



MiTek USA, Inc.

16023 Swingley Ridge Rd
Chesterfield, MO 63017
314-434-1200

Re: 2544696
Summit/17 Woodside

The truss drawing(s) referenced below have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Builders FirstSource (Valley Center).

Pages or sheets covered by this seal: I43733203 thru I43733290

My license renewal date for the state of Missouri is December 31, 2021.

Missouri COA: Engineering 001193



November 23, 2020

Johnson, Andrew ,Engineer

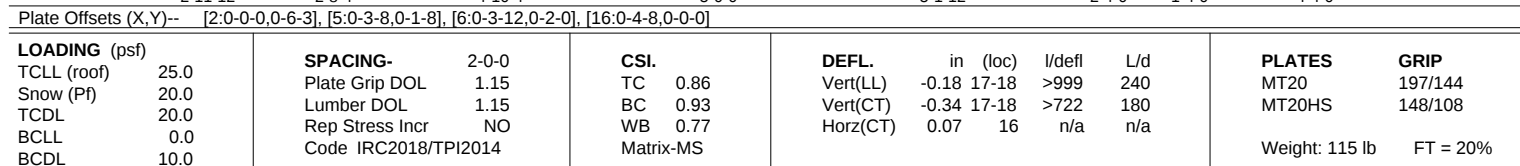
IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek or TRENCO. Any project specific information included is for MiTek's or TRENCO's customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek or TRENCO 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.

Builders FirstSource (Valley Center), Valley Center, KS - 67147, 8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:36 2020 Page 1

ID:wH4RYhEsTNeUP2dxOf1sYQY8e-ep0GXOSgPgMORJMX0_Y8D?RWmvXsYeh_5cDztNjGLgb

Task ID	Start Date	End Date	Duration
0-10-8	2-11-12	5-8-0	10-6-4
15-6-4	20-8-0	23-0-0	24-4-0
28-6-8	29-6-8		

Scale = 1:52.1



REACTIONS. (size) 2=0-4-0, 11=0-4-0, 16=0-4-0
 Max Horz 2=24(LC 16)
 Max Uplift 2=-151(LC 8), 11=-65(LC 9), 16=-233(LC 9)
 Max Grav 2=1881(LC 37), 11=652(LC 37), 16=3130(LC 36)

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

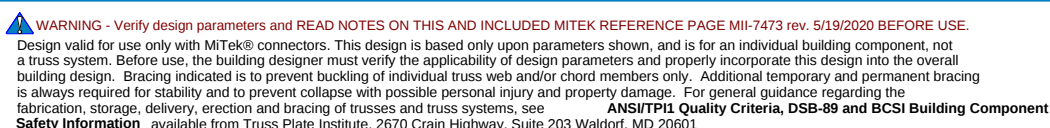
TOP CHORD	2-3=-3343/259, 3-4=-3293/258, 4-5=-3935/304, 5-6=-2595/197, 6-8=-89/1571, 8-9=-9/324, 9-10=-49/331, 10-11=-819/103
BOT CHORD	2-21=-222/3040, 19-21=-222/3040, 18-19=-208/3103, 17-18=-258/3930, 15-16=-2999/265, 8-15=-1366/162, 14-15=-1689/168, 13-14=-50/615, 11-13=-62/767
WEBS	4-19=0/348, 4-18=-68/920, 5-17=-1479/118, 6-17=0/398, 8-14=-125/1705, 10-14=-1064/107, 10-13=-40/602, 15-17=-182/2678, 6-15=-4229/299

- 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=4.2psf; h=20ft; 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) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - 4) Unbalanced snow loads have been considered for this design.
 - 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - 6) Provide adequate drainage to prevent water ponding.
 - 7) All plates are MT20 plates unless otherwise indicated.
 - 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 9) Bearing at joint(s) 11, 16 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
 - 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11 except (jt=lb) 2=151, 16=233.
 - 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
 - 12) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

Continued on page 2



November 23, 2020



Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	A01	Hip Girder	1	1	I43733203
Job Reference (optional)					

- NOTES-**
- 13) Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent at 2-4-0 from the left end to connect truss(es) to back face of bottom chord.
 - 14) Fill all nail holes where hanger is in contact with lumber.
 - 15) "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
 - 16) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 284 lb down and 44 lb up at 26-4-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
 - 17) 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 + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-4=-80, 4-9=-80, 9-12=-80, 16-22=-20, 13-15=-20, 13-25=-20

Concentrated Loads (lb)

Vert: 8=-107(B) 13=-170(B) 18=-44(B) 5=-107(B) 16=-44(B) 28=-107(B) 29=-107(B) 30=-107(B) 32=-107(B) 34=-107(B) 35=-107(B) 36=-37(B) 37=-237(B) 38=-185(B) 39=-44(B) 40=-44(B) 41=-44(B) 42=-44(B) 43=-44(B) 44=-44(B) 45=-99(B) 46=-284(B)

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733204
2544696	A02	Hip	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:38 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-ac80y4UwxldkgcWw7PbclQWsdil60cgHYwi3yGyGLgZ

0-10-8	4-3-12	8-4-0	14-4-0	20-4-0	20-8-0	24-4-0	28-8-0	29-6-8
0-10-8	4-3-12	4-0-4	6-0-0	6-0-0	0-4-0	3-8-0	4-4-0	0-10-8

Scale = 1:51.2

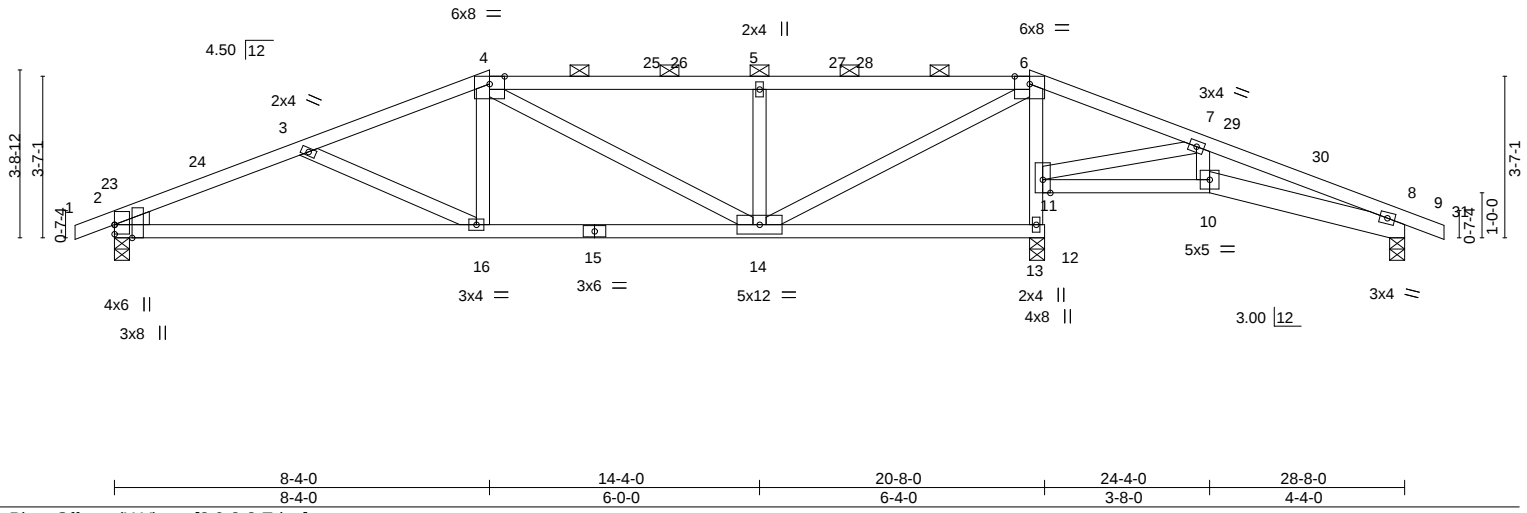


Plate Offsets (X, Y)-- [2:0-3-8, Edge]		8-4-0		14-4-0		20-8-0		24-4-0		28-8-0	
		8-4-0		6-0-0		6-4-0		3-8-0		4-4-0	

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.78	Vert(LL)	-0.08 14-16	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.63	Vert(CT)	-0.17 16-19	>999	180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.48	Horz(CT)	0.04 13	n/a	n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS							
BCDL	10.0									Weight: 108 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SPF No.2	TOP CHORD	Structural wood sheathing directly applied, except
BOT CHORD	2x4 SPF No.2 *Except*		2-0-0 oc purlins (3-8-13 max.): 4-6.
	8-10: 2x6 SPF No.2	BOT CHORD	Rigid ceiling directly applied.
WEBS	2x4 SPF No.2		
WEDGE			
Left: 2x4 SPF No.2			

REACTIONS.	(size) 2=0-4-0, 13=0-4-0, 8=0-4-0
	Max Horz 2=34(LC 16)
	Max Uplift 2=-83(LC 12), 13=-61(LC 13), 8=-55(LC 13)
	Max Grav 2=1226(LC 41), 13=1716(LC 2), 8=566(LC 41)

FORCES.	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	2-3=-2106/296, 3-4=-1780/245, 4-5=-1596/243, 5-6=-1596/243, 6-7=0/411, 7-8=-957/135
BOT CHORD	2-16=-221/1903, 14-16=-135/1628, 10-11=-85/791, 8-10=-87/856
WEBS	11-13=-1661/193, 6-11=-1498/176, 3-16=-484/96, 4-16=0/327, 4-14=-417/25, 5-14=-801/135, 7-11=-1132/141, 7-10=0/263, 6-14=-173/1956

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 8-4-0, Exterior(2R) 8-4-0 to 12-6-15, Interior(1) 12-6-15 to 20-4-0, Exterior(2R) 20-4-0 to 24-6-15, Interior(1) 24-6-15 to 29-6-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 13, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733205
2544696	A03	Hip	1	1		

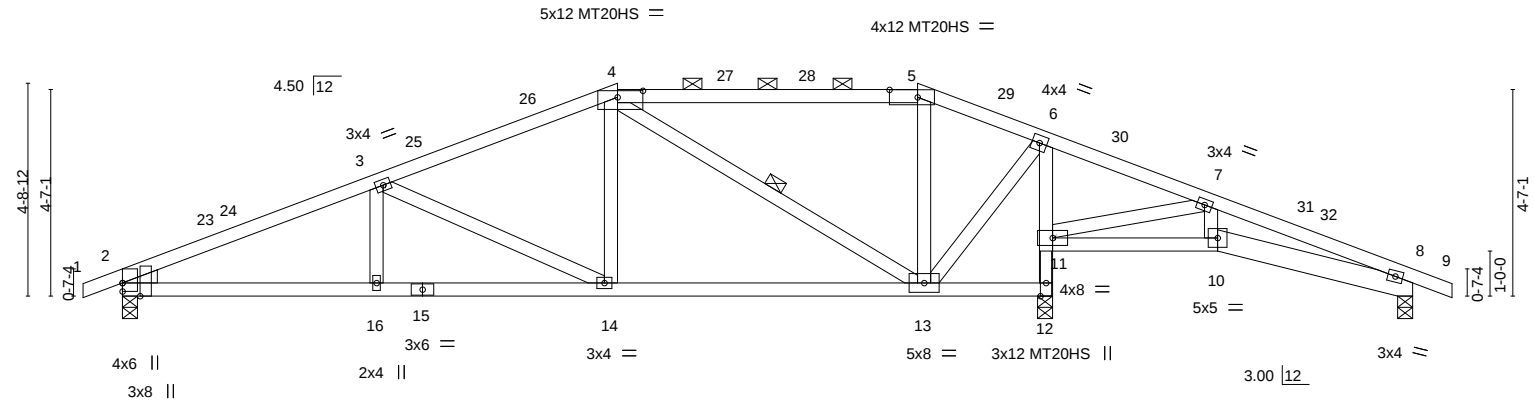
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:40 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-WaGmNmVATvtRwwglFqd4Orb9BW_KUWAZ0EBA09yGLgX

-0-10-8 5-7-12 11-0-0 17-8-0 20-8-0 24-4-0 28-8-0 29-6-8
0-10-8 5-7-12 5-4-4 6-8-0 3-0-0 3-8-0 4-4-0 0-10-8

Scale = 1:51.2



	5-7-12	11-0-0	17-8-0	20-8-0	24-4-0	28-8-0
	5-7-12	5-4-4	6-8-0	3-0-0	3-8-0	4-4-0

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

LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d				PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.96	Vert(LL)	-0.07	14-16	>999	240	MT20	197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.58	Vert(CT)	-0.15	14-16	>999	180	MT20HS	148/108	
TCDL	20.0	Rep Stress Incr	YES	WB	0.48	Horz(CT)	0.05	12	n/a	n/a			
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS							Weight: 113 lb	FT = 20%	
BCDL	10.0												

Weight: 113 lb FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
8-10: 2x6 SPF No.2
WEBS 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (2-2-0 max.): 4-5.
BOT CHORD Rigid ceiling directly applied.
WEBS 1 Row at midpt 4-13

REACTIONS. (size) 2=0-4-0, 12=0-4-0, 8=0-4-0
Max Horz 2=44(LC 20)
Max Uplift 2=80(LC 12), 12=45(LC 13), 8=58(LC 13)
Max Grav 2=1321(LC 41), 12=1810(LC 41), 8=540(LC 41)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-2260/280, 3-4=-1484/242, 4-5=-561/171, 5-6=-573/165, 6-7=0/435, 7-8=-807/128
BOT CHORD 2-16=-201/2023, 14-16=-201/2023, 13-14=-105/1322, 12-13=-267/35, 11-12=-1837/179,
6-11=-1512/162, 10-11=-71/662, 8-10=-72/714
WEBS 3-14=-844/106, 4-14=0/494, 4-13=-976/98, 5-13=-360/65, 6-13=-88/1186,
7-11=-1022/114

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 11-0-0, Exterior(2R) 11-0-0 to 15-2-15, Interior(1) 15-2-15 to 17-8-0, Exterior(2R) 17-8-0 to 21-10-15, Interior(1) 21-10-15 to 29-6-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 12, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733206
2544696	A04	ROOF SPECIAL GIRDER	1	2	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147, 8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:45 2020 Page 1
ID: wH4RYhEsTNeUP2dXvOfi1syQY8e-tY3fQTZJIRVkhYg2NDF5uJ4JXcy9gVJ9WuxiMyGLgS

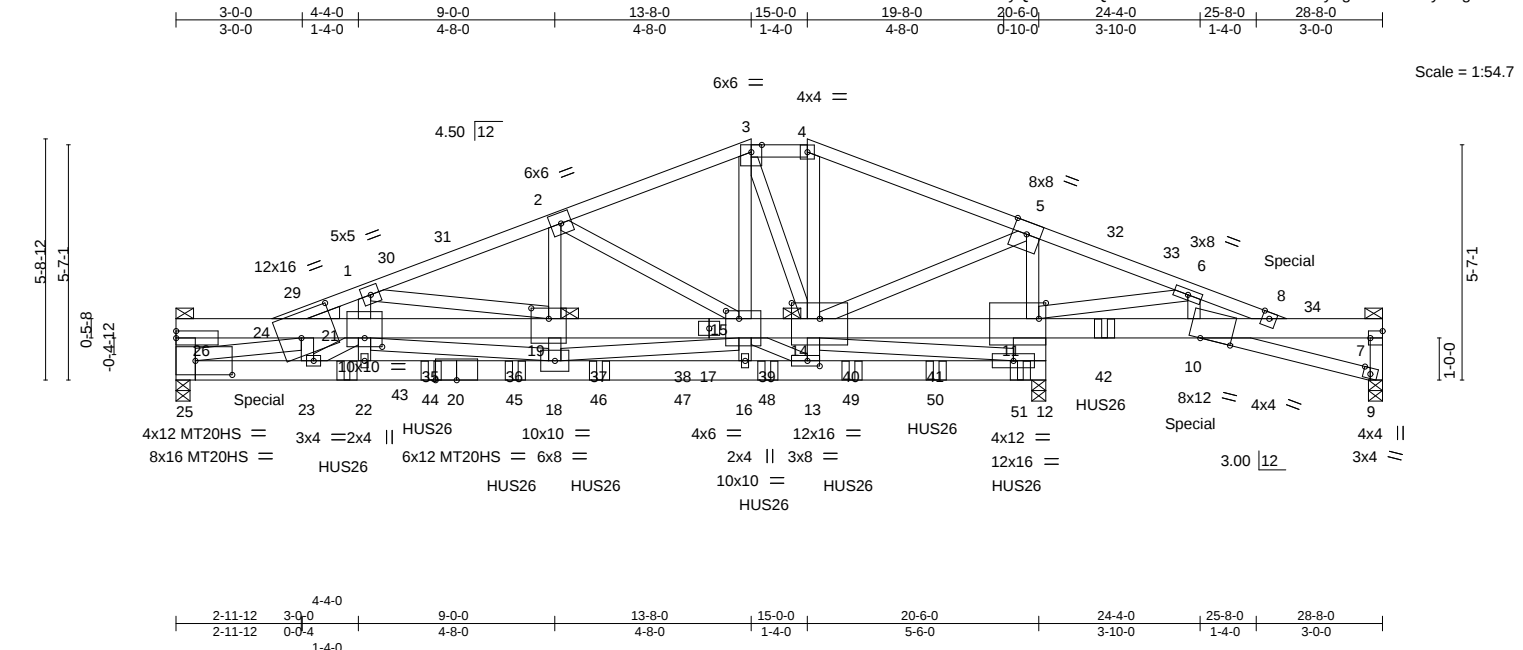


Plate Offsets (X,Y)--	[7:Edge,0-3-8], [9:0-2-0,Edge], [10:0-8-12,0-0-0], [11:0-2-0,0-4-8], [13:0-3-8,0-1-8], [14:0-8-0,0-4-8], [15:0-3-12,0-2-4], [19:0-5-0,0-3-0], [21:0-5-0,0-2-8], [24:0-9-13,0-7-0], [25:0-10-8,0-4-0]
-----------------------	--

