 12, 16, 17, 18, 19, 15, 14, 13

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) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) 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) 20, 12, 17, 18, 19, 15, 14, 13.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	H1	Common Supported Gable	1	1	I46485514
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:48 2021 Page 1
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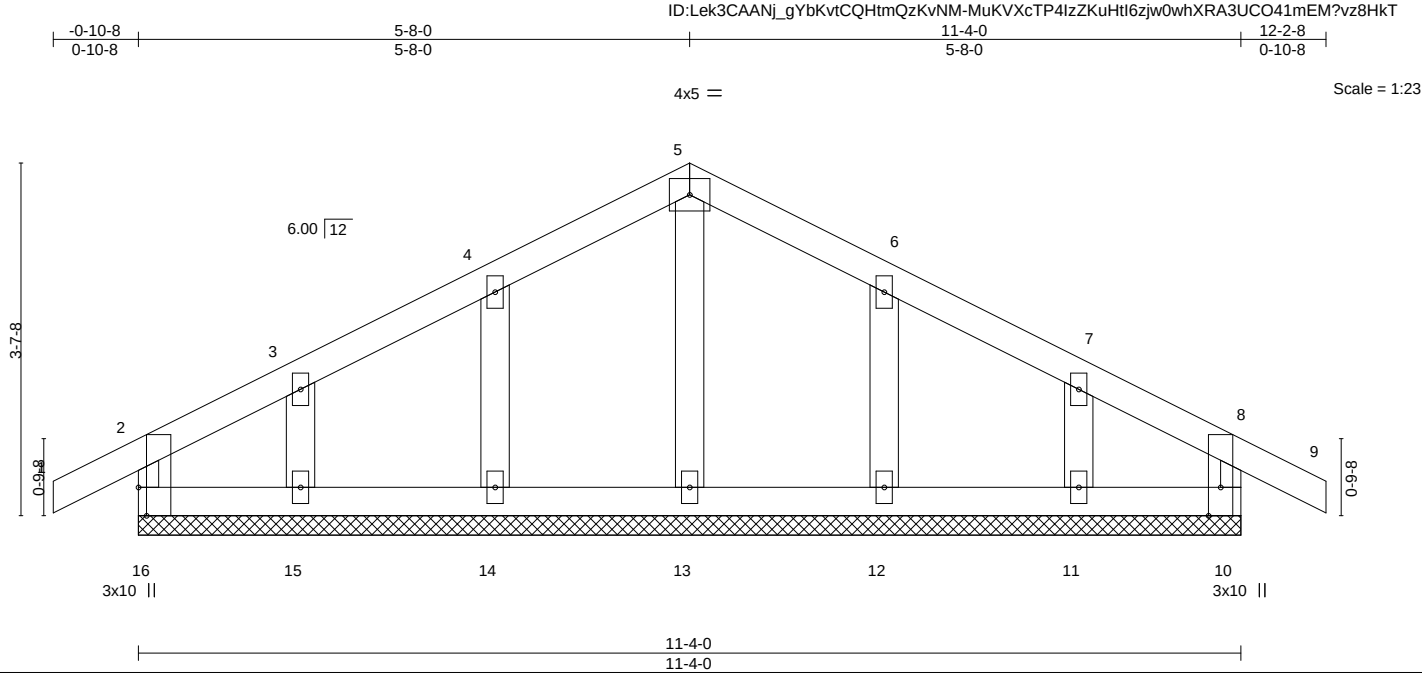

Plate Offsets (X,Y)-- [16:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	9	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.02	Vert(CT)	-0.00	9	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	0.00	10	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 41 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 11-4-0.
(lb) - Max Horz 16=-63(LC 6)
Max Uplift All uplift 100 lb or less at joint(s) 16, 10, 14, 15, 12, 11
Max Grav All reactions 250 lb or less at joint(s) 16, 10, 13, 14, 15, 12, 11

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) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) 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) 16, 10, 14, 15, 12, 11.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	H2	Common	1	1	I46485515
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:49 2021 Page 1
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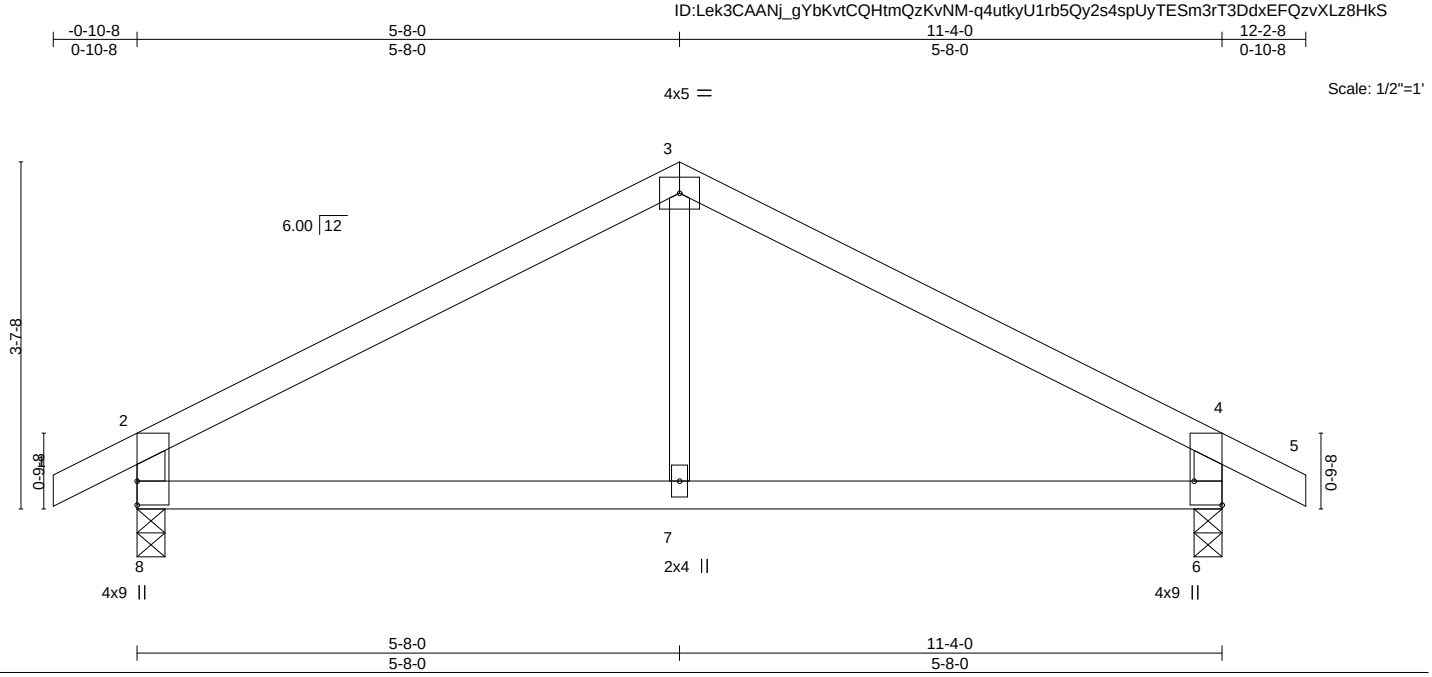

Plate Offsets (X,Y)-- [6:Edge,0-3-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.40	Vert(LL)	-0.02	6-7	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.23	Vert(CT)	-0.05	6-7	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.07	Horz(CT)	0.01	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.01	7-8	>999	240	Weight: 33 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except*
3-7: 2x3 SPF No.2

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.

REACTIONS. (size) 8=0-3-8, 6=0-3-8
Max Horz 8=-63(LC 6)
Max Uplift 8=-84(LC 8), 6=-84(LC 9)
Max Grav 8=568(LC 1), 6=568(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-588/85, 3-4=-588/85, 2-8=-510/123, 4-6=-510/123
BOT CHORD 7-8=-12/438, 6-7=-12/438

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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	H3	Common Girder	1	2	I46485516
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:50 2021 Page 1
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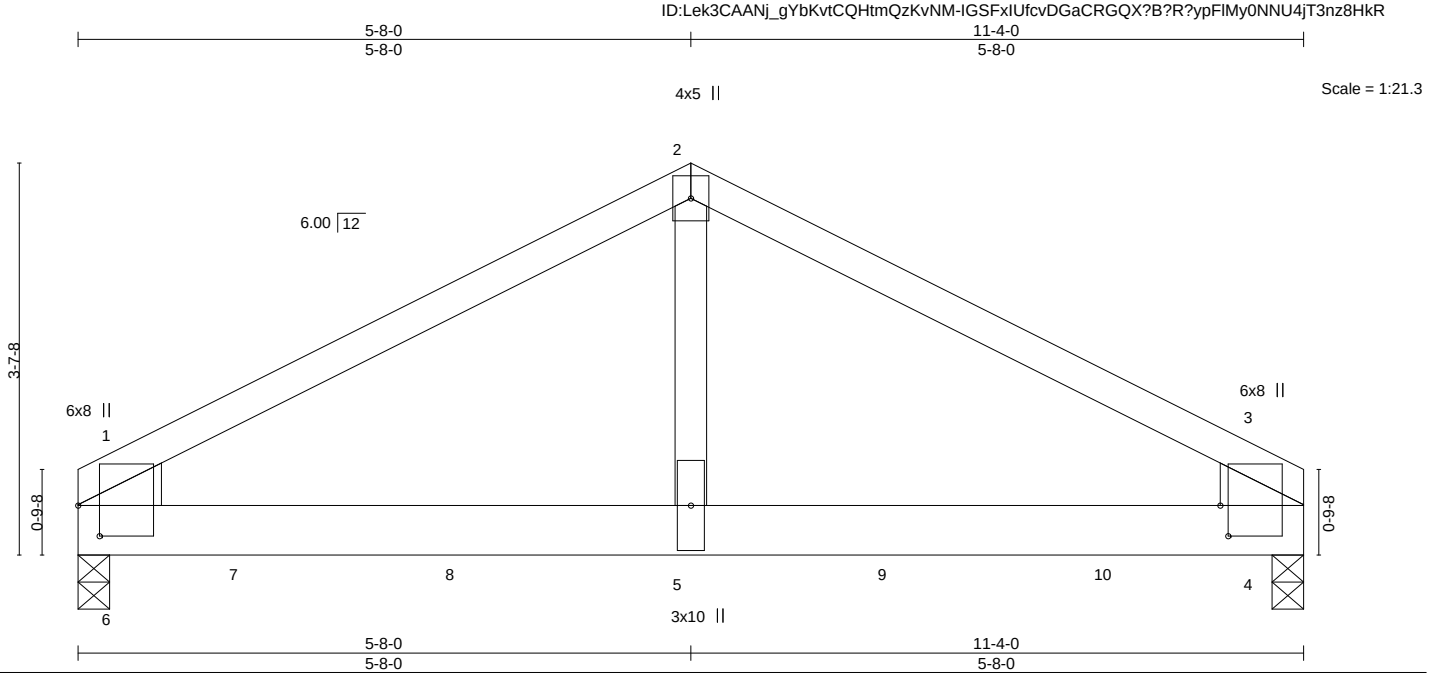


Plate Offsets (X,Y)-- [1:0-3-6,0-2-6], [3:0-3-6,0-0-14]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.34	Vert(LL)	-0.06	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.48	Vert(CT)	-0.10	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.38	Horz(CT)	0.01	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.03	4-5	>999	240	Weight: 95 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SP 2400F 2.0E
WEBS 2x10 SP DSS *Except*
2-5: 2x4 SPF No.2

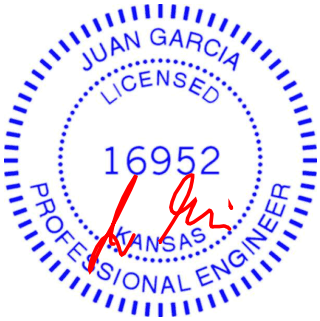
BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 6=0-3-8, 4=0-3-8
Max Horz 6=57(LC 26)
Max Uplift 6=-129(LC 8), 4=-127(LC 9)
Max Grav 6=3657(LC 1), 4=3522(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-3874/157, 2-3=-3874/157, 1-6=-1912/132, 3-4=-1912/132
BOT CHORD 5-6=-87/3375, 4-5=-87/3375
WEBS 2-5=-16/3104

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, 2x10 - 2 rows staggered at 0-9-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-7-0 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 6=129, 4=127.
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) 1285 lb down and 35 lb up at 1-6-12, 1236 lb down and 36 lb up at 3-6-12, 1236 lb down and 36 lb up at 5-6-12, and 1236 lb down and 36 lb up at 7-6-12, and 1236 lb down and 36 lb up at 9-6-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard



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Continued on page 2

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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, 4-6=-20
   Concentrated Loads (lb)
   Vert: 5=-1236(B) 7=-1285(B) 8=-1236(B) 9=-1236(B) 10=-1236(B)

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J4	Diagonal Hip Girder	1	1	I46485517
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:56 2021 Page 1
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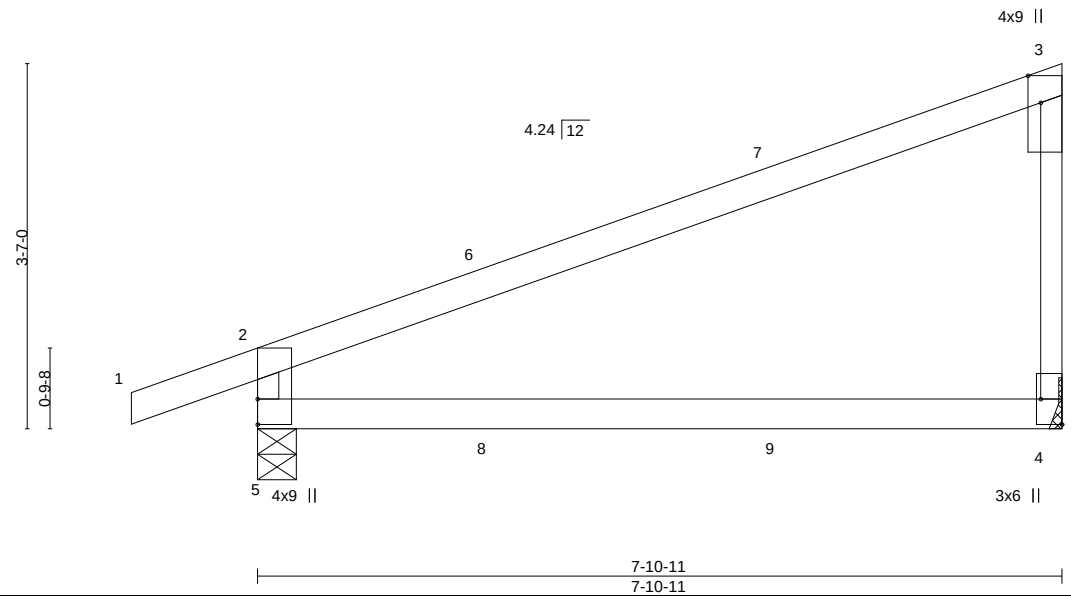


Plate Offsets (X,Y)-- [3:0-3-3,Edge], [4:Edge,0-2-8]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.67	Vert(LL)	-0.15	4-5	>610	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.61	Vert(CT)	-0.32	4-5	>288	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.06	4-5	>999	240	Weight: 23 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF 2100F 1.8E
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

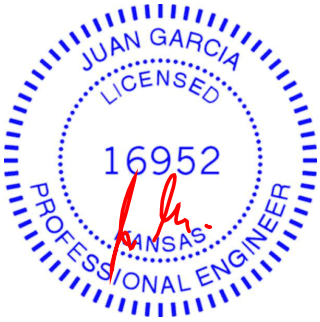
BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-4-9, 4=Mechanical
Max Horz 5=153(LC 5)
Max Uplift 5=-126(LC 4), 4=-101(LC 8)
Max Grav 5=457(LC 1), 4=358(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-392/186, 3-4=-252/139

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) except (jt=lb) 5=126, 4=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) 68 lb down and 30 lb up at 2-3-13, 68 lb down and 30 lb up at 2-3-13, and 93 lb down and 71 lb up at 5-1-13, and 93 lb down and 71 lb up at 5-1-13 on top chord, and 3 lb down and 1 lb up at 2-3-13, 3 lb down and 1 lb up at 2-3-13, and 20 lb down at 5-1-13, and 20 lb down at 5-1-13 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=-13(F=-7, B=-7) 8=3(F=1, B=1) 9=-20(F=-10, B=-10)



June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J5	Jack-Open	2	1	I46485518
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:57 2021 Page 1
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-0-10-8 3-6-15
0-10-8 3-6-15

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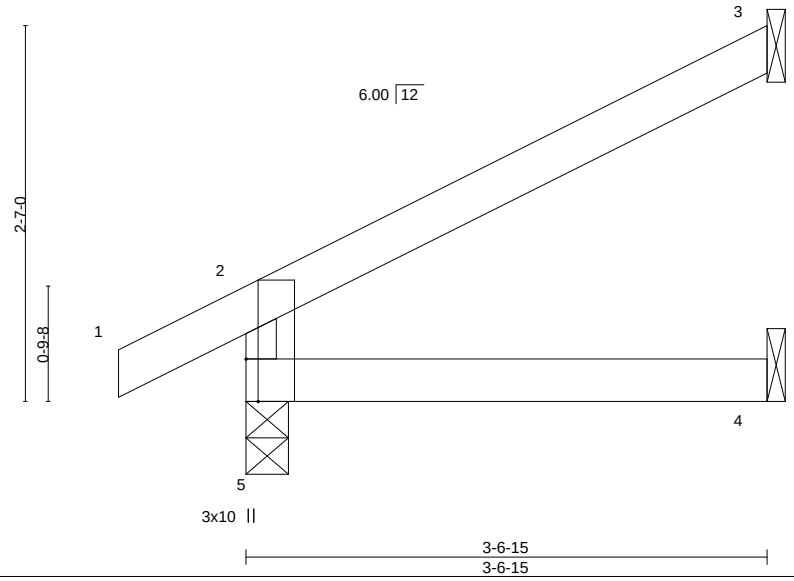

3-6-15
3-6-15

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

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.17	Vert(LL)	-0.01	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.10	Vert(CT)	-0.01	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: 10 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-6-15 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=79(LC 8)
Max Uplift 5=-25(LC 8), 3=-63(LC 8)
Max Grav 5=232(LC 1), 3=106(LC 1), 4=65(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J6	Jack-Open	2	1	I46485519
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:57 2021 Page 1
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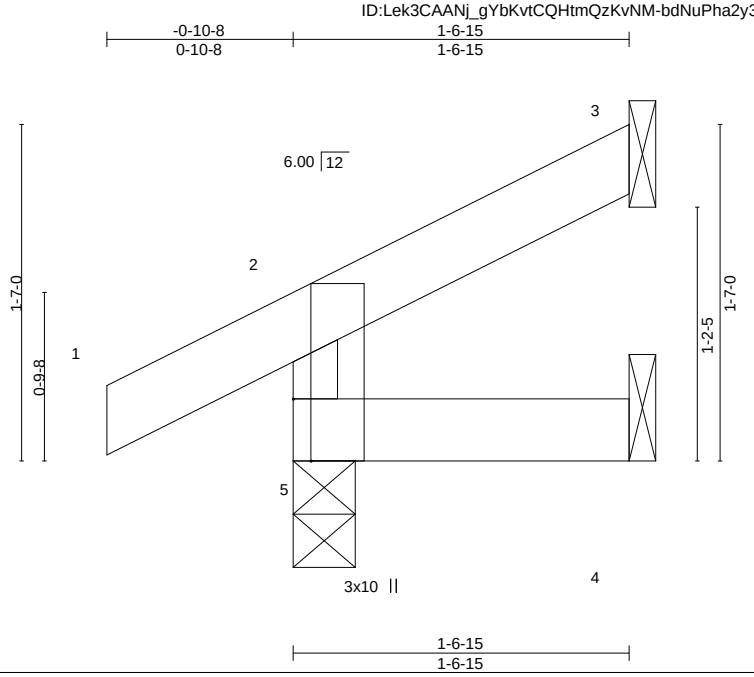

Plate Offsets (X,Y)-- [5:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.02	Vert(CT)	-0.00	5	>999	240		
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-R		Wind(LL)	0.00	5	>999	240	Weight: 5 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 1-6-15 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=39(LC 8)
Max Uplift 5=-22(LC 8), 3=-26(LC 8)
Max Grav 5=157(LC 1), 3=31(LC 1), 4=27(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J7	Jack-Closed	2	1	I46485520
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:58 2021 Page 1
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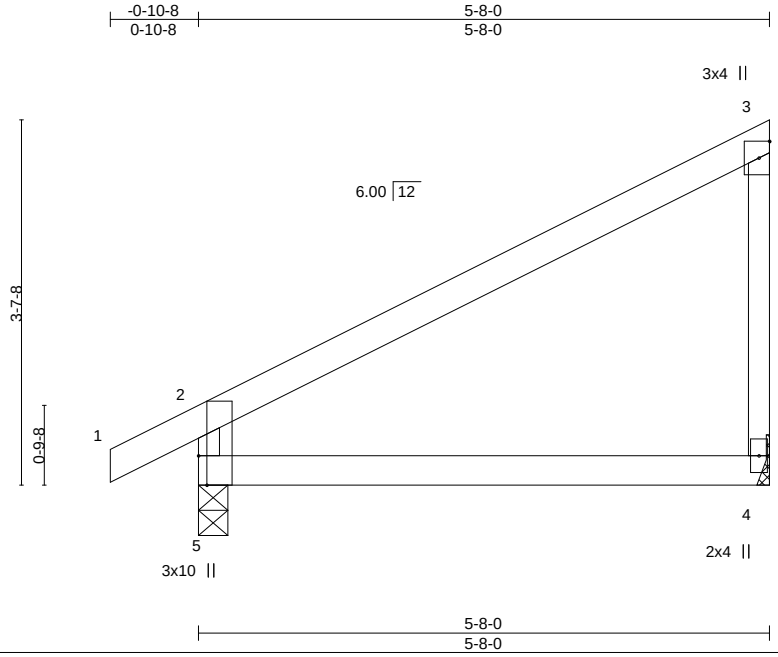

Plate Offsets (X,Y)-- [5:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.43	Vert(LL)	-0.04	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.26	Vert(CT)	-0.08	4-5	>809	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-R		Wind(LL)	0.02	4-5	>999	240	Weight: 18 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-8-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-3-8, 4=Mechanical
Max Horz 5=143(LC 5)
Max Uplift 5=-50(LC 8), 4=-64(LC 8)
Max Grav 5=320(LC 1), 4=239(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-278/94

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, 4.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J8	Diagonal Hip Girder	1	1	I46485521
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:59 2021 Page 1
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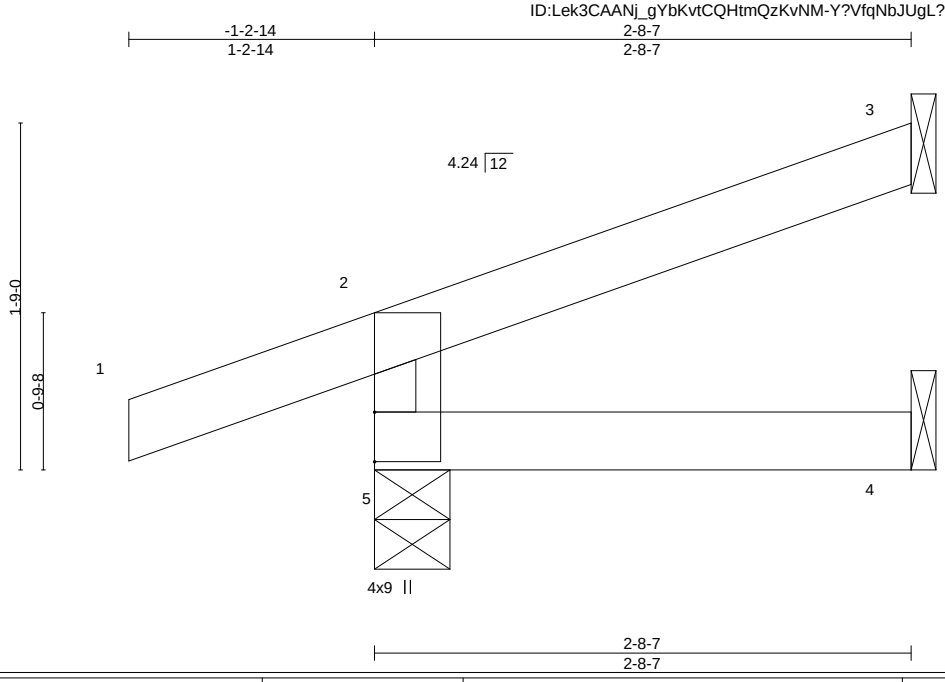