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.75	Vert(LL) -0.17	19-21	>999	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.93	Vert(CT) -0.34	19-21	>718	180	MT20HS	148/108
TCDL 20.0	Rep Stress Incr NO	WB 0.92	Horz(CT) 0.08	12	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MS						
BCDL 10.0							Weight: 392 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SPF 1650F 1.5E *Except* 3-4: 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 3-1-13 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD 2x6 SPF No.2 *Except* 9-10: 2x4 SPF No.2, 20-25: 2x6 SP 2400F 2.0E 12-20: 2x6 SPF 2100F 1.8E	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 10-11. 6-0-0 oc bracing: 24-26, 7-8
WEBS 2x4 SPF No.2 *Except* 25-26: 2x6 SP 2400F 2.0E, 11-12: 2x10 SP 2400F 2.0E 5-14: 2x4 SPF 1650F 1.5E	JOINTS 1 Brace at Jt(s): 26, 7, 19, 14
WEDGE Left: 2x4 SP No.3	

REACTIONS.	(size) 9=0-4-0, 12=0-4-0 (req. 0-7-4), 25=0-4-0 Max Horz 25=31(LC 74) Max Uplift 12=-463(LC 9), 25=-288(LC 12) Max Grav 9=835(LC 52), 12=11393(LC 36), 25=7213(LC 18)
------------	--

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.	
TOP CHORD 25-26=-1212/37, 1-24=-13521/578, 1-2=-9780/438, 2-3=-5264/286, 3-4=-4019/249, 4-5=-4476/259, 5-6=-122/4461, 6-8=-106/1216, 7-9=-662/5	
BOT CHORD 24-26=-1875/77, 21-24=-1666/91, 19-21=-693/34, 15-19=-3281/159, 14-15=-753/84, 11-14=-8610/332, 10-11=-1079/99, 8-10=-1370/58, 7-8=-373/1, 9-10=-6/427, 23-25=-643/14149, 22-23=-620/13846, 18-22=-618/13921, 16-18=-349/8264, 13-16=-350/8264, 12-13=-215/5194	
WEBS 1-21=-88/2821, 1-19=-2659/145, 2-19=-102/3509, 2-15=-4862/228, 3-15=-129/3497, 3-14=-2145/83, 4-14=-144/1336, 6-10=-13/1679, 11-12=-11951/509, 5-11=-7539/321, 5-14=-321/9245, 13-14=-41/1923, 18-19=-282/106, 21-22=0/468, 6-11=-3369/107, 23-24=-1196/80, 18-21=-1716/90, 24-25=-13246/601, 21-23=-327/235, 12-14=-972/49, 13-15=-3424/163, 15-18=-185/4196	

NOTES-	
1) 2-ply truss to be connected together with 10d (0.120"x3") nails as follows: Top chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc, 2x4 - 1 row at 0-3-0 oc. Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-5-0 oc, 2x4 - 1 row at 0-4-0 oc. Webs connected as follows: 2x4 - 1 row at 0-9-0 oc, Except member 11-5 2x4 - 1 row at 0-7-0 oc, member 25-24 2x4 - 1 row at 0-7-0 oc, 2x10 - 2 rows staggered at 0-7-0 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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; Comments (page 2): cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60	



November 23, 2020

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	A04	ROOF SPECIAL GIRDER	1	2	I43733206
Job Reference (optional)					

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:45 2020 Page 2
ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-tY3fQTZJIRVkhYG2NDF5uJ4JXcy9gVJ9WuxiMyGLgS

NOTES-

- 5) TCELL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 6) Unbalanced snow loads have been considered for this design.
- 7) Provide adequate drainage to prevent water ponding.
- 8) All plates are MT20 plates unless otherwise indicated.
- 9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 10) WARNING: Required bearing size at joint(s) 12 greater than input bearing size.
- 11) Bearing at joint(s) 9, 25 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 12=463, 25=288.
- 13) 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.
- 14) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 15) Use Simpson Strong-Tie HUS26 (14-10d Girder, 4-10d Truss) or equivalent spaced at 4-0-0 oc max. starting at 4-0-12 from the left end to 22-0-12 to connect truss(es) to front face of bottom chord.
- 16) Fill all nail holes where hanger is in contact with lumber.
- 17) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1934 lb down and 162 lb up at 2-0-12, and 699 lb down and 44 lb up at 26-0-12, and 800 lb down and 28 lb up at 28-0-12 on top chord, and 1419 lb down and 96 lb up at 12-0-12, and 865 lb down and 88 lb up at 24-2-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
 - Uniform Loads (plf)
 - Vert: 24-29=-40, 3-29=-80, 3-4=-80, 4-8=-80, 24-26=-140, 10-11=-20, 7-8=-20, 9-10=-101, 23-25=-140, 12-23=-20
 - Concentrated Loads (lb)
 - Vert: 8=-757 10=-847(F) 11=-1042(F) 21=-1151(F) 24=-1934(F) 34=-640(F) 35=-1107(F) 36=-1211(F) 37=-1315(F) 38=-1419 39=-1042(F) 40=-1042(F) 41=-1042(F) 42=-845(F)

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	B01	Hip Girder	1	1	I43733207
Job Reference (optional)					

LOAD CASE(S)
Standard

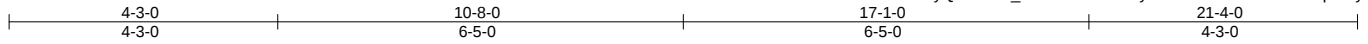
- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (plf)
Vert: 1-3=-80, 3-7=-80, 7-8=-80, 15-18=-20
Concentrated Loads (lb)
Vert: 21=32(B) 22=-95(B) 23=-95(B) 24=-95(B) 26=-95(B) 27=-95(B) 28=-95(B) 29=-95(B) 30=-95(B) 31=32(B) 32=-244(B) 33=-47(B) 34=-47(B) 35=-47(B) 36=-47(B) 37=-47(B) 38=-47(B) 39=-47(B) 40=-47(B) 41=-244(B)

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733208
2544696	B02	Hip	1	1	Job Reference (optional)	

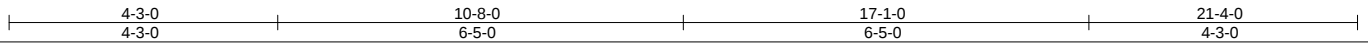
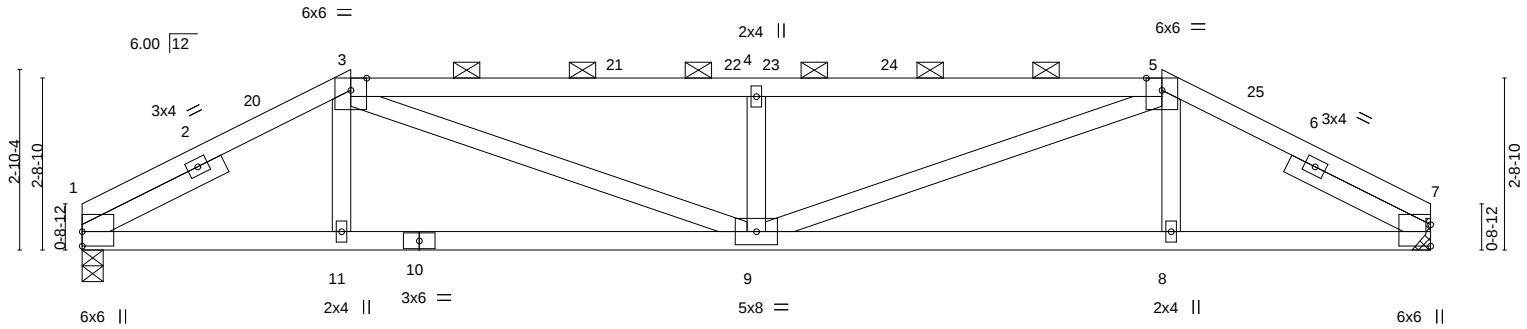
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:52 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-Au_JusfiebnKmmacyLrutN5GFM0DlzhKm55pRSyGLg



Scale = 1:36.5



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.83	Vert(LL)	-0.17 9 >999 240	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.89	Vert(CT)	-0.32 8-9 >796 180				
TCDL	20.0	Rep Stress Incr	YES	WB	0.38	Horz(CT)	0.07 7 n/a n/a				
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS							
BCDL	10.0										

Weight: 78 lb FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2 *Except*
3-5: 2x4 SPF 1650F 1.5E
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-

TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (2-7-0 max.): 3-5.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 1=0-4-0, 7=Mechanical
Max Horz 1=22(LC 13)
Max Uplift 1=-33(LC 13), 7=-33(LC 12)
Max Grav 1=1213(LC 39), 7=1213(LC 39)

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

TOP CHORD 1-3=-2098/273, 3-4=-3303/378, 4-5=-3303/378, 5-7=-2099/273
BOT CHORD 1-11=-186/1852, 9-11=-189/1851, 8-9=-194/1851, 7-8=-191/1852
WEBS 3-9=-135/1552, 4-9=-958/151, 5-9=-135/1552

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 4-3-0, Exterior(2R) 4-3-0 to 8-5-15, Interior(1) 8-5-15 to 17-1-0, Exterior(2E) 17-1-0 to 21-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733209
2544696	B03	Hip	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

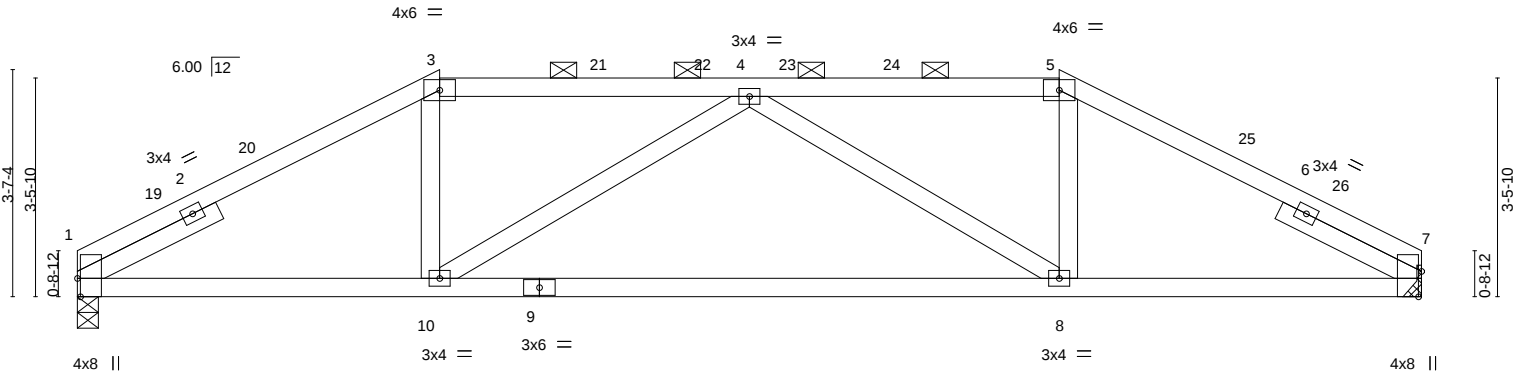
8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:54 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-6H63JYgyACeSb4k?3mtMyoAe39ibmsDdEPawWLyGLgJ

Job Reference (optional)

5-9-0	10-8-0	15-7-0	21-4-0
5-9-0	4-11-0	4-11-0	5-9-0

Scale = 1:36.6



5-9-0	15-7-0	21-4-0
5-9-0	9-10-0	5-9-0

Plate Offsets (X,Y)-- [1:0-3-8,Edge], [7:0-4-13,Edge]										
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d		PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.62	Vert(LL)	-0.26 8-10 >979	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.83	Vert(CT)	-0.58 8-10 >440	180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.44	Horz(CT)	0.08 7 n/a	n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS					Weight: 76 lb	FT = 20%
BCDL	10.0									

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (3-11-6 max.): 3-5.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 1=0-4-0, 7=Mechanical
Max Horz 1=30(LC 13)
Max Uplift 1=-17(LC 13), 7=-17(LC 12)
Max Grav 1=1173(LC 2), 7=1173(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-1897/254, 3-4=-1635/257, 4-5=-1635/257, 5-7=-1897/254
BOT CHORD 1-10=-158/1655, 8-10=-246/2222, 7-8=-158/1655
WEBS 3-10=0/516, 4-10=-698/102, 4-8=-698/102, 5-8=0/516

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 5-9-0, Exterior(2R) 5-9-0 to 9-11-15, Interior(1) 9-11-15 to 15-7-0, Exterior(2R) 15-7-0 to 19-9-15, Interior(1) 19-9-15 to 21-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

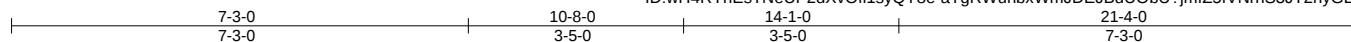
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733210
2544696	B04	Hip	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:55 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-aTgRWuhbxWmJDEJBdUObU?jmfZ5fVNmS3JT2nyGLgl

Job Reference (optional)



Scale = 1:36.6

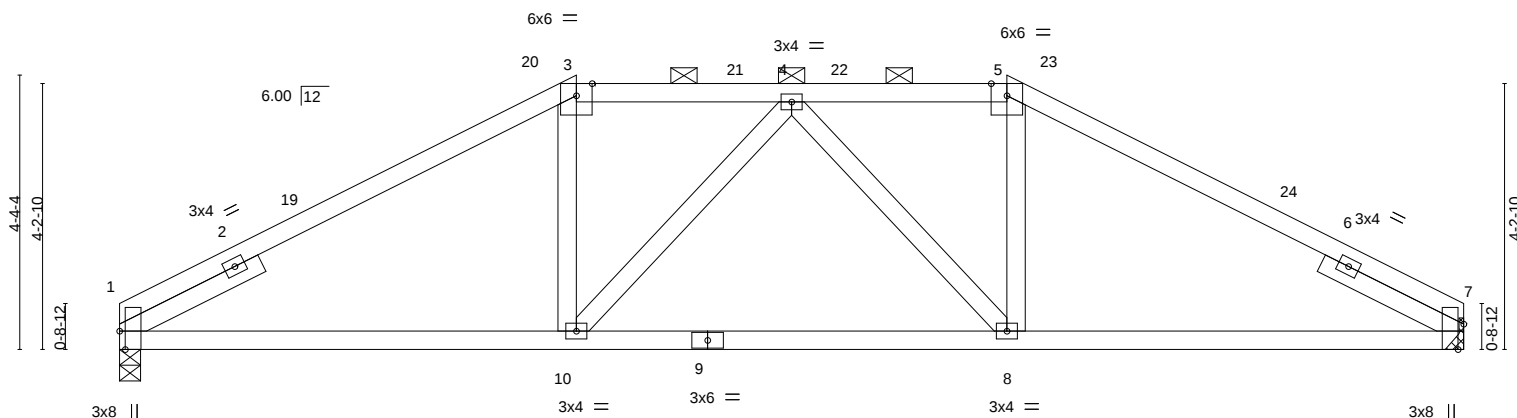


Plate Offsets (X,Y)--	[1:0-3-8,Edge], [7:0-4-13,Edge]
-----------------------	---------------------------------