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.12	Vert(LL)	-0.00	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	-0.00	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.00	Horz(CT)	-0.00	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.00	4-5	>999	240	Weight: 8 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-8-7 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-4-9, 3=Mechanical, 4=Mechanical
Max Horz 5=60(LC 7)
Max Uplift 5=-78(LC 6), 3=-68(LC 12), 4=-3(LC 19)
Max Grav 5=113(LC 1), 3=40(LC 26), 4=36(LC 3)

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) 5, 3, 4.
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) 24 lb down and 9 lb up at -1-2-14, and 24 lb down and 9 lb up at -1-2-14, and 44 lb down and 33 lb up at 2-7-11 on top chord, and 10 lb down at 2-7-11 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
Concentrated Loads (lb)
Vert: 1=-36(F=-18, B=-18) 4=-0(F)
Trapezoidal Loads (plf)
Vert: 1=0(F=35, B=35)-to-2=-34(F=18, B=18), 2=-4(F=33, B=33)-to-3=-49(F=10, B=10), 5=-0(F=10, B=10)-to-4=-14(F=3, B=3)

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J9	Jack-Open	1	1	I46485522
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:59 2021 Page 1
ID:Lek3CAANj_gYbKvtCQHtmQzKvNM-Y?VfqNbJUgL?9ad?RwgIsLtZltwfZAYiZ_ORtmz8Hkl

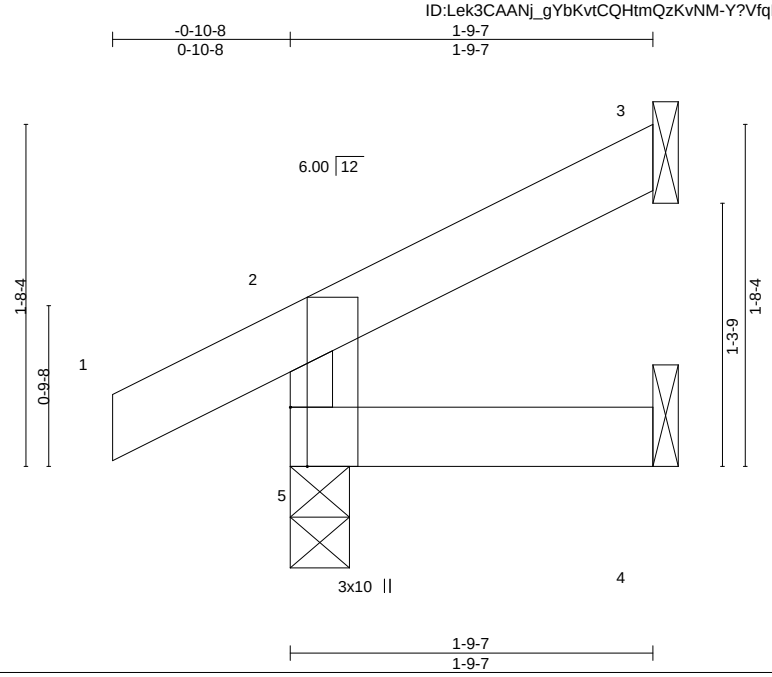

Plate Offsets (X,Y)-- [5:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.02	Vert(CT)	-0.00	5	>999	240		
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-R		Wind(LL)	0.00	5	>999	240	Weight: 6 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 1-9-7 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=44(LC 8)
Max Uplift 5=-22(LC 8), 3=-31(LC 8)
Max Grav 5=164(LC 1), 3=41(LC 1), 4=31(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J10	Diagonal Hip Girder	1	1	I46485523
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:51 2021 Page 1
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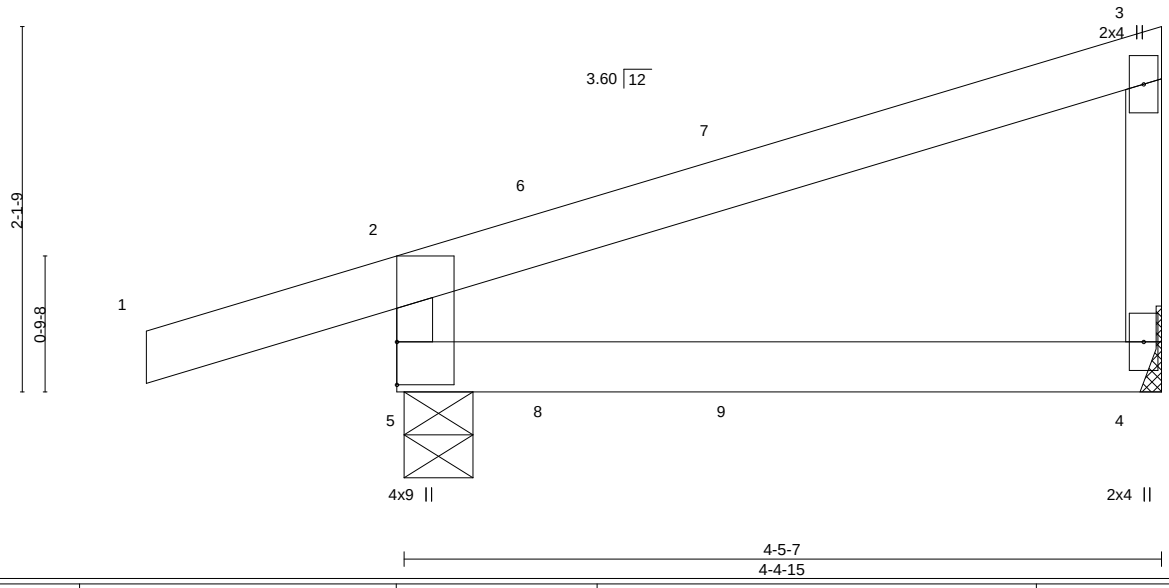

4-5-7 / 4-4-15

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.22	Vert(LL)	-0.01	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.16	Vert(CT)	-0.03	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.00	4-5	>999	240	Weight: 14 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-5-7 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-4-13, 4=Mechanical
Max Horz 5=86(LC 24)
Max Uplift 5=-110(LC 4), 4=-59(LC 8)
Max Grav 5=317(LC 1), 4=242(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-282/136

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=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.
7) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 79 lb down and 11 lb up at 0-11-9, and 61 lb down and 17 lb up at 2-0-6, and 75 lb down and 63 lb up at 4-4-3 on top chord, and 2 lb down and 3 lb up at 0-11-9, and 3 lb down and 6 lb up at 2-0-6, and 33 lb down at 4-4-3 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: 3=-50(B) 4=-23(B) 8=3(B) 9=2(F)

STATE OF MISSOURI
JUAN GARCIA
NUMBER E-2000162101
PROFESSIONAL ENGINEER

JUAN GARCIA
LICENSED
16952
KANSAS
PROFESSIONAL ENGINEER

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J11	Jack-Open	1	1	I46485524
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:52 2021 Page 1
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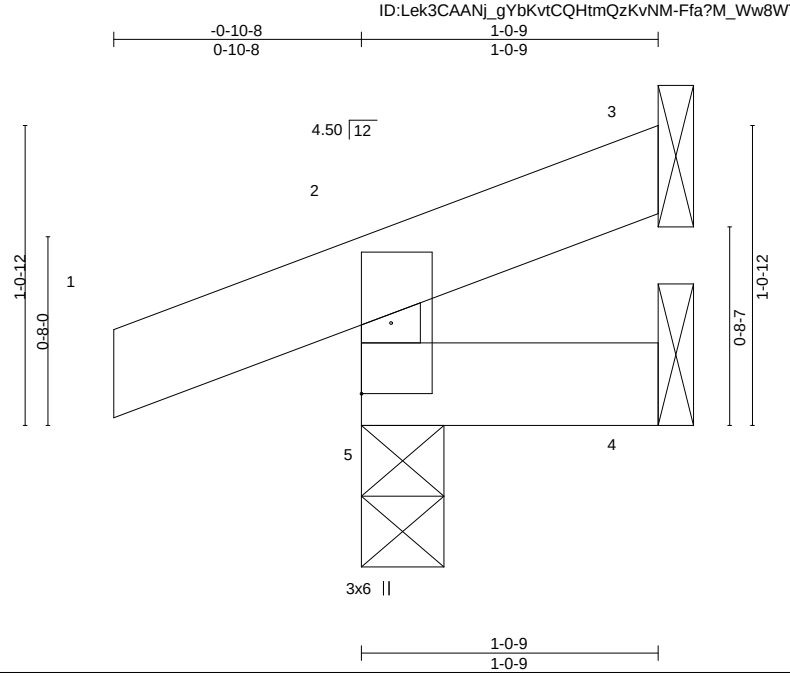

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.06	Vert(LL)	0.00	5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.01	Vert(CT)	-0.00	5	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	-0.00	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.00	5	>999	240	Weight: 4 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 1-0-9 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=27(LC 5)
Max Uplift 5=-55(LC 4), 3=-9(LC 8)
Max Grav 5=146(LC 1), 3=3(LC 19), 4=16(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J12	Jack-Open	6	1	I46485525
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:52 2021 Page 1
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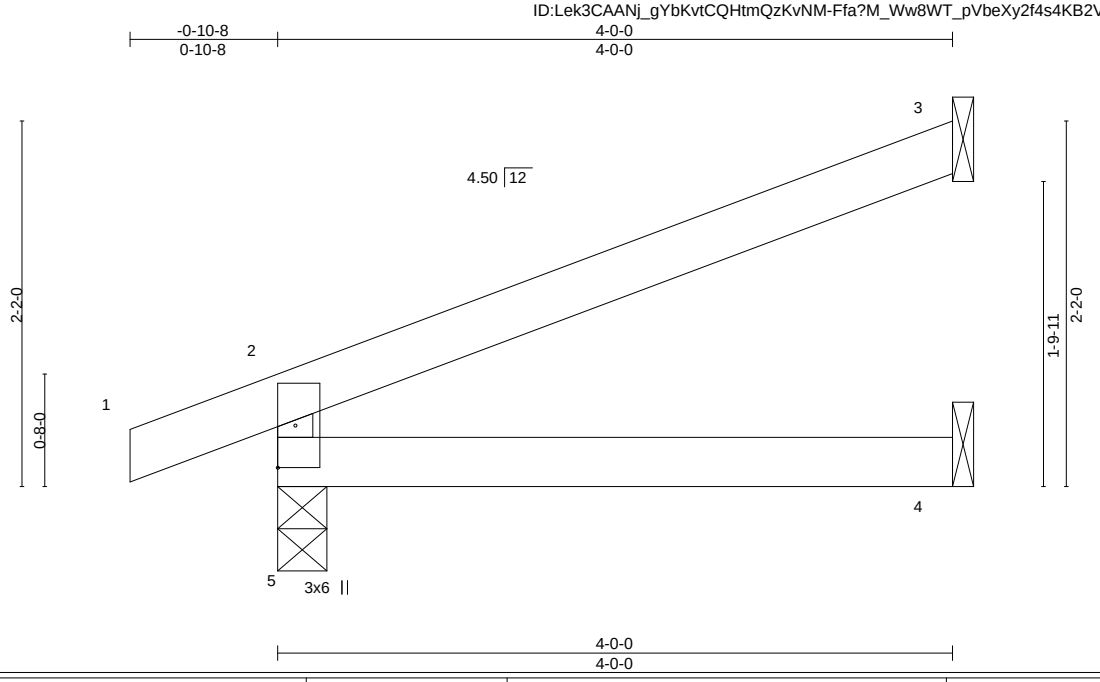