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.82	in (loc) l/defl L/d	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.59	Vert(LL) -0.08 8-10 >999 240		
TCDL 20.0	Lumber DOL 1.15	WB 0.16	Vert(CT) -0.16 8-10 >999 180		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.05 7 n/a n/a		
BCDL 10.0	Code IRC2018/TPI2014			Weight: 77 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (4-3-13 max.): 3-5.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 1=0-4-0, 7=Mechanical
Max Horz 1=39(LC 13)
Max Uplift 1=-21(LC 16), 7=-21(LC 17)
Max Grav 1=1271(LC 40), 7=1271(LC 40)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-1702/262, 3-4=-1469/280, 4-5=-1469/280, 5-7=-1701/262
BOT CHORD 1-10=-158/1477, 8-10=-177/1599, 7-8=-153/1477
WEBS 3-10=0/376, 5-8=0/376, 4-10=-328/68, 4-8=-328/68

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 7-3-0, Exterior(2R) 7-3-0 to 11-5-15, Interior(1) 11-5-15 to 14-1-0, Exterior(2R) 14-1-0 to 18-3-15, Interior(1) 18-3-15 to 21-4-0 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733211
2544696	B05	Hip	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:57 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-WrnCxajrT701SXTalvR3aQoCKNnLzH?4wNoa7gyGLgG

Job Reference (optional)

4-6-4	8-9-0	12-7-0	16-9-12	21-4-0
4-6-4	4-2-12	3-10-0	4-2-12	4-6-4

Scale = 1:36.6

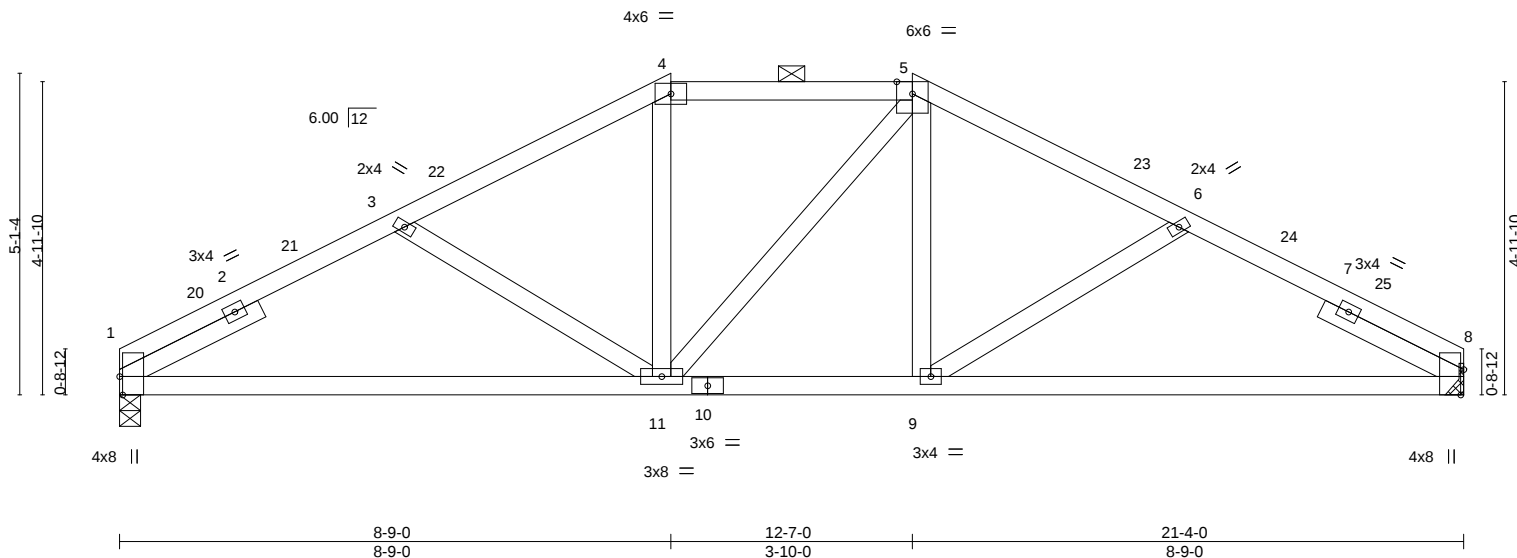


Plate Offsets (X,Y)-- [1:0-3-8,Edge], [8:0-4-13,Edge]									
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d		PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.42	Vert(LL)	-0.10 9-18 >999 240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.64	Vert(CT)	-0.21 9-18 >999 180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.18	Horz(CT)	0.06 8 n/a n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS				Weight: 85 lb	FT = 20%
BCDL	10.0								

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

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

REACTIONS. (size) 1=0-4-0, 8=Mechanical
Max Horz 1=47(LC 13)
Max Uplift 1=-29(LC 16), 8=-29(LC 17)
Max Grav 1=1375(LC 40), 8=1375(LC 40)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-2078/300, 3-4=-1720/263, 4-5=-1432/270, 5-6=-1719/263, 6-8=-2078/300
BOT CHORD 1-11=-220/1808, 9-11=-119/1431, 8-9=-214/1808
WEBS 3-11=-430/112, 4-11=-19/336, 5-9=-6/336, 6-9=-431/112

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 8-9-0, Exterior(2E) 8-9-0 to 12-7-0, Exterior(2R) 12-7-0 to 16-11-8, Interior(1) 16-11-8 to 21-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



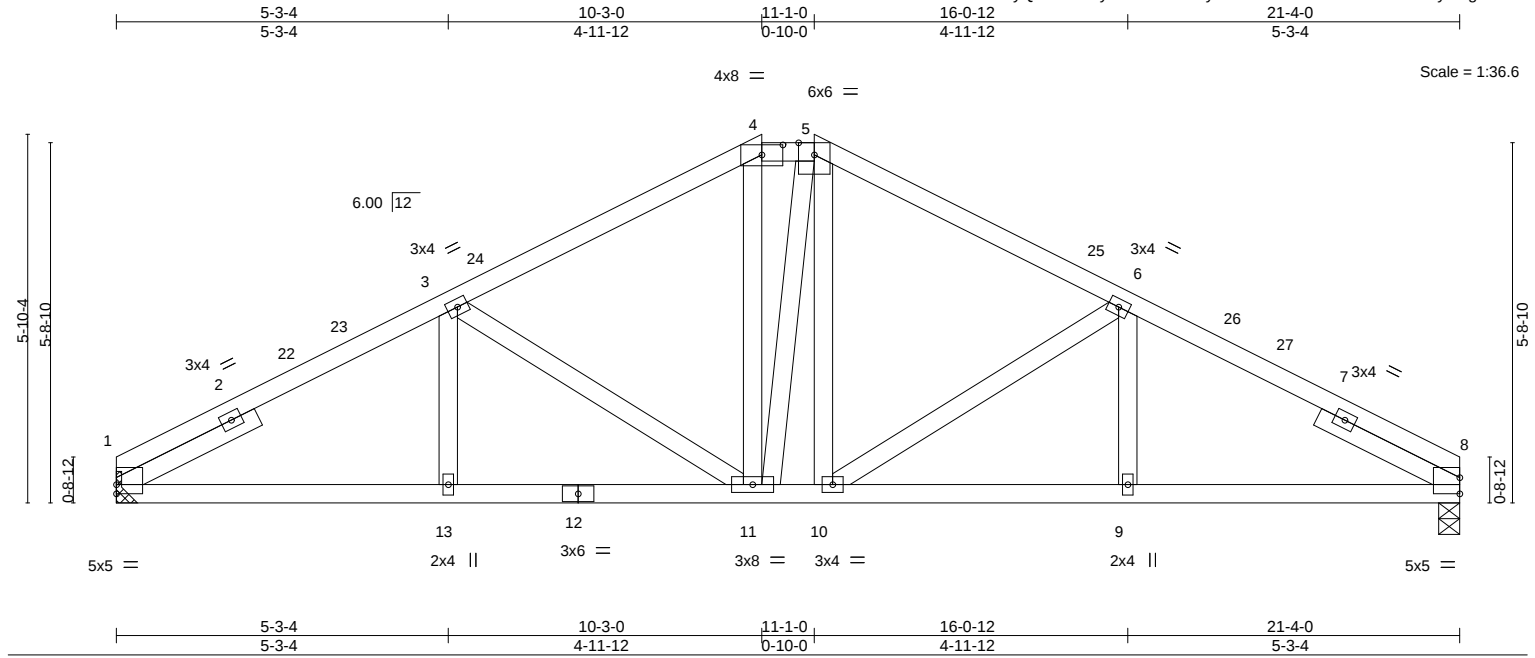
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733212
2544696	B06	Hip	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 08:59:59 2020 Page 1

ID: wH4RYhEsTNeUP2dXvOf1syQY8e-TEvyMGk5?IGhrcysKTxfuXvATCR87MNHhBYyGLgE



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.48	Vert(LL)	-0.08	9-10	>999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.61	Vert(CT)	-0.16	9-10	>999		
TCDL 20.0	Lumber DOL 1.15	WB 0.34	Horz(CT)	0.06	8	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS						
BCDL 10.0	Code IRC2018/TPI2014						Weight: 94 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (4-4-7 max.): 4-5.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 1=Mechanical, 8=0-4-0
Max Horz 1=55(LC 15)
Max Uplift 1=-36(LC 16), 8=-36(LC 17)
Max Grav 1=1479(LC 40), 8=1479(LC 40)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-2269/253, 3-4=-1759/241, 4-5=-1454/246, 5-6=-1755/241, 6-8=-2271/253
BOT CHORD 1-13=-171/1961, 11-13=-171/1961, 10-11=-71/1448, 9-10=-166/1963, 8-9=-166/1963
WEBS 3-11=-588/110, 4-11=-68/391, 5-10=-36/376, 6-10=-597/111

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 10-3-0, Exterior(2E) 10-3-0 to 11-1-0, Exterior(2R) 11-1-0 to 15-3-15, Interior(1) 15-3-15 to 21-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

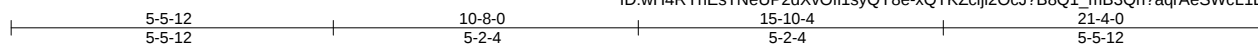
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733213
2544696	B07	Common	4	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

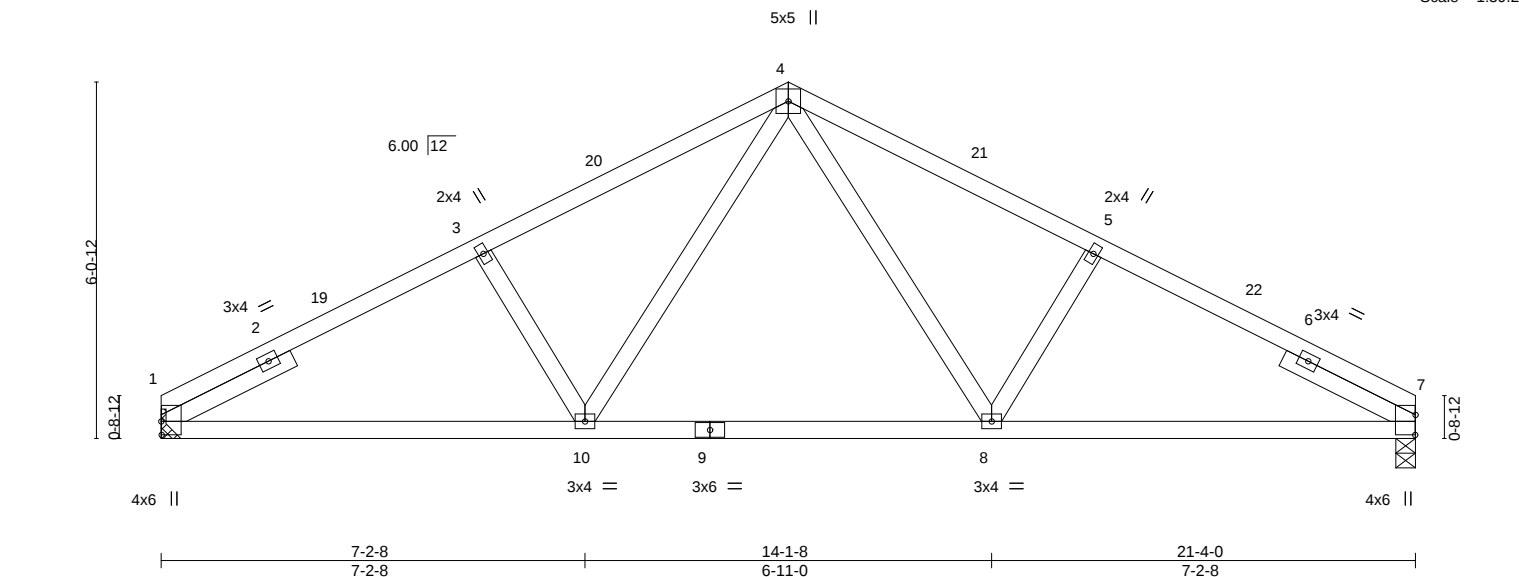
8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:00 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-xQTKZcjl2OcJ?B8Q1_mB3Qh?aqraeSWcl1Ek_yGLgD

Job Reference (optional)



Scale = 1:39.2



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.53	Vert(LL) -0.06	8-10	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.52	Vert(CT) -0.16	8-10	>999	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.14	Horz(CT) 0.05	7	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS						
BCDL 10.0	Code IRC2018/TPI2014						Weight: 80 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-

TOP CHORD Structural wood sheathing directly applied.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 1=Mechanical, 7=0-4-0
Max Horz 1=58(LC 13)
Max Uplift 1=-37(LC 16), 7=-37(LC 17)
Max Grav 1=1173(LC 2), 7=1173(LC 2)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-1798/321, 3-4=-1639/340, 4-5=-1639/340, 5-7=-1798/321
BOT CHORD 1-10=-222/1555, 8-10=-97/1108, 7-8=-217/1555
WEBS 4-8=-90/563, 5-8=-412/157, 4-10=-90/563, 3-10=-412/157

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 10-8-0, Exterior(2R) 10-8-0 to 13-8-0, Interior(1) 13-8-0 to 21-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

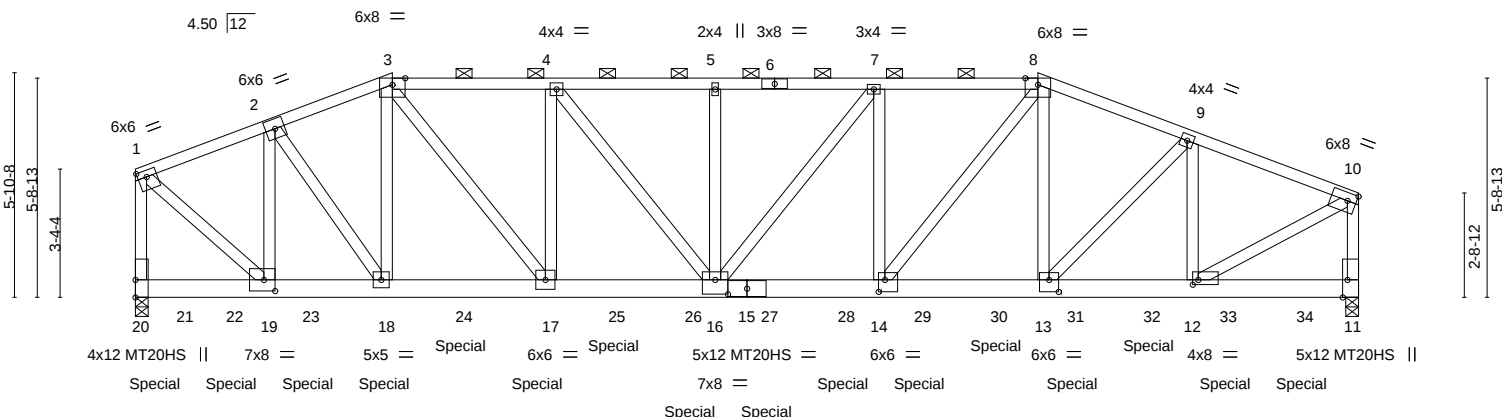
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733214
2544696	C01	HIP GIRDER	1	2	Job Reference (optional)	

Builders First Source, Valley Center, KS 67147

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-u54x_daimNPMU736glZF2obhDiaH10DKquY1XKyGFR

3-6-1	6-8-11	10-10-7	15-2-0	19-5-9	23-7-5	27-7-15	32-0-0
3-6-1	3-2-9	4-1-13	4-3-9	4-3-9	4-1-13	4-0-9	4-4-1

Scale = 1:60.3



	3-6-1	6-8-11	10-10-7	15-2-0	19-5-9	23-7-5	27-7-15	32-0-0
	3-6-1	3-2-9	4-1-13	4-3-9	4-3-9	4-1-13	4-0-9	4-4-1
Plate Offsets (X,Y)--	[1:0-2-12,0-2-0], [10:0-2-12,0-2-8], [11:0-5-8,Edge], [12:0-1-12,0-1-8], [13:0-3-0,0-3-12], [14:0-2-0,0-3-12], [16:0-4-0,0-4-8], [19:0-3-8,0-3-8]							

LOADING (psf)	SPACING-	CSI.	DEFL.				PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.92	in (loc) l/defl L/d				MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.46	Vert(LL) -0.22 14-16 >999 240				MT20HS	148/108
TCDL 20.0	Lumber DOL 1.15	WB 0.98	Vert(CT) -0.44 14-16 >858 180					
BCLL 0.0	Rep Stress Incr NO	Matrix-MS	Horz(CT) 0.08 11 n/a n/a					
BCDL 10.0	Code IRC2018/TPI2014						Weight: 411 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 3-7-8 oc purlins, except end verticals, and 2-0-0 oc purlins (2-9-14 max.): 3-8.
BOT CHORD 2x6 SP 2400F 2.0E	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SPF No.2	

REACTIONS. (lb/size) 20=7364/0-4-0, 11=7316/0-4-0
Max Horz 20=-77(LC 8)
Max Uplift 20=-654(LC 8), 11=-586(LC 9)
Max Grav 20=7487(LC 35), 11=7383(LC 35)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-5669/525, 2-3=-7781/736, 3-4=-10361/957, 4-5=-11659/1023, 5-6=-11659/1023, 6-7=-11659/1023, 7-8=-11224/959, 8-9=-9442/795, 9-10=-7595/615, 1-20=-6772/617, 10-11=-6753/553
BOT CHORD 19-23=-472/5273, 18-23=-472/5273, 18-24=-655/7363, 17-24=-655/7363, 17-25=-908/10356, 25-26=-908/10356, 16-26=-908/10356, 15-16=-910/11219, 15-27=-910/11219, 27-28=-910/11219, 14-28=-910/11219, 14-29=-710/8864, 29-30=-710/8864, 13-30=-710/8864, 13-31=-577/7070, 31-32=-577/7070, 12-32=-577/7070
WEBS 2-19=-3600/367, 2-18=-312/3520, 3-18=-1498/119, 3-17=-417/4924, 4-17=-2292/166, 4-16=-108/2083, 5-16=-483/63, 7-16=-112/711, 7-14=-1226/168, 8-14=-337/3875, 8-13=-304/217, 9-13=-191/2556, 9-12=-2526/248, 1-19=-627/7008, 10-12=-634/8007

- NOTES-**
- 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-4-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc.
Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
 - 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.
 - Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 654 lb uplift at joint 20 and 586 lb uplift at joint 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.



November 23, 2020

General bracing representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733214
2544696	C01	HIP GIRDER	1	2	Job Reference (optional)	

Builders First Source, Valley Center, KS 67147

8.240 s Apr 4 2020 MiTek Industries, Inc. Mon Nov 23 16:05:37 2020 Page 2
ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-u54x_daimNPMU736glZF2obhDiaH10DKquY1XKyGFRC

NOTES-

- 13) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 630 lb down and 49 lb up at 0-7-4, 628 lb down and 61 lb up at 2-7-4, 712 lb down and 82 lb up at 4-7-4, 682 lb down and 102 lb up at 6-7-4, 682 lb down and 102 lb up at 8-7-4, 682 lb down and 102 lb up at 10-7-4, 682 lb down and 102 lb up at 12-7-4, 799 lb down and 74 lb up at 14-7-4, 799 lb down and 74 lb up at 16-7-4, 799 lb down and 74 lb up at 18-7-4, 799 lb down and 74 lb up at 20-7-4, 799 lb down and 74 lb up at 22-7-4, 791 lb down and 74 lb up at 24-7-4, 699 lb down and 65 lb up at 26-7-4, and 645 lb down and 64 lb up at 28-7-4, and 697 lb down and 63 lb up at 30-7-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-80, 3-8=-80, 8-10=-80, 11-20=-20

Concentrated Loads (lb)

Vert: 18=-682(B) 17=-682(B) 21=-630(B) 22=-628(B) 23=-712(B) 24=-682(B) 25=-682(B) 26=-799(B) 27=-799(B) 28=-799(B) 29=-799(B) 30=-799(B) 31=-791(B) 32=-699(B) 33=-631(B) 34=-697(B)

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

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

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



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733215
2544696	C02	Roof Special	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:07 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-EnO_1?q66CGcf4EVK?cQ_XDnxP9oJePYDxD6T4yGLg6

1-10-0	6-6-5	11-2-11	14-2-0	18-5-5	21-2-0	25-2-0	32-0-0
1-10-0	4-8-5	4-8-5	2-11-5	4-3-5	2-8-11	4-0-0	6-10-0

Scale = 1:61.8

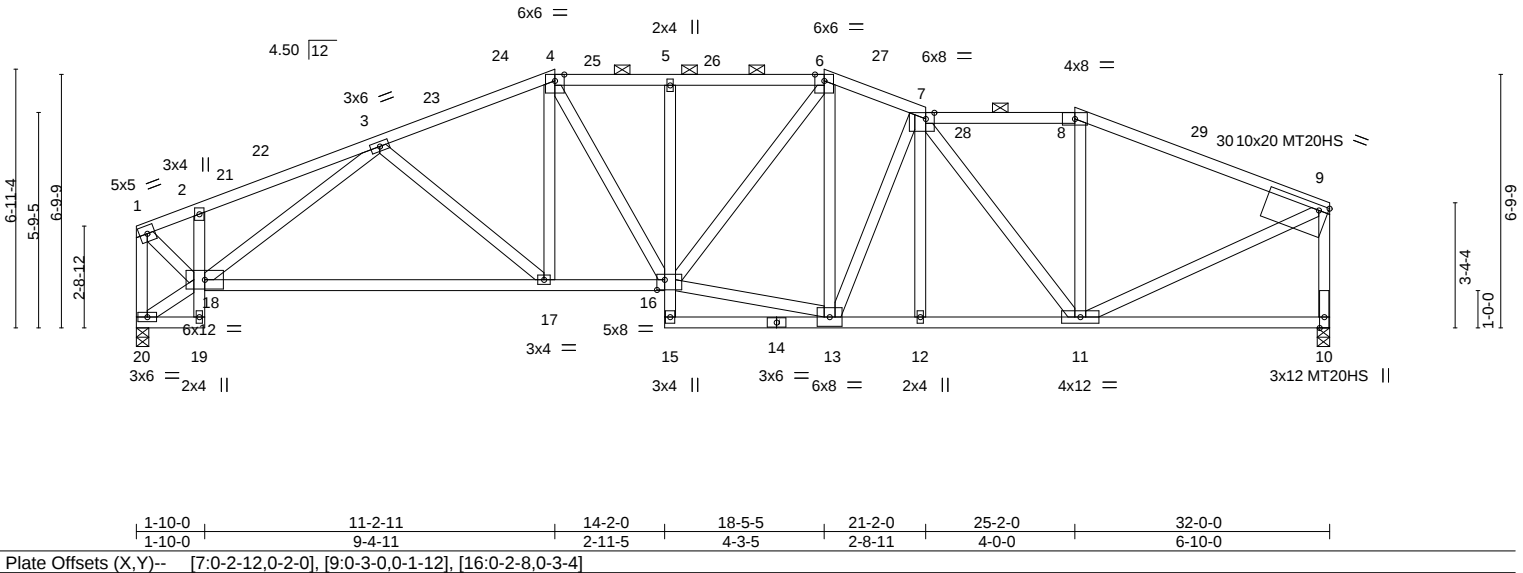


Plate Offsets (X,Y)-- [7:0-2-12,0-2-0], [9:0-3-0,0-1-12], [16:0-2-8,0-3-4]									
LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc)	L/defl	L/d
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.99	Vert(LL)	-0.19 17-18	>999	240
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.82	Vert(CT)	-0.42 17-18	>900	180
TCDL	20.0	Rep Stress Incr	YES	WB	0.83	Horz(CT)	0.12 10	n/a	n/a
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS					
BCDL	10.0								
								Weight: 175 lb FT = 20%	

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (3-4-14 max.): 4-6, 7-8.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 10=0-4-0, 20=0-4-0
Max Horz 20=75(LC 13)
Max Uplift 10=-83(LC 13), 20=-69(LC 12)
Max Grav 10=1754(LC 45), 20=1836(LC 45)

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

TOP CHORD 1-2=-1436/243, 2-3=-1621/291, 3-4=-2523/406, 4-5=-2487/441, 5-6=-2483/441,
6-7=-2261/386, 7-8=-1687/306, 8-9=-1900/287, 1-20=-1806/265, 9-10=-1684/269
BOT CHORD 2-18=-443/110, 17-18=-413/2344, 16-17=-348/2295, 5-16=-536/100, 12-13=-344/2233,
11-12=-344/2232
WEBS 4-17=0/312, 4-16=-93/522, 13-16=-324/1973, 6-16=-113/731, 7-13=-390/92,
7-11=-934/138, 9-11=-242/1772, 1-18=-248/1834, 3-18=-1224/216

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 11-2-11, Exterior(2R) 11-2-11 to 14-3-12, Interior(1) 14-3-12 to 18-5-5, Exterior(2E) 18-5-5 to 21-2-0, Interior(1) 21-2-0 to 25-2-0, Exterior(2R) 25-2-0 to 28-2-0, Interior(1) 28-2-0 to 31-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- All plates are MT20 plates unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10, 20.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

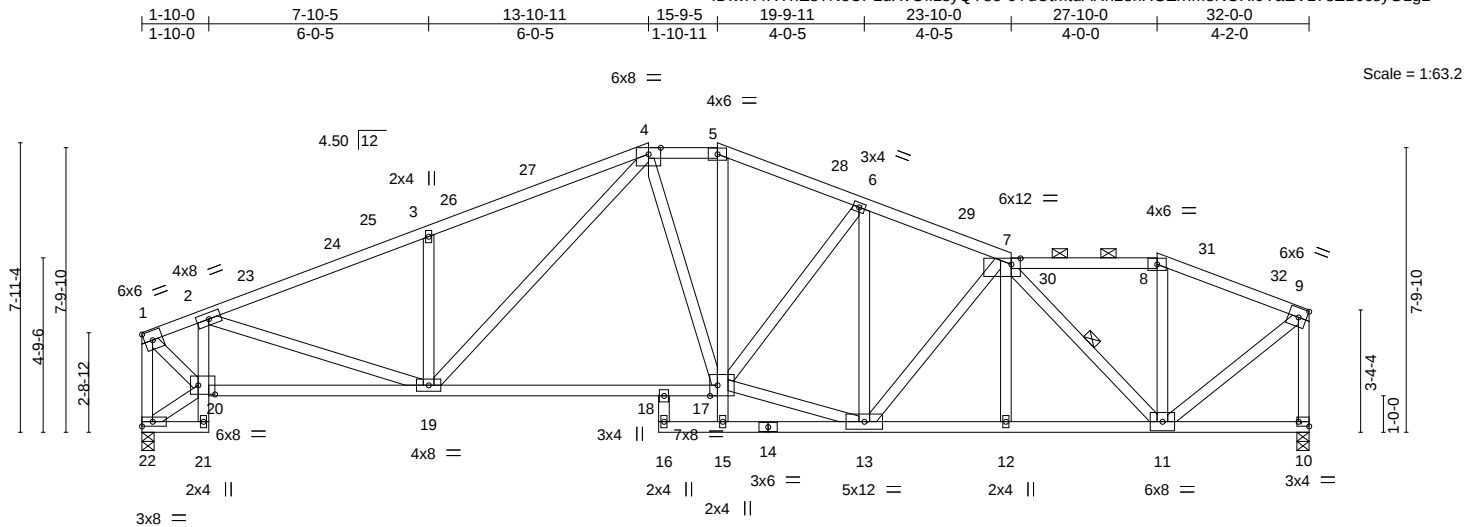
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733216
2544696	C03	Roof Special	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:11 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-6YdUitMtdARn28hXGZrhM8NOXI0YaEV178ZBJcsyGLg2

Job Reference (optional)



1-10-0	7-10-5	14-2-0	15-9-5	19-9-11	23-10-0	27-10-0	32-0-0
1-10-0	6-0-5	6-3-11	1-7-5	4-0-5	4-0-5	4-0-0	4-2-0
Plate Offsets (X,Y)-- [7:0-3-0,0-2-0], [10:Edge,0-1-8], [17:0-2-8,Edge], [20:0-5-8,0-3-0]							
LOADING (psf)		SPACING-	2-0-0	CSI.	DEFL.	in (loc)	PLATES
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC 0.68	Vert(LL)	-0.15 18-19 >999	MT20
Snow (Pf)	20.0	Lumber DOL	1.15	BC 0.64	Vert(CT)	-0.32 18-19 >999	197/144
TCDL	20.0	Rep Stress Incr	YES	WB 0.60	Horz(CT)	0.14 10 n/a	
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS			
BCDL	10.0						
							Weight: 174 lb FT = 20%

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

BRACING-
TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (3-5-1 max.): 4-5, 7-8.
BOT CHORD Rigid ceiling directly applied.
WEBS 1 Row at midpt 7-11

REACTIONS. (size) 10=0-4-0, 22=0-4-0
Max Horz 22=69(LC 13)
Max Uplift 10=-74(LC 13), 22=-59(LC 12)
Max Grav 10=1891(LC 44), 22=2040(LC 44)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1628/255, 2-3=-3090/384, 3-4=-3091/464, 4-5=-2368/376, 5-6=-2600/385, 6-7=-2642/360, 7-8=-1416/241, 8-9=-1587/231, 1-22=-1970/269, 9-10=-1847/254
BOT CHORD 2-20=-1366/225, 19-20=-327/1662, 18-19=-302/2337, 17-18=-242/2355, 12-13=-340/2502, 11-12=-341/2500
WEBS 2-19=-130/1180, 3-19=-729/158, 15-17=0/259, 5-17=-86/658, 7-11=-1609/188, 9-11=-231/1769, 1-20=-262/2068, 4-19=-110/656, 7-13=-313/59, 6-13=-406/55, 13-17=-258/2426, 4-17=-76/350

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 13-10-11, Exterior(2E) 13-10-11 to 15-9-5, Exterior(2R) 15-9-5 to 18-9-5, Interior(1) 18-9-5 to 27-10-0, Exterior(2R) 27-10-0 to 30-10-0, Interior(1) 30-10-0 to 31-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10, 22.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733217
2544696	C04	ROOF SPECIAL	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:13 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-2wIFi2vti21mN?hehGjqDoTrZpCsiQIQbsgQhkyGLg0