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.21	Vert(LL)	-0.01	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.13	Vert(CT)	-0.02	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.01	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.01	4-5	>999	240	Weight: 11 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 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=68(LC 4)
Max Uplift 5=-55(LC 4), 3=-60(LC 8)
Max Grav 5=250(LC 1), 3=120(LC 1), 4=73(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J13	Jack-Open	1	1	I46485526
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:53 2021 Page 1
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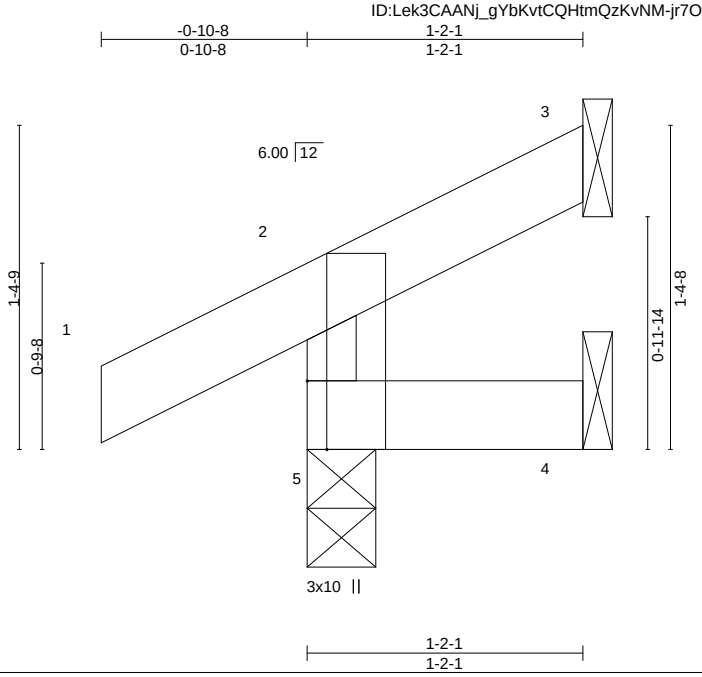

Plate Offsets (X,Y)-- [5:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.01	Vert(CT)	-0.00	5	>999	240		
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-R		Wind(LL)	0.00	5	>999	240	Weight: 4 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 1-2-1 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=34(LC 5)
Max Uplift 5=-23(LC 8), 3=-17(LC 8), 4=-1(LC 5)
Max Grav 5=148(LC 1), 3=11(LC 15), 4=19(LC 3)

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) 5, 3, 4.
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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J16	Jack-Open	1	1	I46485527
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:53 2021 Page 1
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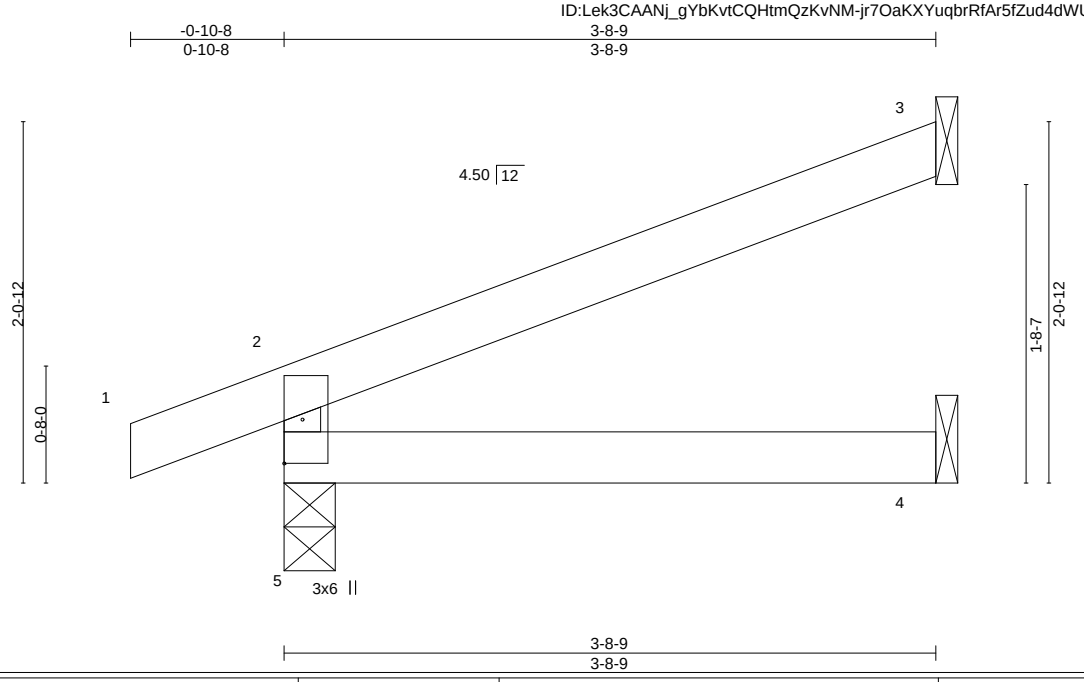

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.18	Vert(LL)	-0.01	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.11	Vert(CT)	-0.02	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.01	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.01	4-5	>999	240	Weight: 10 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-8-9 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=63(LC 4)
Max Uplift 5=-54(LC 4), 3=-55(LC 8)
Max Grav 5=238(LC 1), 3=110(LC 1), 4=67(LC 3)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J17	Diagonal Hip Girder	2	1	I46485528
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:54 2021 Page 1
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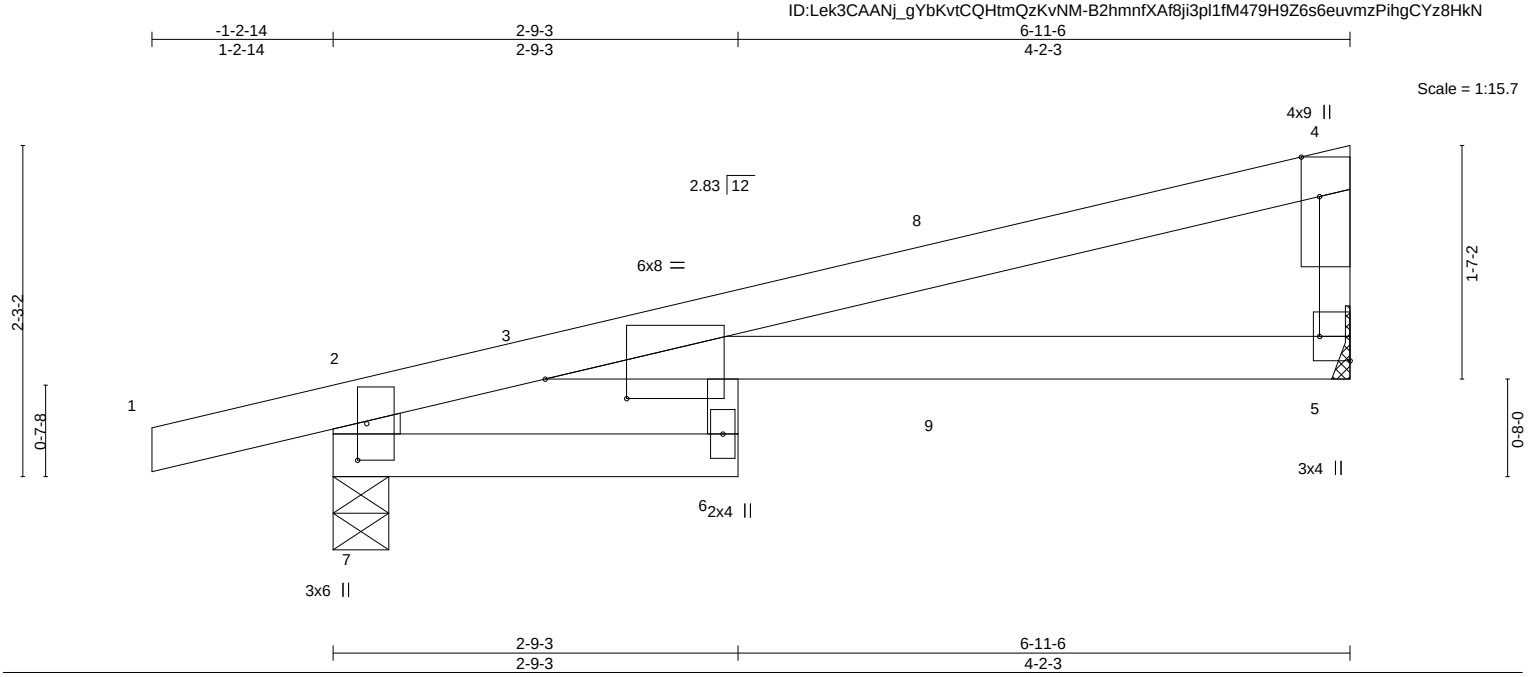

Plate Offsets (X,Y)-- [3:0-6-11,0-1-10], [4:0-3-4,Edge], [5:Edge,0-2-8], [7:0-3-0,0-0-12]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.70	Vert(LL)	-0.17	6	>465	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.46	Vert(CT)	-0.33	6	>242	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.04	Horz(CT)	0.09	5	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.15	6	>519	240	Weight: 20 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2 *Except*
2-7: 2x6 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 7=0-4-9, 5=Mechanical
Max Horz 7=77(LC 5)
Max Uplift 7=-108(LC 4), 5=-54(LC 8)
Max Grav 7=438(LC 1), 5=305(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-7=-417/122

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 (jt=lb) 7=108.
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) 78 lb down and 40 lb up at 4-2-8, and 78 lb down and 40 lb up at 4-2-8 on top chord, and 15 lb down at 4-2-8, and 15 lb down at 4-2-8 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, 2-4=-70, 6-7=-20, 3-5=-20
Concentrated Loads (lb)
Vert: 9=-20(F=-10, B=-10)

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MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J18	Jack-Open	4	1	I46485529
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:55 2021 Page 1
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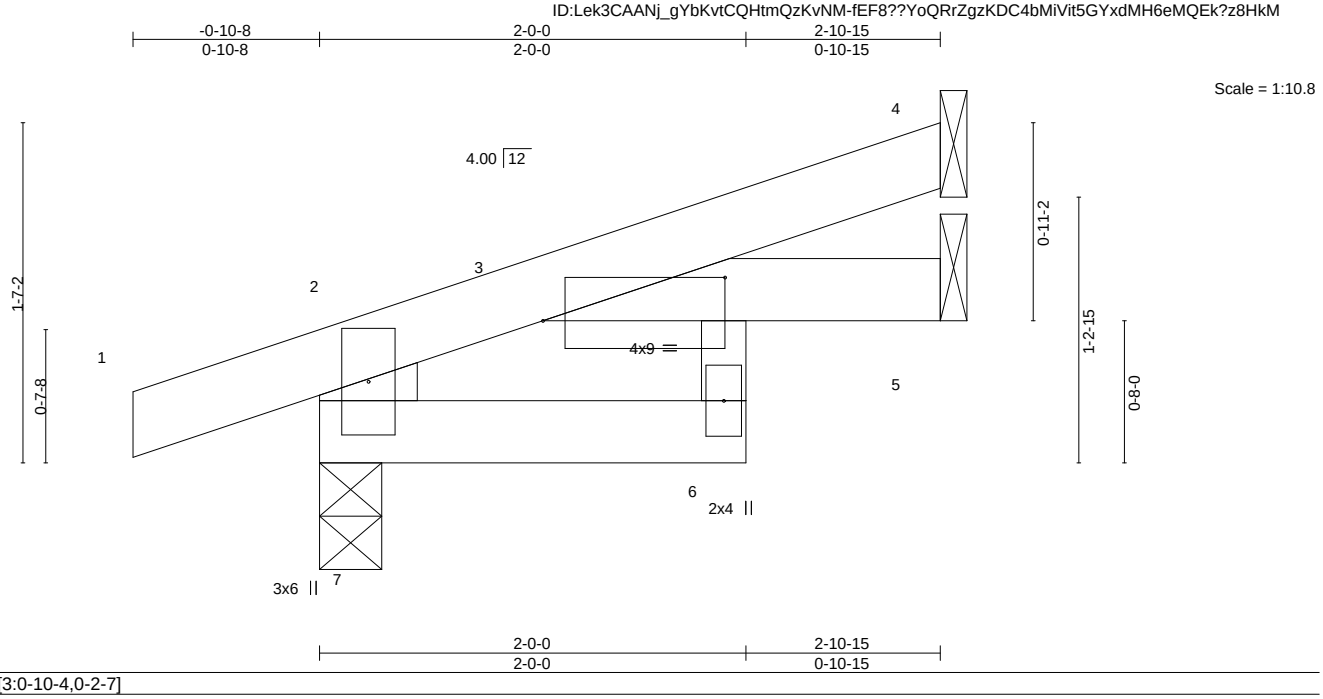


Plate Offsets (X,Y)-- [3:0-10-4,0-2-7]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.11	Vert(LL)	-0.01	6	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.07	Vert(CT)	-0.01	6	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.02	Horz(CT)	0.01	5	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P		Wind(LL)	0.01	6	>999	240	Weight: 10 lb	FT = 10%

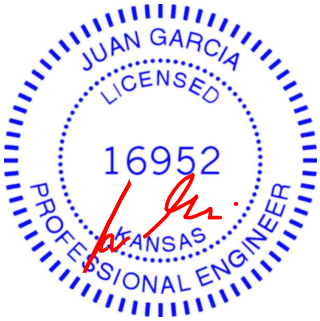
LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x6 SPF No.2 *Except*
3-6: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-10-15 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 7=0-3-8, 4=Mechanical, 5=Mechanical
Max Horz 7=49(LC 4)
Max Uplift 7=-61(LC 4), 4=-27(LC 8)
Max Grav 7=221(LC 1), 4=71(LC 1), 5=53(LC 3)

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) 7, 4.
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.