Scale = 1:57.4

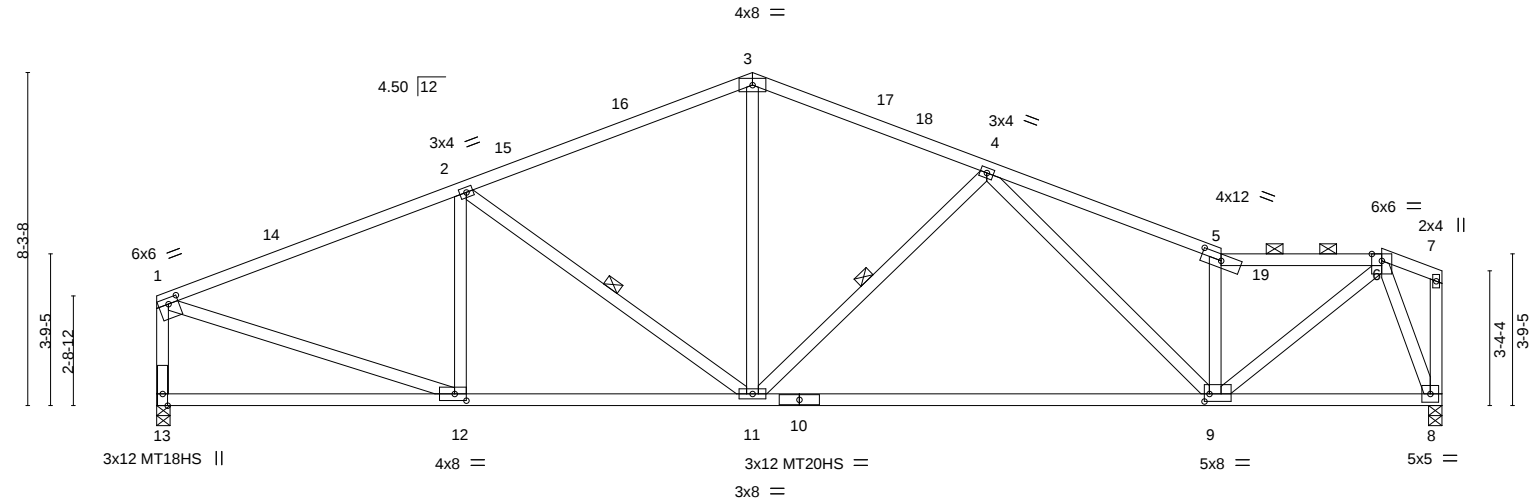


Plate Offsets (X,Y)--	[1:0-3-0,0-1-12], [5:0-6-0,0-1-15], [9:0-1-8,0-2-4], [12:0-3-8,0-2-0]
-----------------------	---

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.79	Vert(LL) -0.37	9-11	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.78	Vert(CT) -0.81	9-11	>470	180	MT20HS	148/108
TCDL 20.0	Lumber DOL 1.15	WB 0.55	Horz(CT) 0.07	8	n/a	n/a	MT18HS	197/144
BCLL 0.0	Rep Stress Incr YES	Matrix-AS					Weight: 146 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014							

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (3-7-12 max.): 5-6.
BOT CHORD 2x4 SPF 1650F 1.5E	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SPF No.2	WEBS 1 Row at midpt 2-11, 4-11

REACTIONS.	(size)
13=0-4-0, 8=0-4-0	
Max Horz 13=67(LC 13)	
Max Uplift 13=-55(LC 12), 8=-70(LC 13)	
Max Grav 13=1744(LC 2), 8=1744(LC 2)	

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-2223/281, 2-3=-2019/308, 3-4=-1988/311, 4-5=-2528/329, 5-6=-2326/272, 1-13=-1664/232
BOT CHORD 11-12=-293/1983, 9-11=-304/2215, 8-9=-122/654
WEBS 2-12=-501/127, 2-11=-394/101, 3-11=-67/787, 4-11=-785/154, 4-9=0/265, 5-9=-1309/212, 6-9=-223/2225, 1-12=-212/1961, 6-8=-1805/262

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 14-10-0, Exterior(2R) 14-10-0 to 17-10-0, Interior(1) 17-10-0 to 30-6-0, Exterior(2E) 30-6-0 to 31-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 13, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733218
2544696	C05	ROOF SPECIAL	1	1		

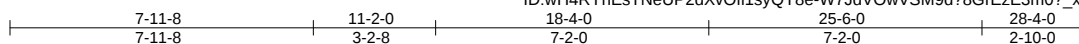
Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:14 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-W7JdVOwVSM9d?8GrEzE3m0?_xDVFRtNaqWQzDBYGLg?

Job Reference (optional)



Scale = 1:60.4

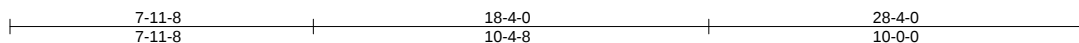
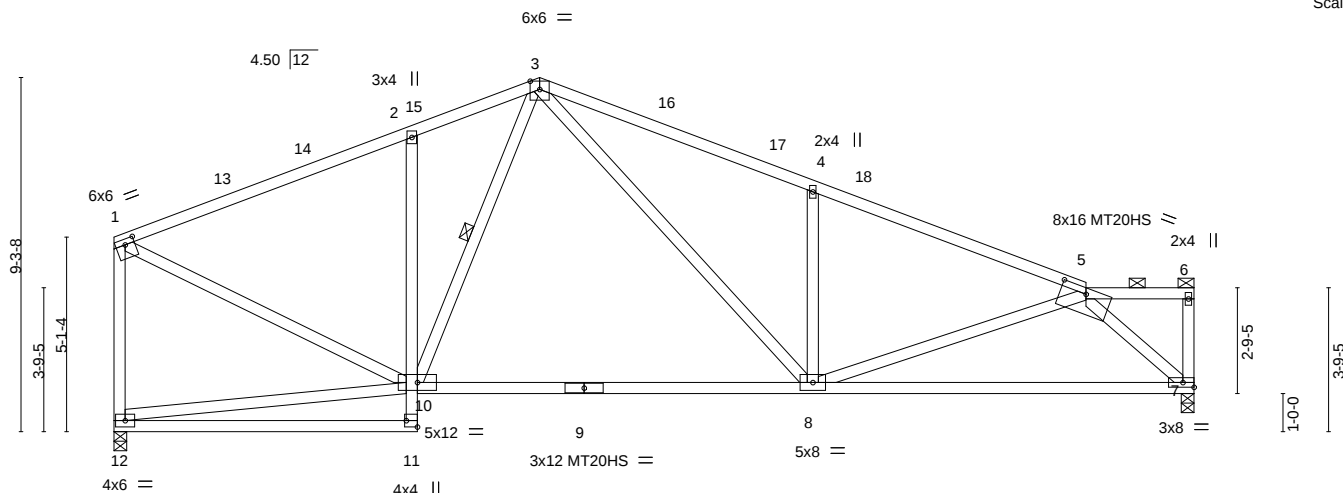


Plate Offsets (X,Y)-- [1:0-3-0,0-1-12], [5:0-8-0,0-1-15], [11:Edge,0-3-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.94	Vert(LL)	-0.24	8-10	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.90	Vert(CT)	-0.54	8-10	>625	180	MT20HS	148/108
TCDL	20.0	Rep Stress Incr	YES	WB	0.56	Horz(CT)	0.06	7	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS								
BCDL	10.0											

LUMBER-

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

BRACING-

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

REACTIONS.

(size) 7=0-4-0, 12=0-4-0
Max Horz 12=-118(LC 14)
Max Uplift 7=-64(LC 13), 12=-53(LC 12)
Max Grav 7=1603(LC 40), 12=1542(LC 2)

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

TOP CHORD 1-2=-1559/264, 2-3=-1493/327, 3-4=-2475/384, 4-5=-2446/286, 1-12=-1478/219
BOT CHORD 2-10=-639/160, 8-10=-174/1302, 7-8=-237/1647
WEBS 3-10=-163/291, 3-8=-159/1288, 4-8=-920/202, 5-8=-18/547, 5-7=-2217/321, 1-10=-176/1451

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 11-2-0, Exterior(2R) 11-2-0 to 14-2-0, Interior(1) 14-2-0 to 28-2-4 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- All plates are MT20 plates unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 12.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733219
2544696	C06	ROOF SPECIAL	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:16 2020 Page 1

ID:W4RYhEsTNeUP2dXvOfi1syQY8e-TVrNw4xm_zPKESQDMOGxR5LP1DOvo0tHqv4H3yGLfz

7-11-8	11-2-0	16-9-8	22-5-0	28-4-0
7-11-8	3-2-8	5-7-8	5-7-8	5-11-0

Scale = 1:58.4

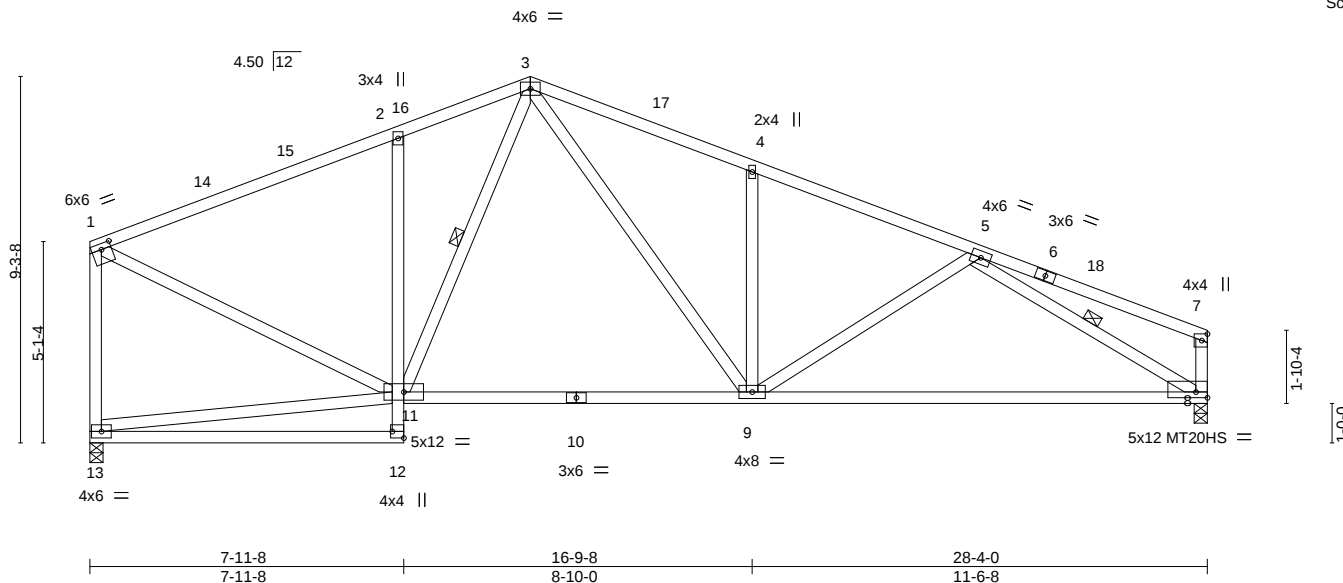


Plate Offsets (X,Y)-- [1:0-3-0,0-1-12], [8:Edge,0-1-12], [12:Edge,0-3-8]

LOADING (psf)	SPACING	CSI	DEFL.	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.88	in (loc) l/defl L/d	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.79	Vert(LL) -0.33 8-9 >999 240	MT20HS	148/108
TCDL 20.0	Lumber DOL 1.15	WB 0.48	Vert(CT) -0.69 8-9 >487 180		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.07 8 n/a n/a		
BCDL 10.0	Code IRC2018/TPI2014			Weight: 142 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD 2x4 SPF No.2 *Except*	BOT CHORD Rigid ceiling directly applied.
8-10: 2x4 SPF 1650F 1.5E	WEBS 1 Row at midpt 3-11, 5-8
WEBS 2x4 SPF No.2	

REACTIONS. (size) 13=0-4-0, 8=0-4-0
Max Horz 13=-121(LC 14)
Max Uplift 13=-54(LC 12), 8=-61(LC 17)
Max Grav 13=1542(LC 2), 8=1542(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1553/266, 2-3=-1494/332, 3-4=-2077/370, 4-5=-2067/297, 5-7=-308/58,
1-13=-1472/222, 7-8=-323/66
BOT CHORD 2-11=-651/165, 9-11=-124/1294, 8-9=-261/1895
WEBS 4-9=-575/156, 3-9=-139/1004, 3-11=-123/272, 5-8=-2019/308, 1-11=-180/1446

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 11-2-0, Exterior(2R) 11-2-0 to 14-2-0, Interior(1) 14-2-0 to 28-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 13, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733220
2544696	C07	HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:18 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-PuY8LzOWaf2TmZcTpJ?wsAFTqw6Nhu9l8OBLyyGLfx

Job Reference (optional)

7-11-8	8-11-5	13-4-11	20-8-9	28-4-0
7-11-8	0-11-13	4-5-5	7-3-15	7-7-7

Scale = 1:56.5

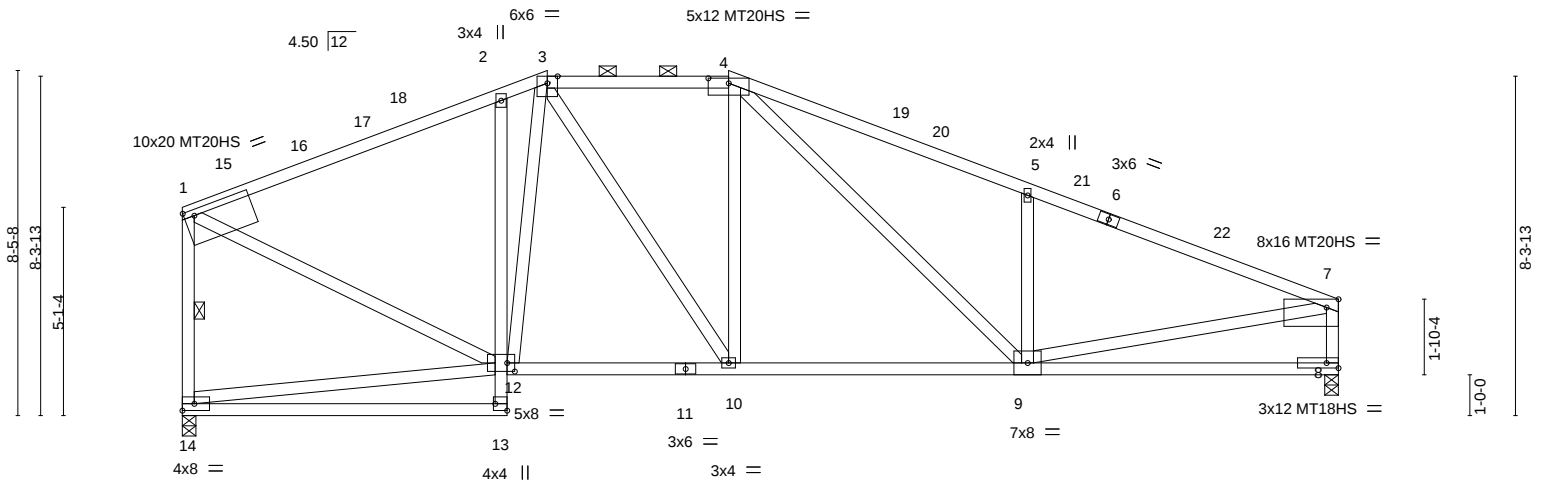


Plate Offsets (X,Y)--	[1:0-3-0,0-1-12], [4:0-6-0,0-1-8], [7:0-3-8,Edge], [12:0-2-4,0-2-8], [13:Edge,0-3-8]
-----------------------	--

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.97	in (loc) l/defl L/d	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.71	Vert(LL) -0.11 13-14 >999 240	MT20HS	148/108
TCDL 20.0	Lumber DOL 1.15	WB 0.52	Vert(CT) -0.22 13-14 >999 180	MT18HS	197/144
BCLL 0.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.05 8 n/a n/a	Weight: 149 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014				

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals, and
BOT CHORD 2x4 SPF No.2	2-0-0 oc purlins (4-0-7 max.): 3-4.
WEBS 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied.
	WEBS 1 Row at midpt 1-14

REACTIONS. (size) 14=0-4-0, 8=0-4-0
Max Horz 14=-126(LC 14)
Max Uplift 14=-66(LC 12), 8=-65(LC 13)
Max Grav 14=1732(LC 40), 8=1793(LC 40)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1713/271, 2-3=-1668/328, 3-4=-1698/300, 4-5=-2636/377, 5-7=-2639/286,
1-14=-1656/221, 7-8=-1711/212
BOT CHORD 2-12=-881/184, 10-12=-140/1403, 9-10=-153/1691, 8-9=-44/256
WEBS 3-10=-84/547, 4-10=-318/124, 4-9=-135/883, 5-9=-924/193, 7-9=-196/2133,
1-12=-183/1574, 3-12=-208/336

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 8-11-5, Exterior(2E) 8-11-5 to 13-4-11, Exterior(2R) 13-4-11 to 17-7-9, Interior(1) 17-7-9 to 28-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- All plates are MT20 plates unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 14, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

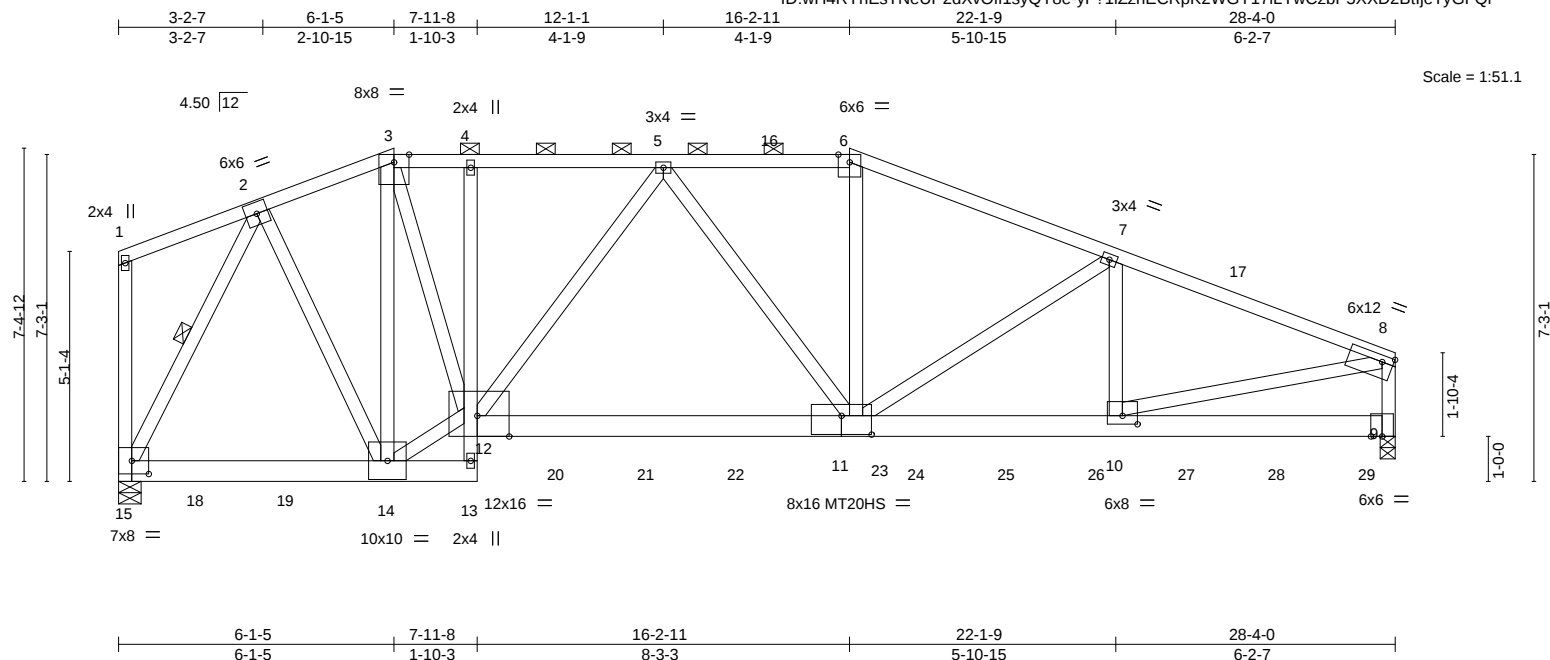


16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss C08	Truss Type HIP GIRDER	Qty 1	Ply 2	Summit/17 Woodside Job Reference (optional)	I43733221
----------------	--------------	--------------------------	----------	----------	--	-----------

Builders First Source, Valley Center, KS 67147

8.240 s Apr 4 2020 MiTek Industries, Inc. Mon Nov 23 16:06:09 2020 Page 1
ID: wH4RYhEsTNeUP2dXvOfi1syQY8e-yF?1iZznECRpK2WGY17ILYwCzbP5XXD2BtljeTyGFQj



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	2-0-0	TC	0.74	Vert(LL)	-0.26	MT20	197/144		
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.89	Vert(CT)	-0.53	MT20HS	148/108		
TCDL	20.0	Rep Stress Incr	NO	WB	0.79	Horz(CT)	0.11				
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MS							
BCDL	10.0										

LUMBER-		BRACING-	
TOP CHORD	2x4 SPF No.2 *Except* 6-8: 2x4 SPF 1650F 1.5E	TOP CHORD	Structural wood sheathing directly applied or 4-2-9 oc purlins, except end verticals, and 2-0-0 oc purlins (4-0-7 max.): 3-6.
BOT CHORD	2x6 SPF 2100F 1.8E *Except* 13-15: 2x6 SPF No.2, 4-13: 2x4 SPF No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 13-14.
WEBS	2x4 SPF No.2 *Except* 8-10: 2x4 SPF 1650F 1.5E	WEBS	1 Row at midpt 2-15

REACTIONS. (lb/size) 15=6466/0-6-0, 9=6816/0-4-0
Max Horz 15=-129(LC 57)
Max Uplift 15=-587(LC 8), 9=-557(LC 9)
Max Grav 15=6576(LC 36), 9=7064(LC 36)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-5081/525, 3-4=-6562/678, 4-5=-6634/685, 5-16=-8161/841, 6-16=-8158/842, 6-7=-8701/874, 7-17=-9271/815, 8-17=-9418/801, 8-9=-5658/492
BOT CHORD 15-18=-248/2940, 18-19=-248/2940, 14-19=-248/2940, 13-14=-462/113, 4-12=-489/61, 12-20=-701/7640, 20-21=-701/7640, 21-22=-701/7640, 22-23=-701/7640, 11-23=-701/7640, 11-24=-742/8709, 24-25=-742/8709, 25-26=-742/8709, 10-26=-742/8709, 10-27=-51/520, 27-28=-51/520, 28-29=-51/520, 9-29=-51/520
WEBS 2-14=-366/4272, 3-14=-4258/425, 12-14=-523/5998, 3-12=-614/6171, 5-12=-1727/185, 5-11=-182/1212, 6-11=-242/2677, 7-11=-770/37, 7-10=-293/225, 2-15=-6377/611, 8-10=-713/8444

- NOTES-**
- 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-4-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-5-0 oc, 2x4 - 1 row at 0-9-0 oc.
Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
 - 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.
 - Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Bearing at joint(s) 15, 9 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.



November 23, 2020

Continued on page 2

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733221
2544696	C08	HIP GIRDER	1	2	Job Reference (optional)	

Builders First Source, Valley Center, KS 67147

8.240 s Apr 4 2020 MiTek Industries, Inc. Mon Nov 23 16:06:09 2020 Page 2
ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-yF?1iZnECRpK2WGY17ILYwCzbP5XXD2BtljeTyGFQi

NOTES-

- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 587 lb uplift at joint 15 and 557 lb uplift at joint 9.
- 12) 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.
- 13) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 14) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 718 lb down and 69 lb up at 1-8-12, 802 lb down and 70 lb up at 3-8-12, 777 lb down and 87 lb up at 5-8-12, 803 lb down and 88 lb up at 7-9-12, 742 lb down and 109 lb up at 9-8-12, 742 lb down and 109 lb up at 11-8-12, 742 lb down and 109 lb up at 13-8-12, 742 lb down and 109 lb up at 15-8-12, 814 lb down and 97 lb up at 17-8-12, 698 lb down and 74 lb up at 19-8-12, 643 lb down and 57 lb up at 21-8-12, 704 lb down and 58 lb up at 23-8-12, and 758 lb down and 60 lb up at 25-8-12, and 805 lb down and 56 lb up at 27-8-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-80, 3-6=-80, 6-8=-80, 13-15=-20, 9-12=-20

Concentrated Loads (lb)

Vert: 13=-803(B) 14=-777(B) 18=-718(B) 19=-802(B) 20=-742(B) 21=-742(B) 22=-742(B) 23=-742(B) 24=-814(B) 25=-698(B) 26=-628(B) 27=-704(B) 28=-758(B) 29=-805(B)

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733222
2544696	D01	HALF HIP GIRDER	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:24 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-E2wPcp2n6QPCBh1mq4QPA7QmeFyrnOP274rVZbyGLfr

Job Reference (optional)

0-10-8	2-9-0	7-2-12	12-0-0
0-10-8	2-9-0	4-5-12	4-9-4

Scale = 1:21.9

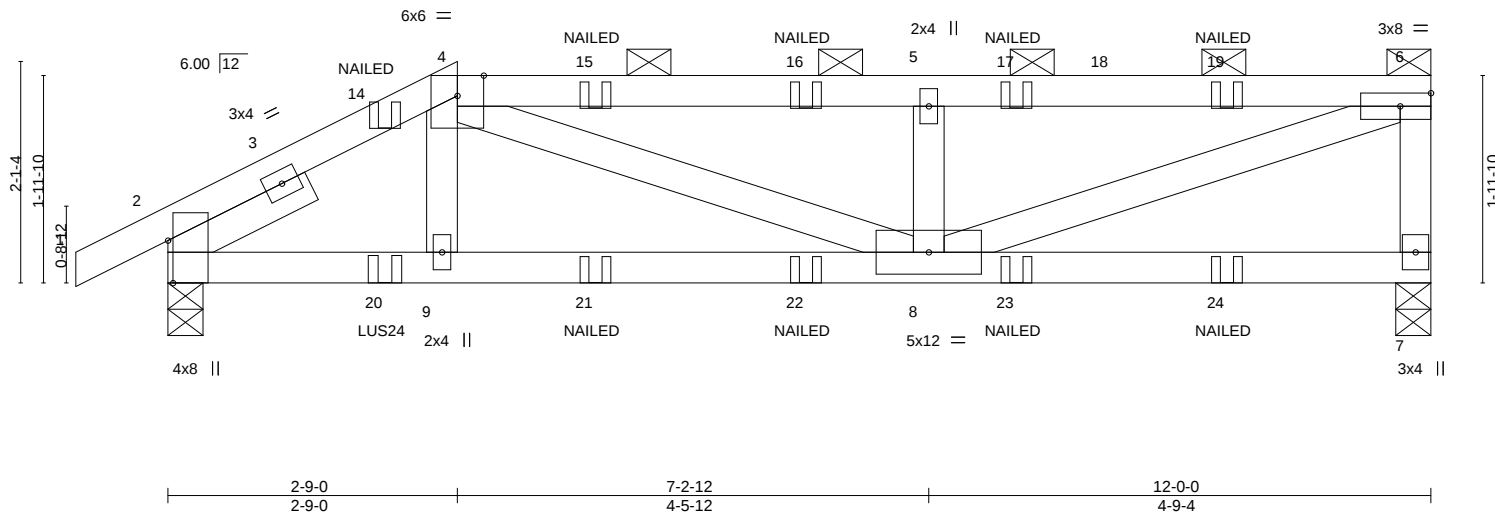


Plate Offsets (X,Y)-- [2:0-4-13,Edge]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	25.0	Plate Grip DOL	2-0-0	TC	0.67	in (loc)	L/d	MT20	GRIP
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.82	Vert(LL)	-0.07		197/144
TCDL	20.0	Rep Stress Incr	NO	WB	0.52	Vert(CT)	-0.13		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-MS		Horz(CT)	0.02		
BCDL	10.0							Weight: 46 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

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

REACTIONS. (size) 7=0-4-0, 2=0-4-0
Max Horz 2=55(LC 11)
Max Uplift 7=-65(LC 9), 2=-97(LC 12)
Max Grav 7=1095(LC 33), 2=1142(LC 34)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1603/143, 4-5=-2109/132, 5-6=-2105/131, 6-7=-1010/85
BOT CHORD 2-9=-149/1409, 8-9=-151/1393
WEBS 4-8=-14/762, 5-8=-793/114, 6-8=-138/2126

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 2.
 - 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.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
 - Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent at 2-0-12 from the left end to connect truss(es) to back face of bottom chord.
 - Fill all nail holes where hanger is in contact with lumber.
 - "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
 - 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 + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15



November 23, 2020

Continued on page 2

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733222
2544696	D01	HALF HIP GIRDER	1	1	Job Reference (optional)	

LOAD CASE(S) Standard
Uniform Loads (plf)
Vert: 1-4=-80, 4-6=-80, 7-10=-20
Concentrated Loads (lb)
Vert: 14=32(B) 15=-95(B) 16=-95(B) 17=-95(B) 19=-95(B) 20=-244(B) 21=-47(B) 22=-47(B) 23=-47(B) 24=-47(B)

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733223
2544696	D02	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:26 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-AR191U31e2gwR_B8xUSTFYVA63jxFL9LbOKcdUyGLfp

Job Reference (optional)

0-10-8	4-0-0	7-10-4	12-0-0
0-10-8	4-0-0	3-10-4	4-1-12

Scale = 1:21.7

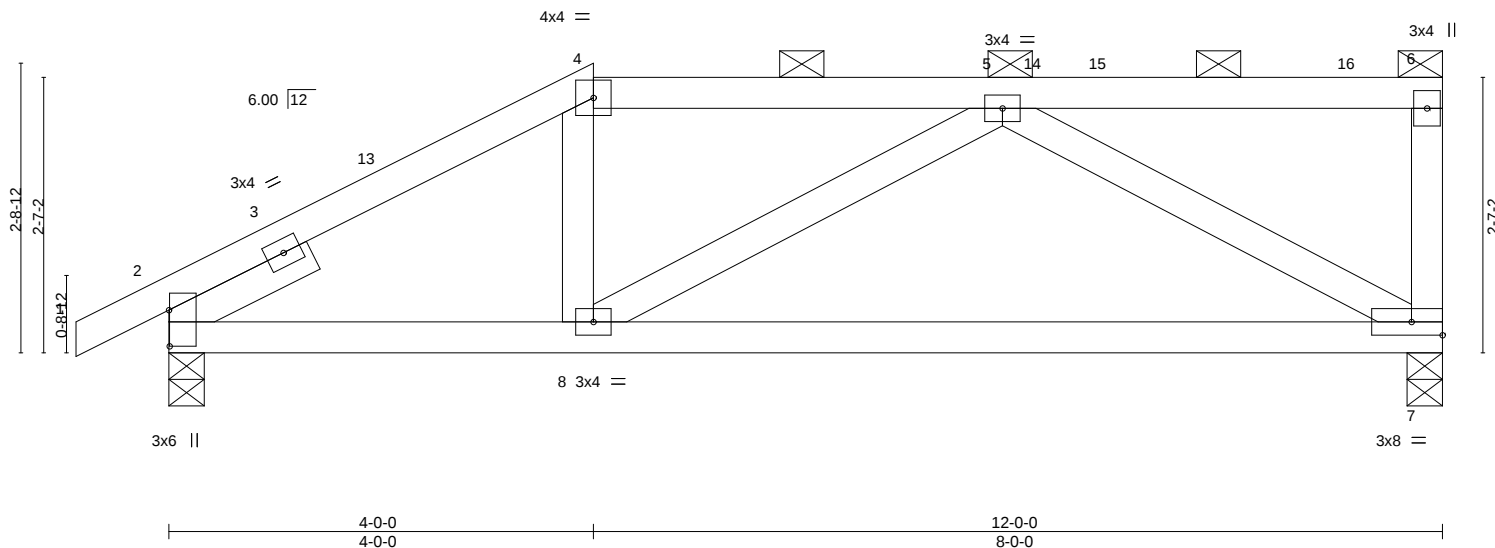


Plate Offsets (X,Y)-- [2:0-4,1:0-0,1]		4-0-0		12-0-0	
		4-0-0		8-0-0	

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.35	Vert(LL)	-0.10	7-8	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.46	Vert(CT)	-0.22	7-8	>651	180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.38	Horz(CT)	0.02	7	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS							Weight: 46 lb	FT = 20%
BCDL	10.0											

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

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

REACTIONS. (size) 2=0-4-0, 7=0-4-0
Max Horz 2=74(LC 15)
Max Uplift 2=-20(LC 16), 7=-41(LC 13)
Max Grav 2=767(LC 38), 7=789(LC 37)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-954/203, 4-5=-813/209
BOT CHORD 2-8=-227/820, 7-8=-234/923
WEBS 5-7=-979/243