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16023 Swingley Ridge Rd
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Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	J19	Jack-Open	3	1	I46485530
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:40:55 2021 Page 1
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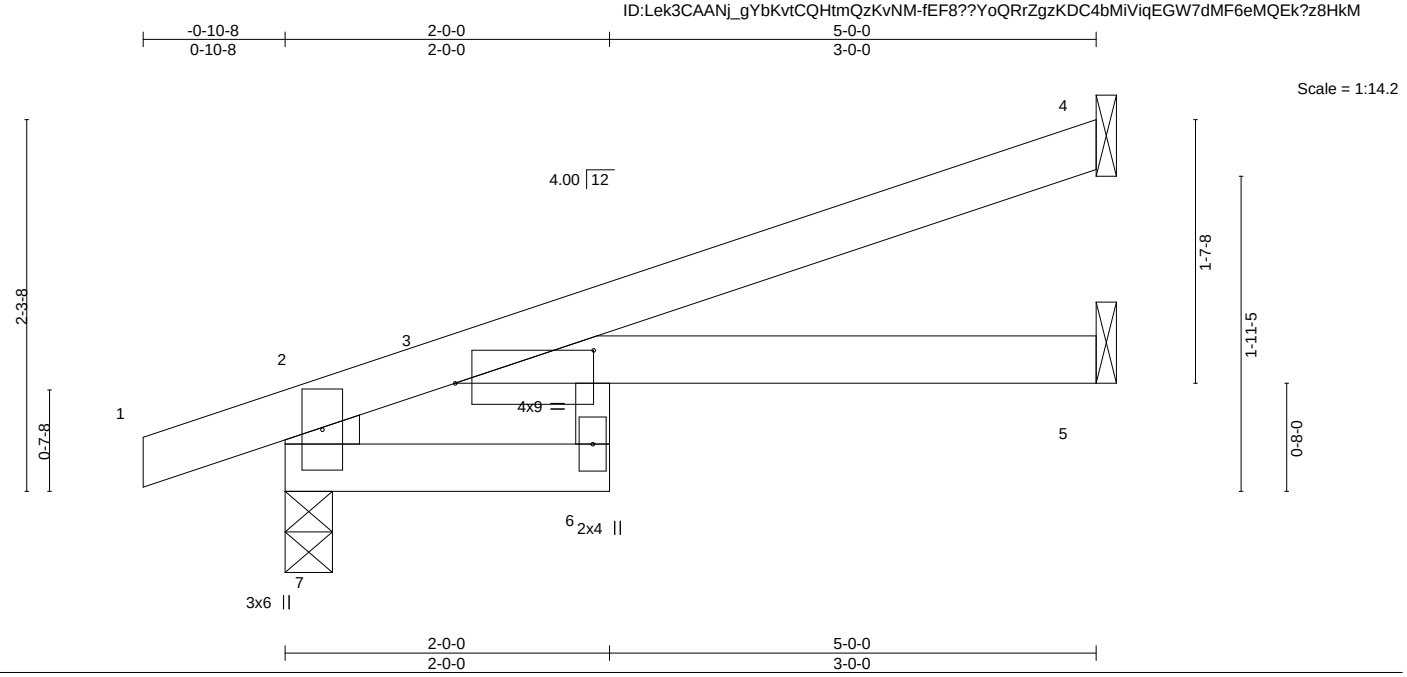


Plate Offsets (X,Y)-- [3:0-10-4,0-2-7]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.29	Vert(LL)	-0.04	6	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.25	Vert(CT)	-0.07	6	>763	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.02	Horz(CT)	0.03	5	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P		Wind(LL)	0.04	6	>999	240	Weight: 15 lb	FT = 10%

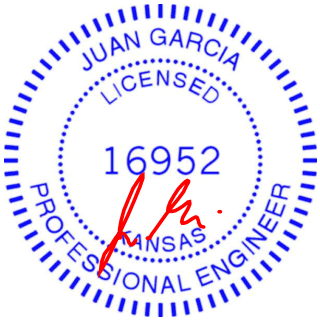
LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x6 SPF No.2 *Except*
3-6: 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 7=0-3-8, 4=Mechanical, 5=Mechanical
Max Horz 7=77(LC 4)
Max Uplift 7=-67(LC 4), 4=-58(LC 8)
Max Grav 7=311(LC 1), 4=139(LC 1), 5=89(LC 3)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-7=-296/82

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) 7, 4.
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.



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16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	K1	Common Supported Gable	1	1	I46485531
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:00 2021 Page 1
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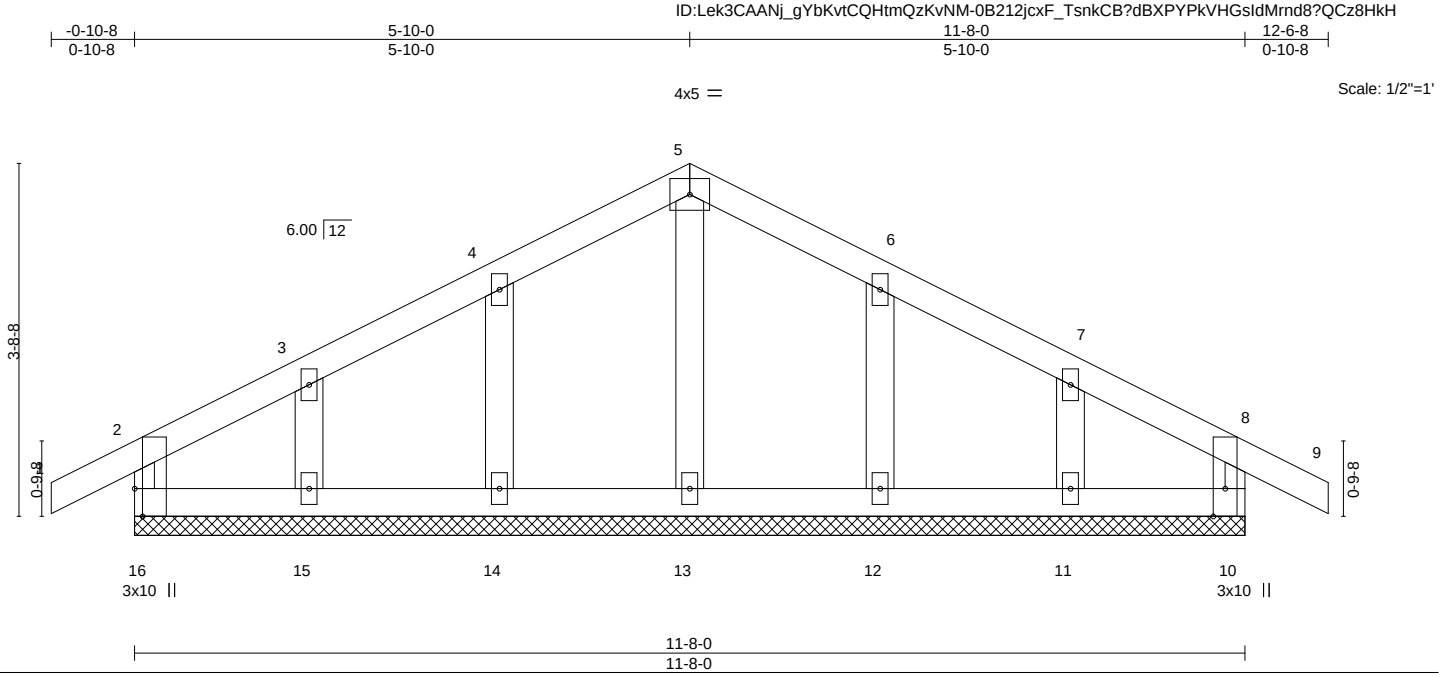

Plate Offsets (X,Y)-- [16:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	9	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.02	Vert(CT)	-0.00	9	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	0.00	10	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 42 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 11-8-0.
(lb) - Max Horz 16=-64(LC 6)
Max Uplift All uplift 100 lb or less at joint(s) 16, 10, 14, 15, 12, 11
Max Grav All reactions 250 lb or less at joint(s) 16, 10, 13, 14, 15, 12, 11

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) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) 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) 16, 10, 14, 15, 12, 11.
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.

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Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	K2	Common Girder	1	2	I46485532
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:01 2021 Page 1
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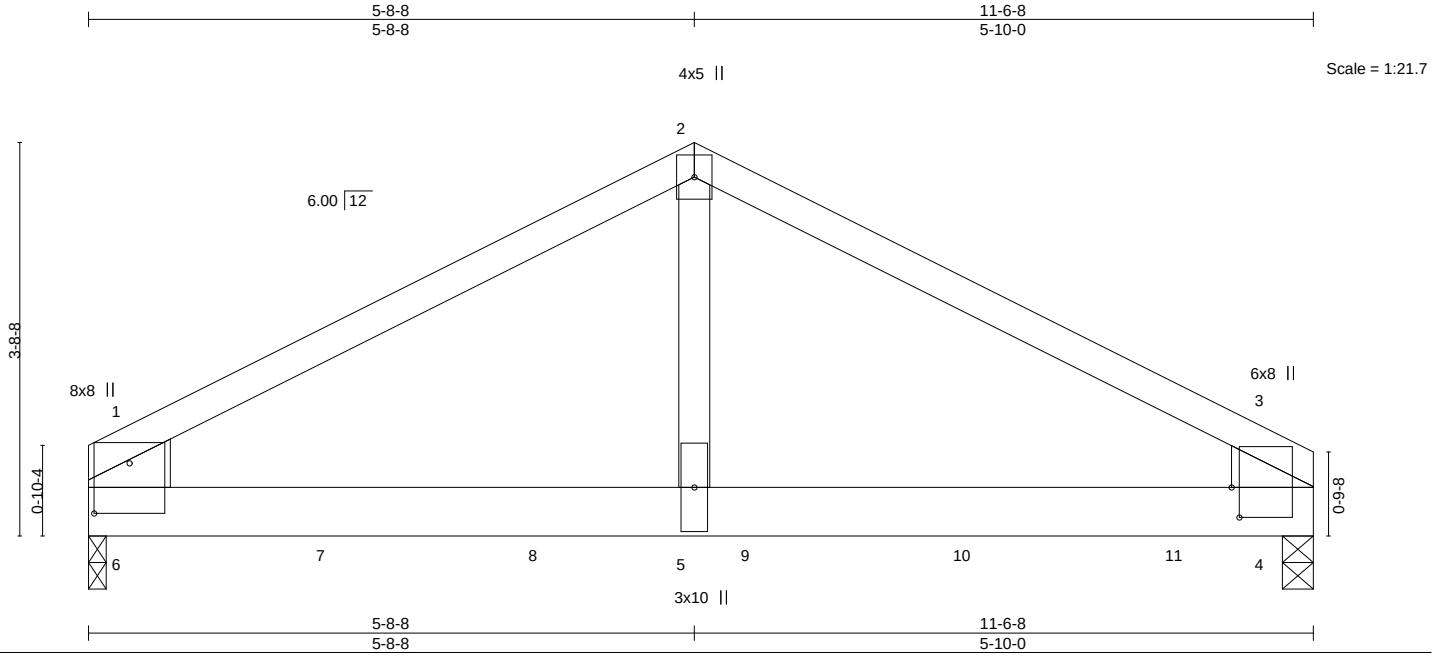


Plate Offsets (X,Y)-- [1:0-5-11,0-4-0], [3:0-3-6,0-0-14]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.39	Vert(LL)	-0.07	4-5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.51	Vert(CT)	-0.12	4-5	>999	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.38	Horz(CT)	0.01	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.03	5-6	>999	240	Weight: 97 lb	FT = 10%

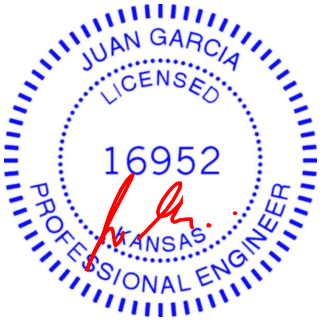
LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SP 2400F 2.0E
WEBS 2x10 SP DSS *Except*
2-5: 2x4 SPF No.2

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.

REACTIONS. (size) 6=0-2-0, 4=0-3-8
Max Horz 6=-59(LC 27)
Max Uplift 6=-381(LC 8), 4=-148(LC 9)
Max Grav 6=4504(LC 1), 4=3884(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-3852/203, 2-3=-3849/202, 1-6=-1911/152, 3-4=-1904/156
BOT CHORD 5-6=-125/3352, 4-5=-125/3352
WEBS 2-5=-54/3081

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, 2x10 - 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) 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) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 6.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 6=381, 4=148.
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.
10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1242 lb down and 162 lb up at 0-1-4, 1234 lb down and 170 lb up at 2-3-12, 1236 lb down and 31 lb up at 4-3-12, 1236 lb down and 31 lb up at 6-3-12, and 1236 lb down and 31 lb up at 8-3-12, and 1236 lb down and 31 lb up at 10-3-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.



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LOAD CASE(S) Standard

Continued on page 2

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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, 4-6=-20
   Concentrated Loads (lb)
   Vert: 6=-1242(B) 7=-1234(B) 8=-1236(B) 9=-1236(B) 10=-1236(B) 11=-1236(B)

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	L1	Common Supported Gable	1	1	I46485533
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:02 2021 Page 1
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-0-10-8 4-4-0 8-8-0 9-6-8
0-10-8 4-4-0 4-4-0 0-10-8

Scale = 1:20.3

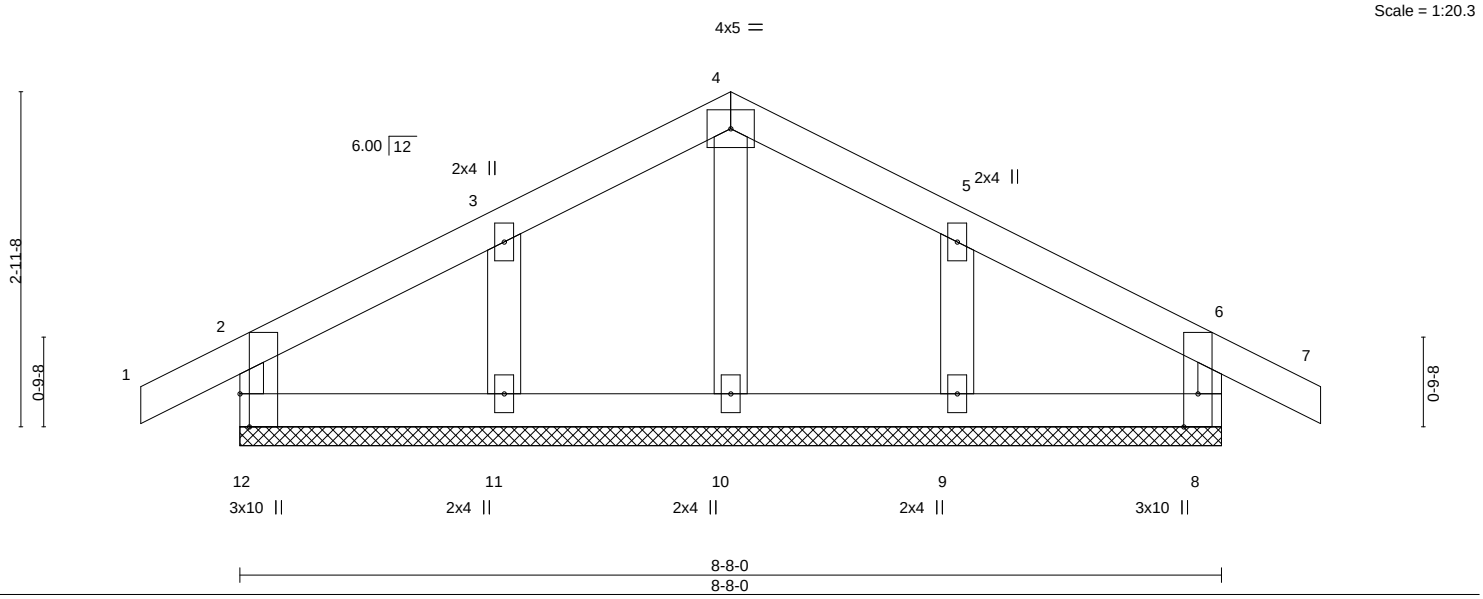

Plate Offsets (X,Y)-- [12:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	-0.00	7	n/r	120	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	-0.00	7	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.02	Horz(CT)	0.00	8	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R							Weight: 30 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 8-8-0.
(lb) - Max Horz 12=-54(LC 6)
Max Uplift All uplift 100 lb or less at joint(s) 12, 8, 11, 9
Max Grav All reactions 250 lb or less at joint(s) 12, 8, 10, 11, 9

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) Gable requires continuous bottom chord bearing.
5) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
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) 12, 8, 11, 9.
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.

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Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	L2	Common	3	1	I46485534
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:02 2021 Page 1
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-0-10-8 4-4-0 8-8-0 9-6-8
0-10-8 4-4-0 4-4-0 0-10-8

Scale = 1:20.7

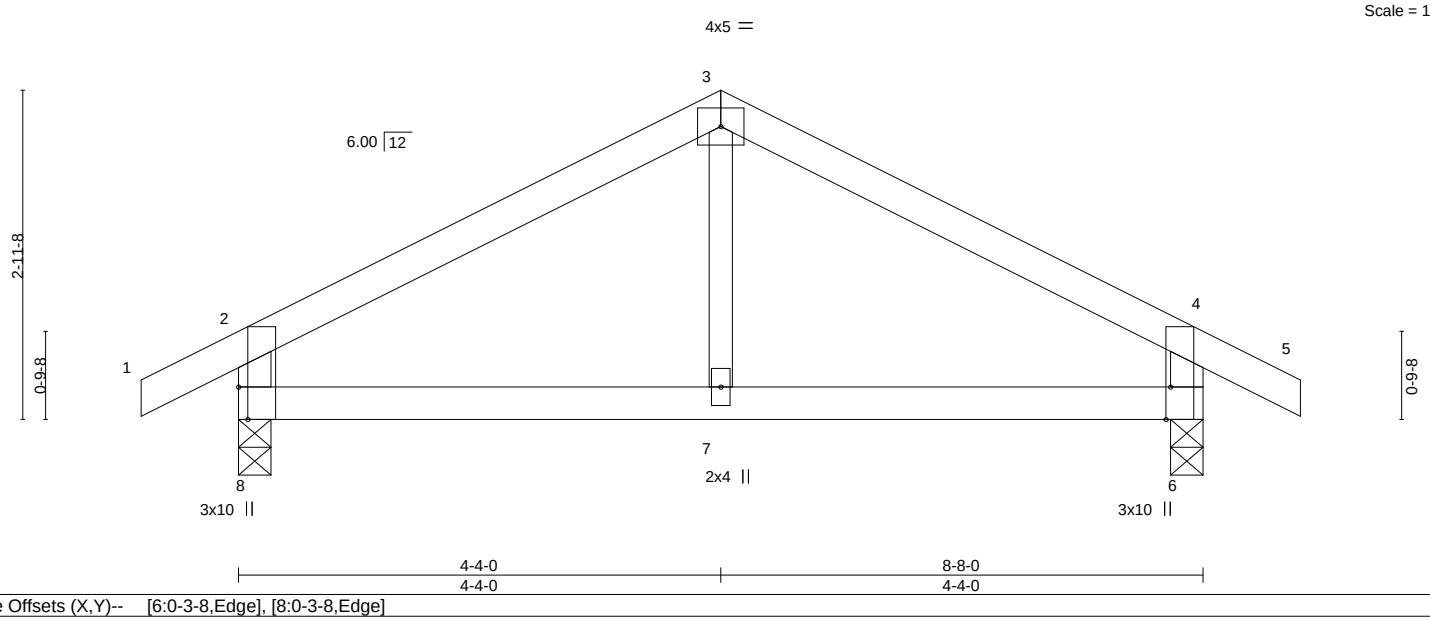

Plate Offsets (X,Y)-- [6:0-3-8,Edge], [8:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.27	Vert(LL)	-0.01	7	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.15	Vert(CT)	-0.02	7-8	>999	240		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.05	Horz(CT)	0.00	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.00	7-8	>999	240	Weight: 26 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except*
3-7: 2x3 SPF No.2

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.

REACTIONS. (size) 8=0-3-8, 6=0-3-8
Max Horz 8=-55(LC 6)
Max Uplift 8=-70(LC 8), 6=-70(LC 9)
Max Grav 8=448(LC 1), 6=448(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-412/64, 3-4=-412/64, 2-8=-396/99, 4-6=-396/99
BOT CHORD 7-8=-4/299, 6-7=-4/299

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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	L3	Common Girder	1	2	I46485535
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:03 2021 Page 1
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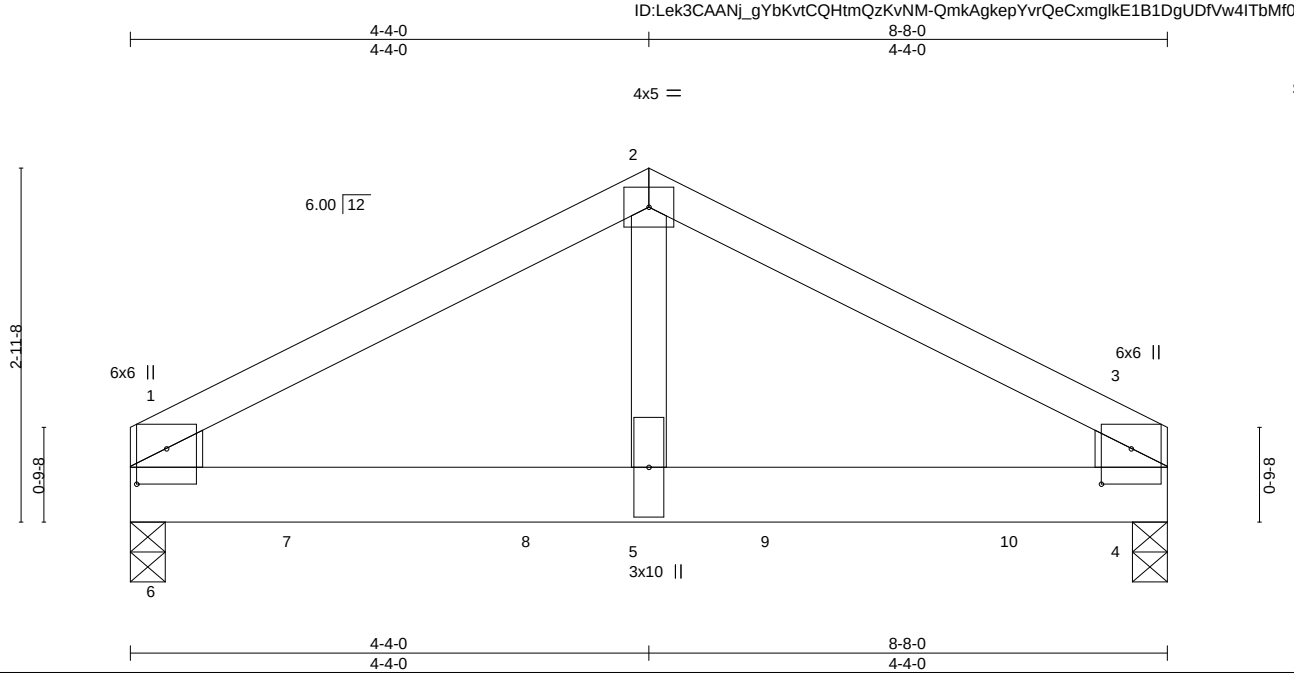

Plate Offsets (X,Y)-- [1:0-3-9,0-3-0], [3:0-3-9,0-3-0]

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.20	Vert(LL)	-0.03	5	>999	360	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.34	Vert(CT)	-0.05	5	>999	240		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.29	Horz(CT)	0.01	4	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-R		Wind(LL)	0.01	5	>999	240	Weight: 72 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SP 2400F 2.0E
WEBS 2x8 SP DSS *Except*
2-5: 2x4 SPF No.2

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.