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 4-0-0, Exterior(2R) 4-0-0 to 8-2-15, Interior(1) 8-2-15 to 11-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

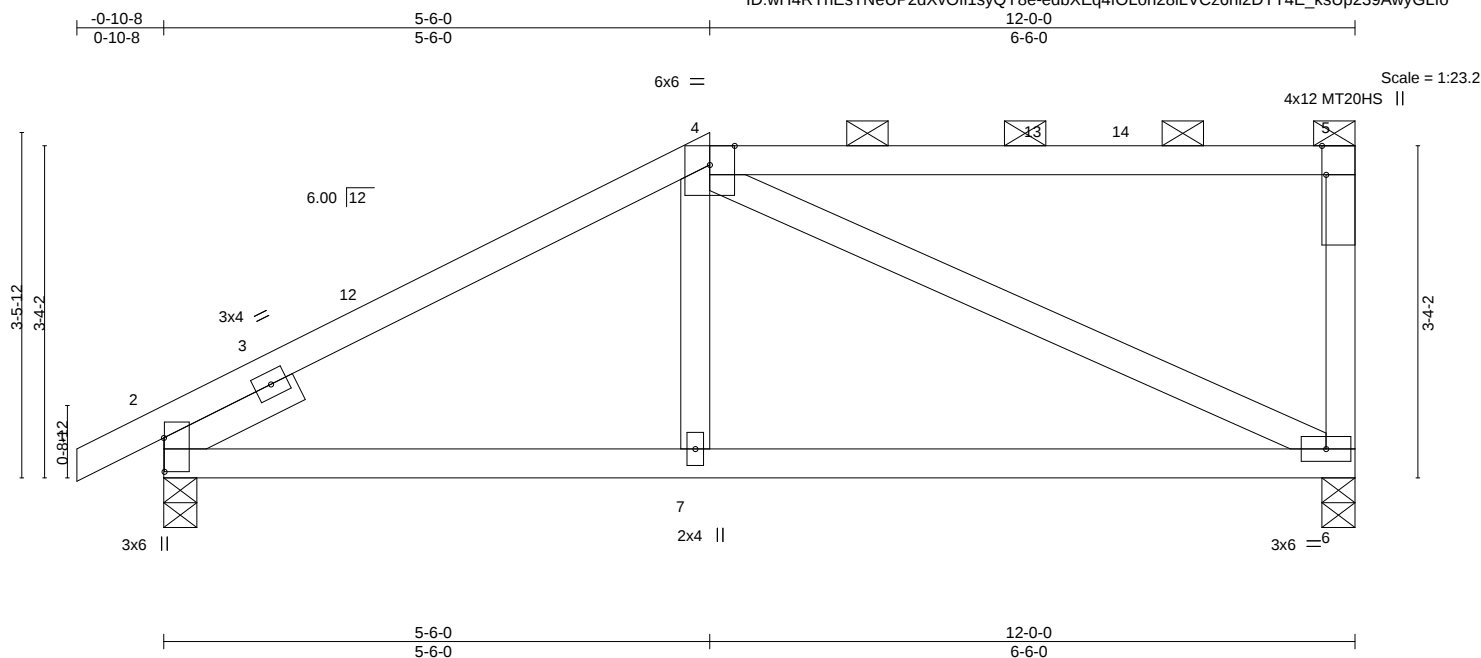


Plate Offsets (X,Y)-- [2:0-4-1,0-0-1], [5:0-3-8,Edge]									
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d		PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.89	Vert(LL)	-0.05 6-7 >999 240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.33	Vert(CT)	-0.09 6-7 >999 180	MT20HS	148/108
TCDL	20.0	Rep Stress Incr	YES	WB	0.60	Horz(CT)	0.01 2 n/a n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS				Weight: 45 lb	FT = 20%
BCDL	10.0								

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-

TOP CHORD	Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (4-10-14 max.): 4-5.
BOT CHORD	Rigid ceiling directly applied.

REACTIONS.

(size) 2=0-4-0, 6=0-4-0
 Max Horz 2=98(LC 15)
 Max Uplift 2=-26(LC 16), 6=-42(LC 13)
 Max Grav 2=830(LC 38), 6=748(LC 37)

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

TOP CHORD 2-4=-851/196, 5-6=-393/105
BOT CHORD 2-7=-254/701, 6-7=-256/695
WEBS 4-6=-681/231

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 5-6-0, Exterior(2R) 5-6-0 to 9-8-15, Interior(1) 9-8-15 to 11-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15) Plate DOL=1.15; Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 6) Provide adequate drainage to prevent water ponding.
- 7) All plates are MT20 plates unless otherwise indicated.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 6.
- 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- 12) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020



Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCS1 Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601.



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733225
2544696	D04	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:28 2020 Page 1
ID:wH4RYhEstNeUP2dXvOfi1syQY8e-6p9wSA5H9fdgIKX3vULKzbPosNljDve2ipjiNyGLfn

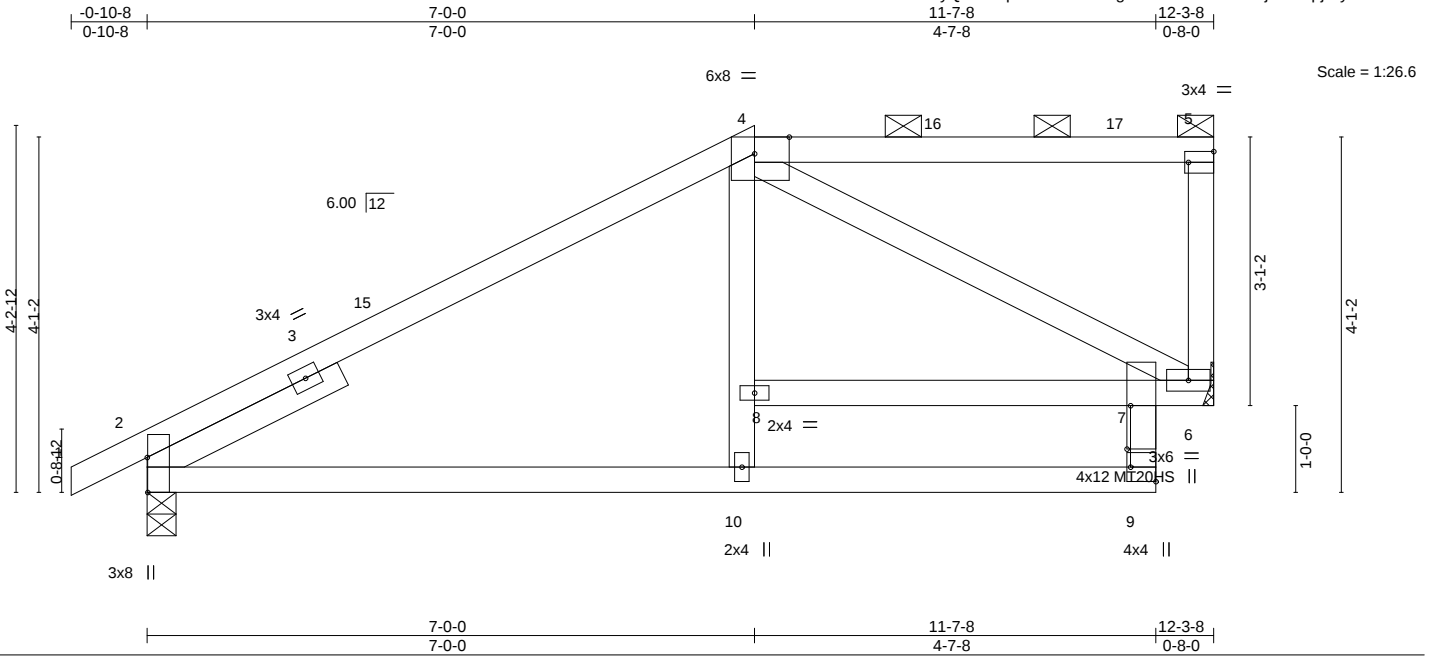


Plate Offsets (X,Y)-- [2:0-4-13,Edge], [4:0-4-13,Edge], [5:Edge,0-1-8], [7:0-6-0,0-0-8], [9:Edge,0-3-8]

LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.79	Vert(LL)	-0.11 10-13 >999 240	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.20 10-13 >742 180	MT20HS		148/108	
TCDL	20.0	Rep Stress Incr	YES	WB	0.49	Horz(CT)	0.07 6 n/a n/a				
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS							
BCDL	10.0										

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0

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

REACTIONS. (size) 6=Mechanical, 2=0-4-0
Max Horz 2=105(LC 13)
Max Uplift 6=-43(LC 13), 2=-30(LC 16)
Max Grav 6=717(LC 37), 2=893(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-735/166, 5-6=-305/80
BOT CHORD 2-10=-220/612, 9-10=-135/407, 7-8=-117/271, 6-7=-252/678
WEBS 4-6=-798/255

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 7-0-0, Exterior(2R) 7-0-0 to 11-2-15, Interior(1) 11-2-15 to 12-1-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- All plates are MT20 plates unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6, 2.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733227
2544696	D06	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:31 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-XOr24C7ASaICXm36k222ybD0Y4OFwcS4kg1NJhyGLfk

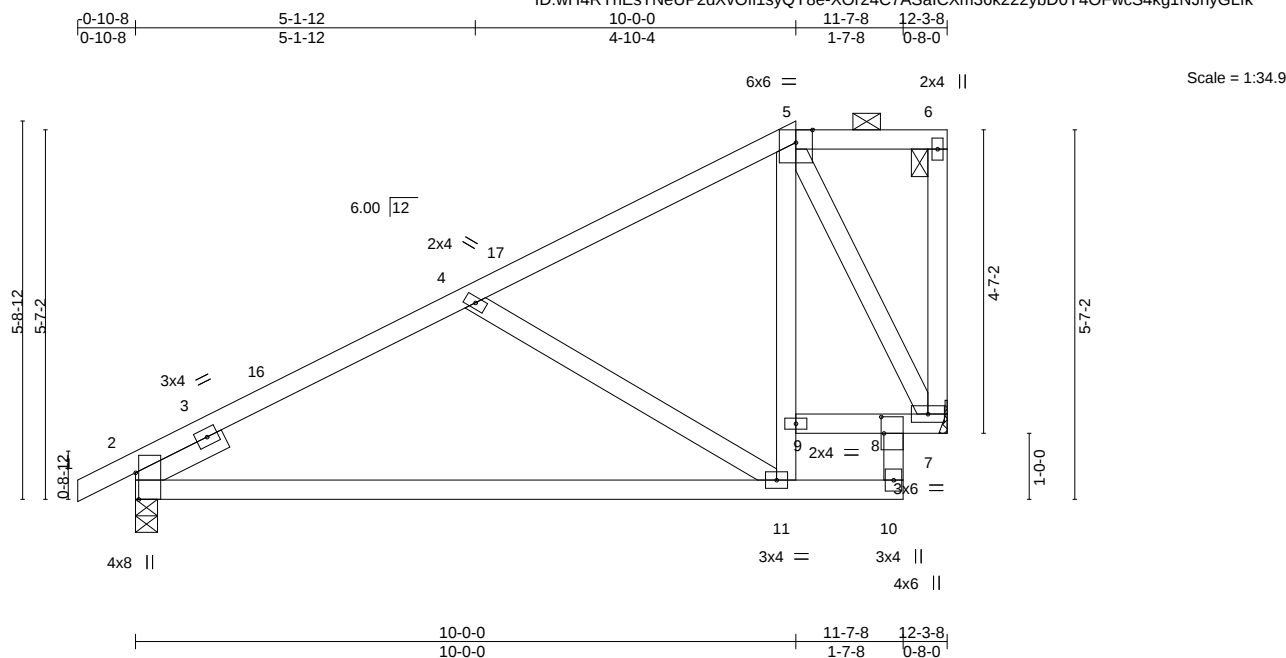


Plate Offsets (X,Y)-- [2:0-4-13,Edge], [8:0-3-0,0-0-8]												
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d				PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.44	Vert(LL)	-0.16	11-14	>939	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.58	Vert(CT)	-0.32	11-14	>456	180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.37	Horz(CT)	0.03	7	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS							Weight: 57 lb	FT = 20%
BCDL	10.0											

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2
 WEBS 2x4 SPF No.2
 SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-

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

REACTIONS.

(size) 7=Mechanical, 2=0-4-0
 Max Horz 2=152(LC 13)
 Max Uplift 7=-45(LC 13), 2=-32(LC 16)
 Max Grav 7=719(LC 38), 2=955(LC 38)

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

TOP CHORD 2-4=-1017/181, 4-5=-495/113
 BOT CHORD 2-11=-310/893, 10-11=-109/266, 7-8=-129/311
 WEBS 4-11=-676/217, 9-11=-20/499, 5-9=-42/427, 5-7=-709/183

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 10-0-0, Exterior(2E) 10-0-0 to 12-1-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 2.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733228
2544696	D07	HALF HIP	1	1		

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:32 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-7aPQHY8oDtQ39veIIlZHUpI91Ui8fzQDzKnwr8yGLfj

0-10-8 5-10-12 11-6-0 12-3-8
0-10-8 5-10-12 5-7-4 0-9-8

6x12 MT20HS =

Scale = 1:41.4

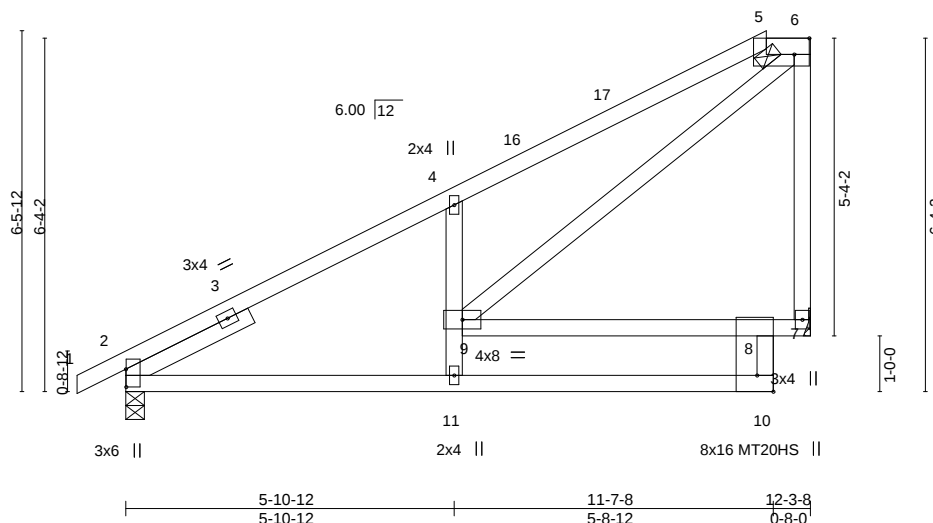


Plate Offsets (X,Y)-- [2:0-3-13,0-0-1], [5:0-3-4,Edge], [5:0-0-0,0-1-2], [8:0-0-0,0-1-12], [10:Edge,0-3-8], [10:0-0-0,0-1-12]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.52	Vert(LL) -0.08	11-14	>999	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.73	Vert(CT) -0.14	11-14	>999	180	MT20HS	148/108
TCDL 20.0	Rep Stress Incr YES	WB 0.71	Horz(CT) 0.08	7	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS						
BCDL 10.0							Weight: 59 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (5-5-15 max.): 5-6.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 7=Mechanical, 2=0-4-0
Max Horz 2=176(LC 13)
Max Uplift 7=-54(LC 16), 2=-29(LC 16)
Max Grav 7=811(LC 38), 2=967(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-954/143, 4-5=-1262/270, 5-6=-975/273, 6-7=-670/250
BOT CHORD 2-11=-265/853, 10-11=-124/532, 8-9=-542/155
WEBS 4-9=-772/293, 6-9=-342/1285

- 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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 11-6-0, Exterior(2E) 11-6-0 to 12-1-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - 4) Unbalanced snow loads have been considered for this design.
 - 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - 6) Provide adequate drainage to prevent water ponding.
 - 7) All plates are MT20 plates unless otherwise indicated.
 - 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 9) Refer to girder(s) for truss to truss connections.
 - 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 2.
 - 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
 - 12) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - 13) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733229
2544696	D08	JACK-CLOSED	5	1		