REACTIONS. (size) 6=0-3-8, 4=0-3-8
Max Horz 6=-47(LC 25)
Max Uplift 6=-97(LC 8), 4=-100(LC 9)
Max Grav 6=2879(LC 1), 4=3019(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-2883/115, 2-3=-2883/114, 1-6=-1435/98, 3-4=-1435/98
BOT CHORD 5-6=-59/2506, 4-5=-59/2506
WEBS 2-5=-10/2325

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, 2x8 - 2 rows staggered at 0-9-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-7-0 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6 except (jt=lb) 4=100.
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) 1289 lb down and 35 lb up at 1-5-4, 1289 lb down and 35 lb up at 3-5-4, and 1297 lb down and 36 lb up at 5-5-4, and 1297 lb down and 36 lb up at 7-5-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

June 9,2021

Continued on page 2

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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, 4-6=-20
   Concentrated Loads (lb)
   Vert: 7=-1289(B) 8=-1289(B) 9=-1297(B) 10=-1297(B)

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	LAY2	GABLE	1	1	I46485536
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:05 2021 Page 1
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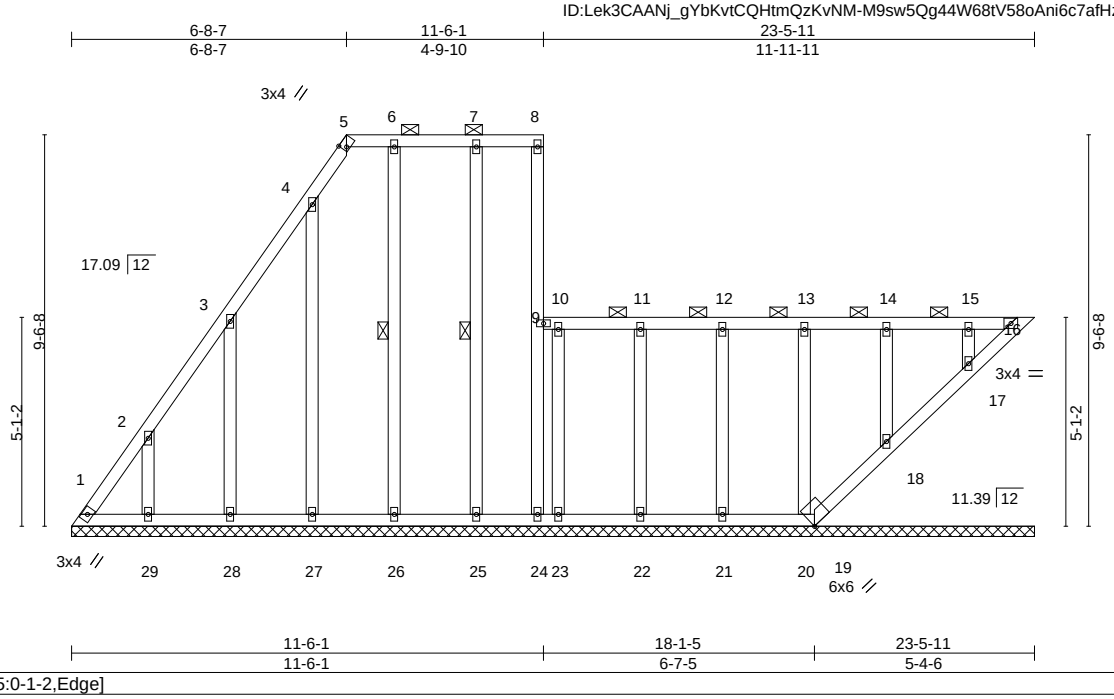

Plate Offsets (X,Y)-- [5:0-1-2,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.10	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.23	Horz(CT)	-0.01	16	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-S							Weight: 133 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 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, and 2-0-0 oc purlins (6-0-0 max.): 5-8, 9-24, 9-16.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 17-18,16-17.
WEBS 1 Row at midpt 6-26, 7-25

REACTIONS. All bearings 23-5-11.
(lb) - Max Horz 1=559(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 24, 19, 26, 25, 23, 22, 21, 20, 18, 17 except 1=-256(LC 6), 16=-104(LC 8), 29=-200(LC 8), 28=-190(LC 8), 27=-243(LC 8)
Max Grav All reactions 250 lb or less at joint(s) 24, 16, 19, 29, 28, 26, 25, 23, 22, 21, 20, 18, 17 except 1=588(LC 8), 27=253(LC 15)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-729/366, 2-3=-539/283, 3-4=-342/198
WEBS 4-27=-213/266

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) Provide adequate drainage to prevent water ponding.
4) All plates are 2x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
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) 24, 19, 26, 25, 23, 22, 21, 20, 18, 17 except (jt=lb) 1=256, 16=104, 29=200, 28=190, 27=243.
9) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 16, 18, 17.
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.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	LAY3	GABLE	1	1	I46485537
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:05 2021 Page 1
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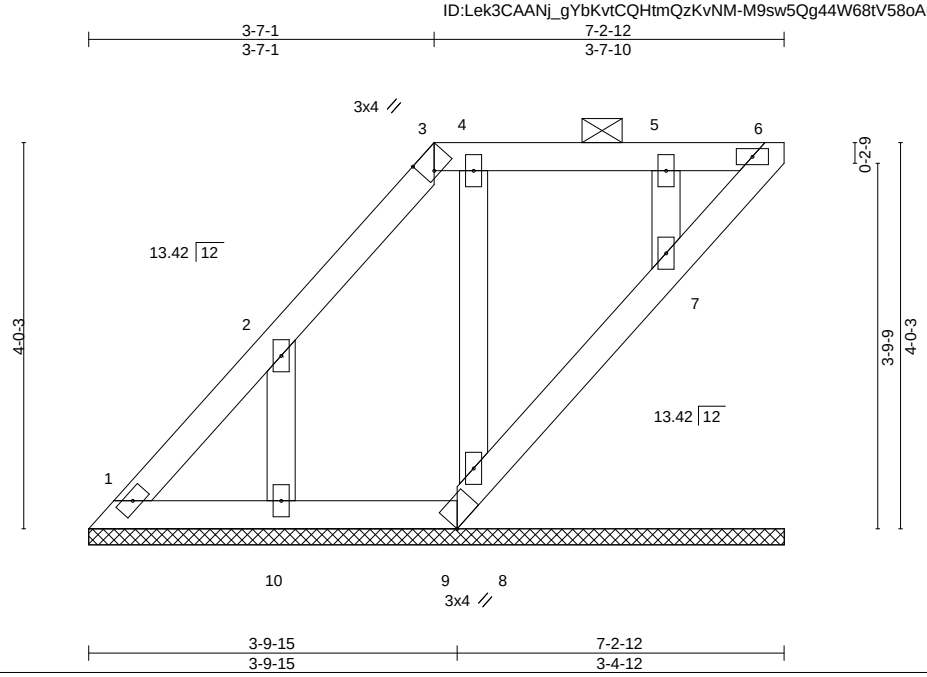

Plate Offsets (X,Y)-- [3:0-1-6,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.04	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	-0.00	6	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P							Weight: 27 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except 2-0-0 oc purlins (6-0-0 max.): 3-6.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing, Except: 10-0-0 oc bracing: 8-9.

REACTIONS. All bearings 7-2-12.
(lb) - Max Horz 1=152(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 6, 9, 8, 7 except 10=-137(LC 8)
Max Grav All reactions 250 lb or less at joint(s) 1, 6, 9, 10, 8, 7

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) Provide adequate drainage to prevent water ponding.
4) All plates are 2x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
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) 6, 9, 8, 7 except (jt=lb) 10=137.
9) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 6, 8, 7.
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.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	V1	Valley	1	1	I46485538
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:06 2021 Page 1
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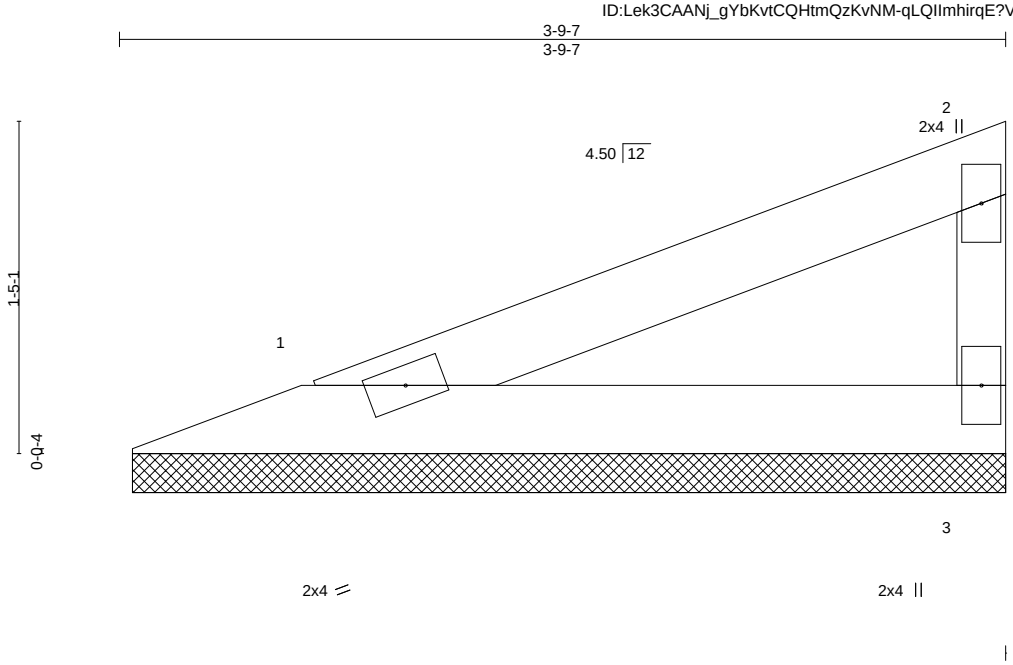

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.14	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.08	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	-0.00	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P							Weight: 9 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x3 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-9-7 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=3-8-13, 3=3-8-13
Max Horz 1=48(LC 5)
Max Uplift 1=-20(LC 8), 3=-28(LC 8)
Max Grav 1=128(LC 1), 3=128(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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	V2	Valley	1	1	I46485539
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:07 2021 Page 1
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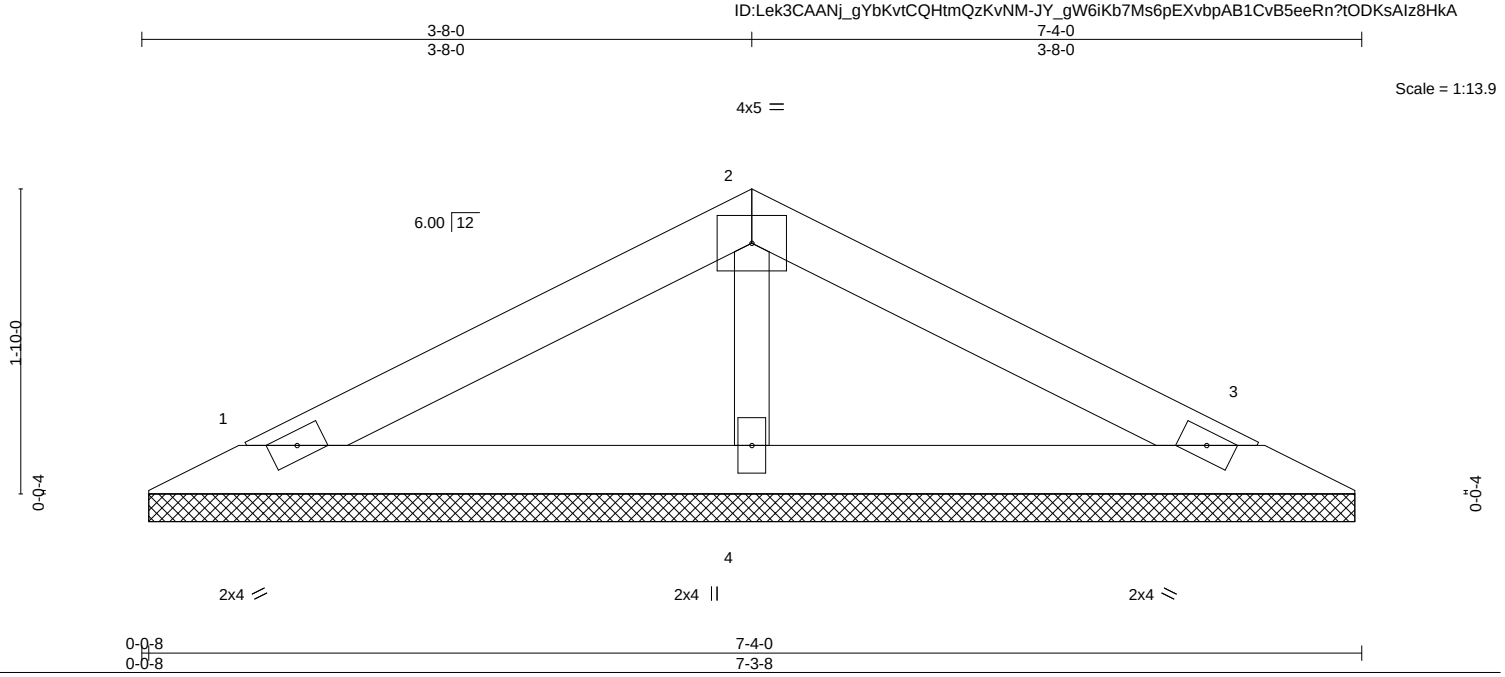

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.16	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.08	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	0.00	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P							Weight: 17 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
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=7-3-0, 3=7-3-0, 4=7-3-0
Max Horz 1=27(LC 12)
Max Uplift 1=-33(LC 8), 3=-37(LC 9), 4=-3(LC 8)
Max Grav 1=143(LC 1), 3=143(LC 1), 4=261(LC 1)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	V3	Valley	1	1	I46485540
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:07 2021 Page 1
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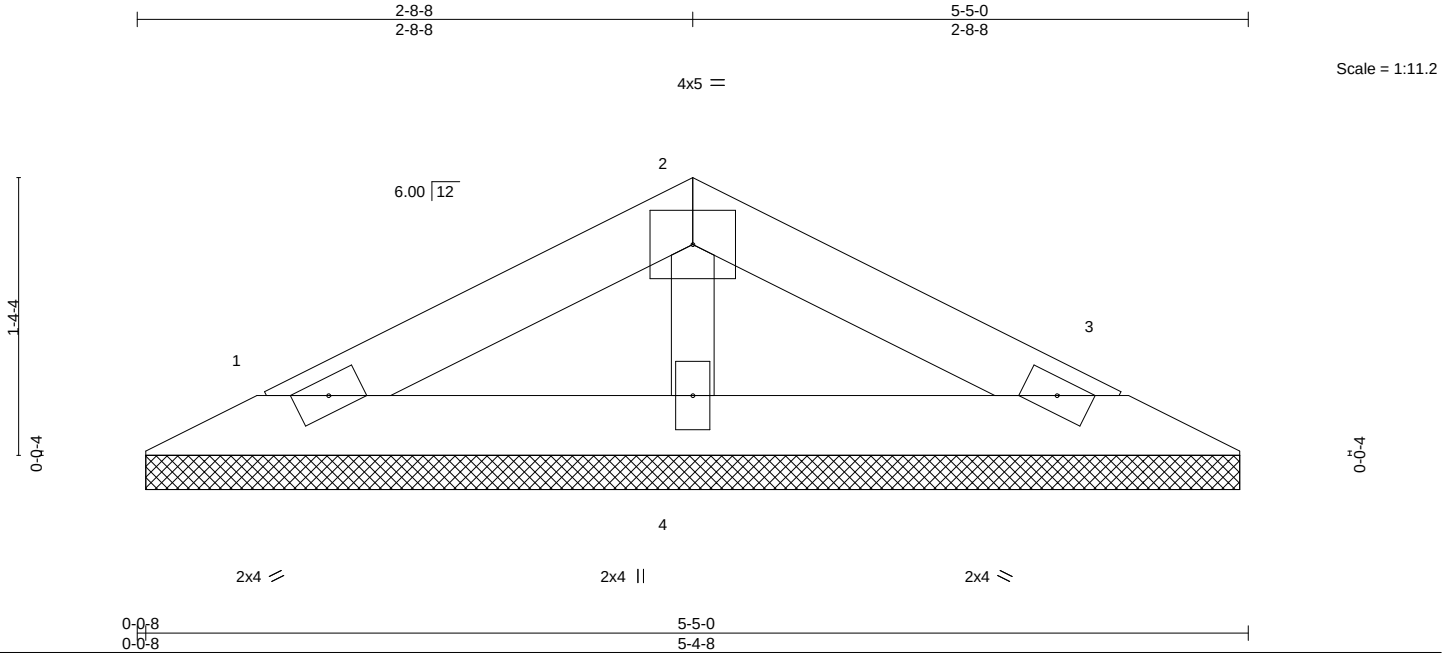

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.02	Horz(CT)	0.00	3	n/a	n/a		
BCDL	10.0	Code IRC2018/TPI2014		Matrix-P							Weight: 12 lb	FT = 10%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x3 SPF No.2

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

REACTIONS. (size) 1=5-4-0, 3=5-4-0, 4=5-4-0
Max Horz 1=-18(LC 13)
Max Uplift 1=-22(LC 8), 3=-26(LC 9), 4=-2(LC 8)
Max Grav 1=98(LC 1), 3=98(LC 1), 4=179(LC 1)

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) 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.

June 9,2021

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Lot 141 HT
210459	V4	Valley	1	1	I46485541
					Job Reference (optional)

Wheeler Lumber, Waverly, KS - 66871, 8.430 s May 12 2021 MiTek Industries, Inc. Tue Jun 8 16:41:08 2021 Page 1
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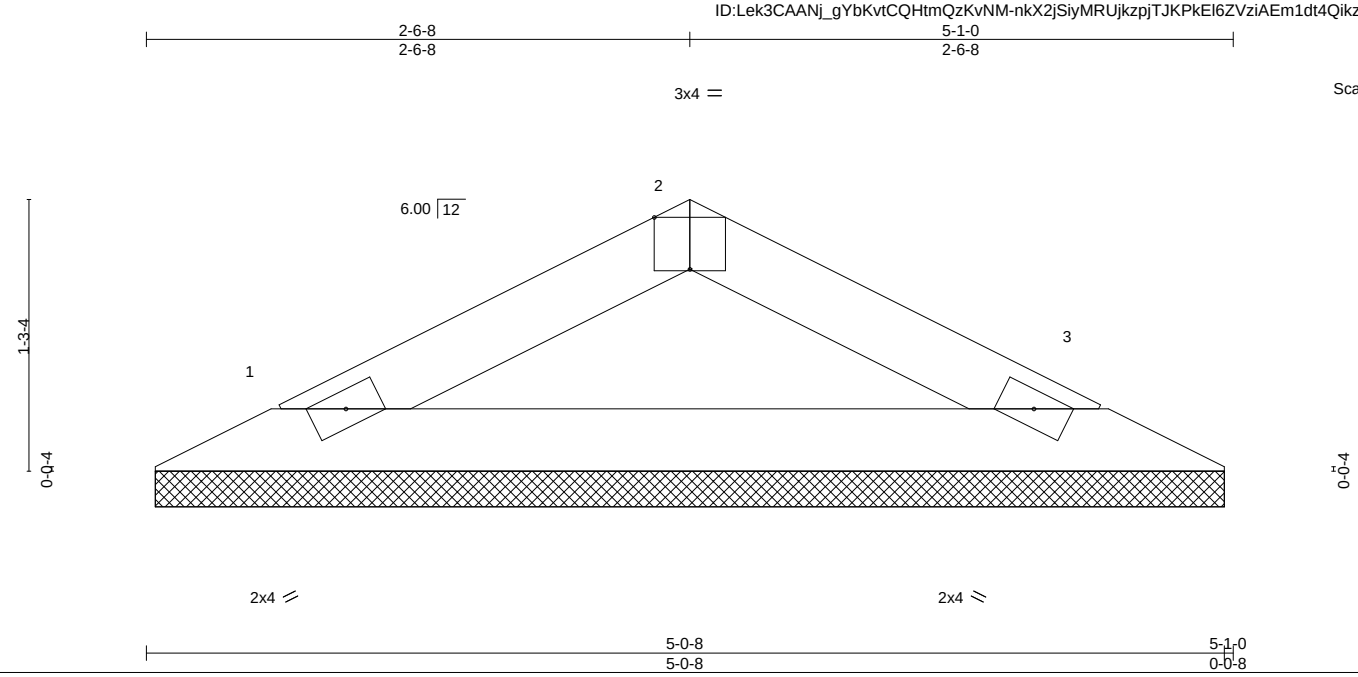


Plate Offsets (X,Y)-- [2:0-2-0,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	25.0	Plate Grip DOL	1.15	TC	0.06	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL	10.0	Lumber DOL	1.15	BC	0.15	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: 11 lb	FT = 10%

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

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-1-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=5-0-0, 3=5-0-0
Max Horz 1=17(LC 8)
Max Uplift 1=-22(LC 8), 3=-22(LC 9)
Max Grav 1=172(LC 1), 3=172(LC 1)

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

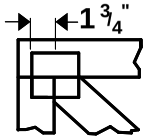
NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
3) 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.

June 9,2021

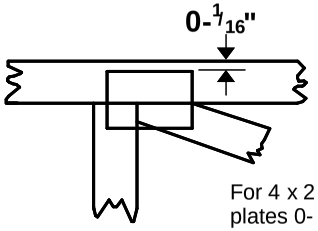
MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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.

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

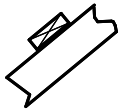
*** Plate location details available in MiTek 20/20 software or upon request.**

PLATE SIZE

4 x 4

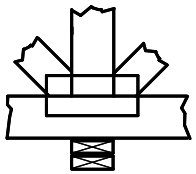
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

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

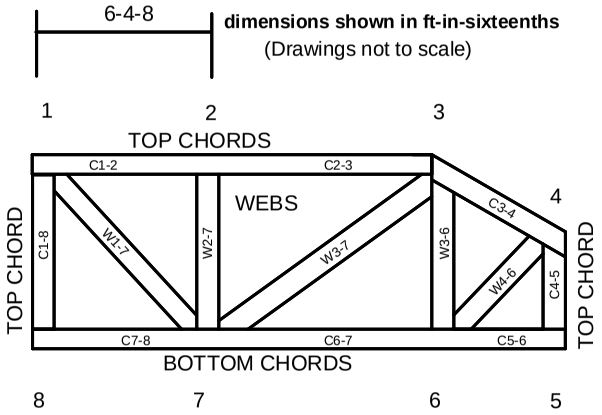


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

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.

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

General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI.
2. 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.
3. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
4. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
5. Cut members to bear tightly against each other.
6. 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.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
8. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
9. Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.
10. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
11. Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
12. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
13. Top chords must be sheathed or purlins provided at spacing indicated on design.
14. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
15. Connections not shown are the responsibility of others.
16. Do not cut or alter truss member or plate without prior approval of an engineer.
17. Install and load vertically unless indicated otherwise.
18. Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
19. 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.