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:33 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-TnypVu8Q_BYwm3DUsT4W10IHet5ROQkNC_WUNayGLfi

0-10-8 5-11-8 11-7-8 12-3-8
0-10-8 5-11-8 5-8-0 0-8-0

Scale = 1:38.4

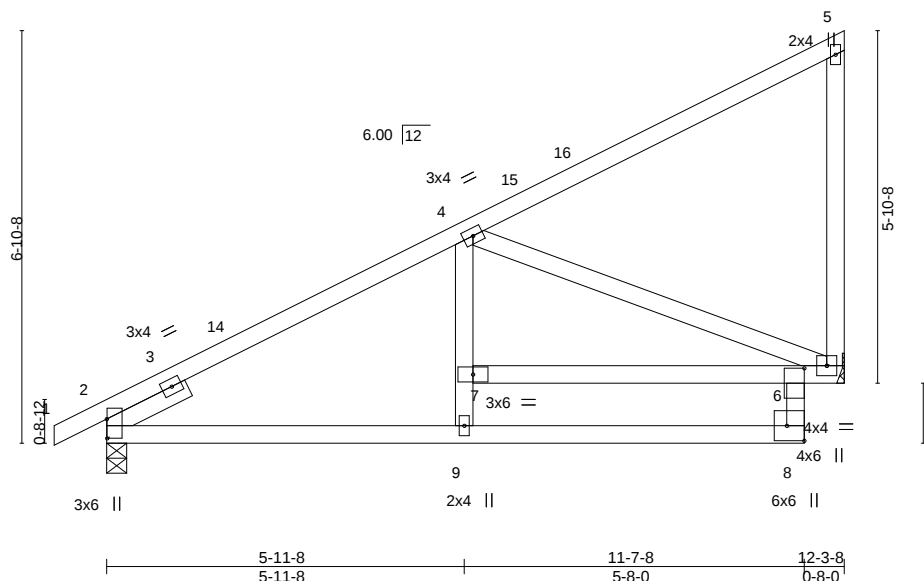


Plate Offsets (X,Y)-- [2:0-3-13,0-0-1], [6:0-0-8,0-4-8], [8:Edge,0-3-8]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.72	Vert(LL) -0.06	6-7	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.47	Vert(CT) -0.11	9-12	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.71	Horz(CT) 0.08	6	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS							
BCDL 10.0								Weight: 57 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 2=0-4-0, 6=Mechanical
Max Horz 2=174(LC 16)
Max Uplift 6=-54(LC 16)
Max Grav 2=781(LC 2), 6=819(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-854/0
BOT CHORD 2-9=-185/745, 8-9=-69/456, 6-8=-34/350, 6-7=-164/409
WEBS 4-7=0/289, 5-6=-291/128, 4-6=-928/250

- NOTES-**
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 12-1-12 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - 3) Unbalanced snow loads have been considered for this design.
 - 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 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.
 - 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733230
2544696	D09	JACK-CLOSED	3	1		

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:34 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-xzWBIE92IVgnODohPAblaEqW2HUB7w1WQeG1v0yGLfh

0-10-8	6-1-12	12-3-8
0-10-8	6-1-12	6-1-12

Scale = 1:38.3

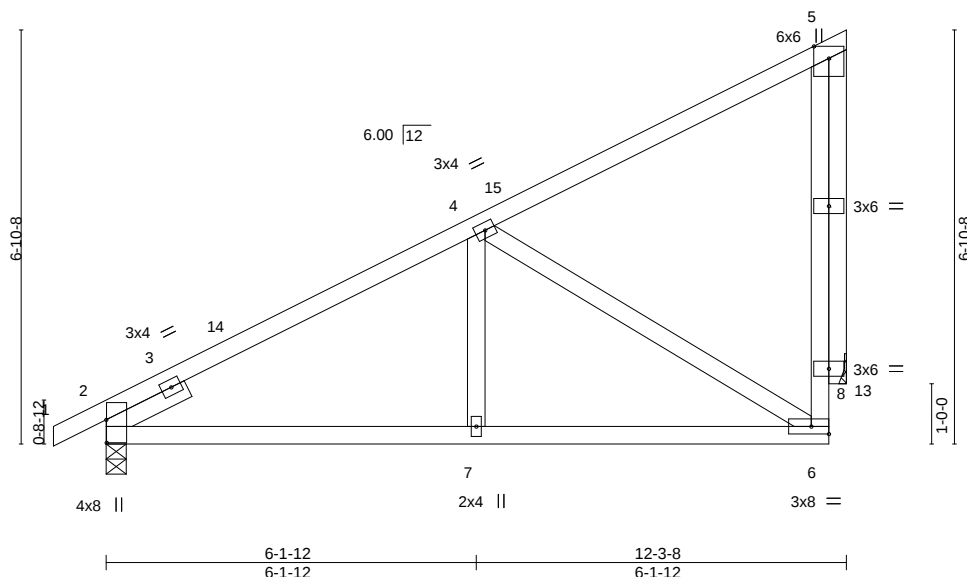


Plate Offsets (X,Y)-- [2:0-4-9,0-0-1]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.48	Vert(LL) -0.03	6-7	>999	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.31	Vert(CT) -0.05	6-7	>999	180		
TCDL 20.0	Rep Stress Incr YES	WB 0.58	Horz(CT) 0.02	13	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS						
BCDL 10.0							Weight: 57 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2
 WEBS 2x4 SPF No.2
 OTHERS 2x4 SPF No.2
 SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals.
 BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 2=0-4-0, 13=Mechanical
 Max Horz 2=157(LC 16)
 Max Uplift 2=-5(LC 16), 13=-82(LC 16)
 Max Grav 2=754(LC 2), 13=702(LC 23)

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

TOP CHORD 2-4=-830/146, 6-8=-76/447, 5-8=-76/447
 BOT CHORD 2-7=-185/710, 6-7=-185/710
 WEBS 4-7=0/252, 4-6=-745/189, 5-13=-705/152

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 11-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 13.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



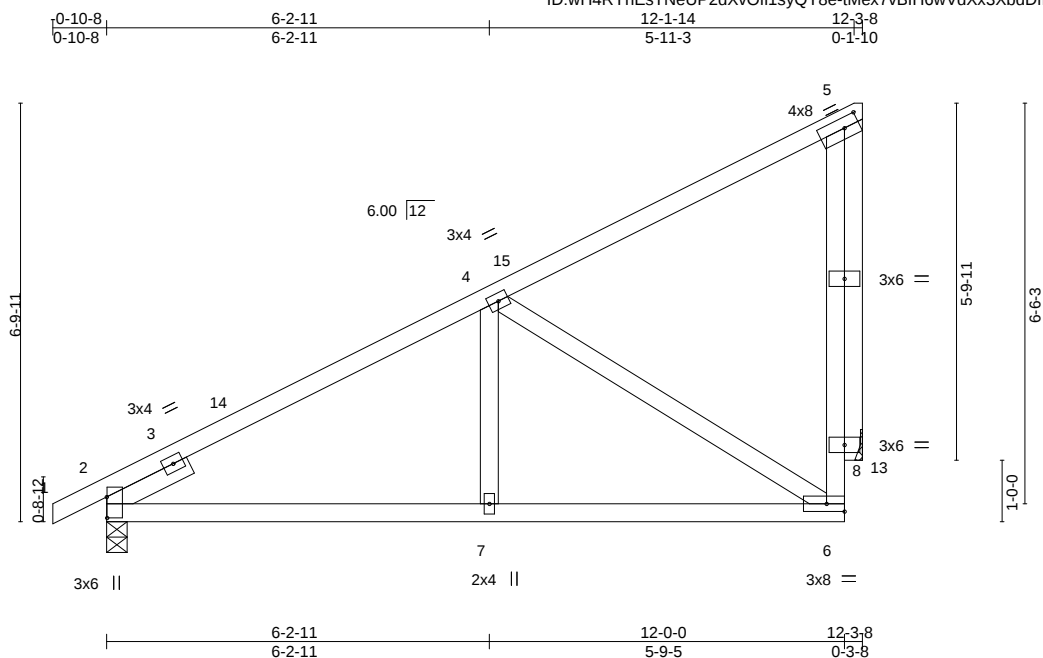
16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733231
2544696	D10	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:36 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-tMex7vBIH6wVdXx3XbdDfwsj5Acqbmpuxl8_vyGLff



Scale = 1:37.5

Plate Offsets (X,Y)-- [2-0-4-1,0-0-1], [5-0-2-15,0-2-0]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.47	Vert(LL)	-0.02	6-7	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.31	Vert(CT)	-0.06	7-11	>999	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.56	Horz(CT)	0.02	13	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS							
BCDL 10.0	Code IRC2018/TPI2014								
								Weight: 57 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 2=0-4-0, 13=Mechanical
Max Horz 2=157(LC 16)
Max Uplift 2=-5(LC 16), 13=-82(LC 16)
Max Grav 2=754(LC 2), 13=702(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-812/39, 6-8=-82/448, 5-8=-82/448
BOT CHORD 2-7=-190/697, 6-7=-190/697
WEBS 4-7=0/254, 4-6=-736/198, 5-13=-705/152

- NOTES-**
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 11-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - 3) Unbalanced snow loads have been considered for this design.
 - 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 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, 13.
 - 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733232
2544696	D11	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:37 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-LYCJkFCx2Q2MFhWG5i8SBsS2yvWrKJ0y6bUhWLyGLfe

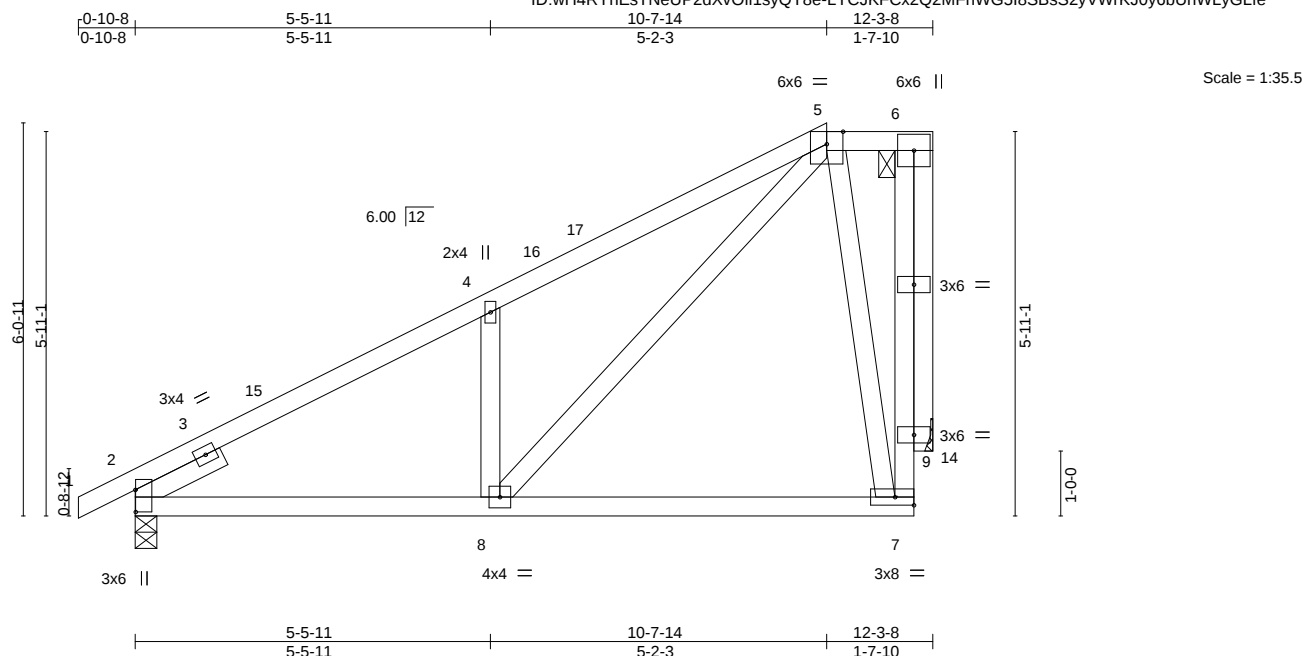


Plate Offsets (X,Y)-- [2:0-4-1,0-0-1]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.44				MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.31					
TCDL	20.0	Rep Stress Incr	YES	WB	0.43					
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS						
BCDL	10.0								Weight: 61 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

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

REACTIONS. (size) 2=0-4-0, 14=Mechanical
Max Horz 2=139(LC 16)
Max Uplift 2=-14(LC 16), 14=-62(LC 16)
Max Grav 2=967(LC 38), 14=732(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1062/72, 4-5=-1162/199, 7-9=-235/805, 6-9=-235/805
BOT CHORD 2-8=-244/911
WEBS 4-8=-638/226, 5-8=-239/1029, 5-7=-757/264, 6-14=-734/194

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 10-7-14, Exterior(2E) 10-7-14 to 11-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733233
2544696	D12	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:38 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-pkmiYbCZpjADtq5Se0ghk4?ECupP3ok6LFEF2nyGLfd

-0-10-8	4-8-11	9-1-14	12-3-8
0-10-8	4-8-11	4-5-3	3-1-10

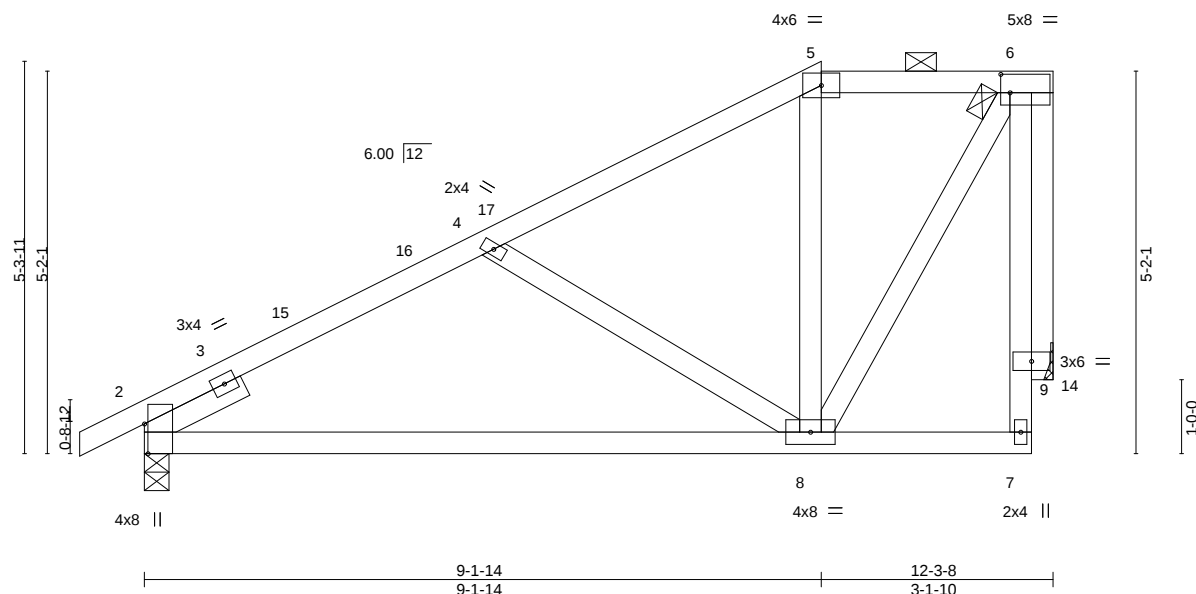


Plate Offsets (X,Y)-- [2:0-4-13,Edge], [6:0-1-8,0-3-0]									
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d		PLATES GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.35	Vert(LL)	-0.11 8-12 >999 240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.48	Vert(CT)	-0.22 8-12 >664 180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.27	Horz(CT)	0.02 14 n/a n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS				Weight: 59 lb	FT = 20%
BCDL	10.0								

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

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

REACTIONS. (size) 2=0-4-0, 14=Mechanical
Max Horz 2=118(LC 16)
Max Uplift 2=20(LC 16), 14=41(LC 16)
Max Grav 2=947(LC 38), 14=648(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1028/141, 4-5=-579/62, 5-6=-408/101
BOT CHORD 2-8=-282/907
WEBS 4-8=-591/195, 6-8=-170/706, 6-14=-650/173

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 9-1-14, Exterior(2E) 9-1-14 to 11-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

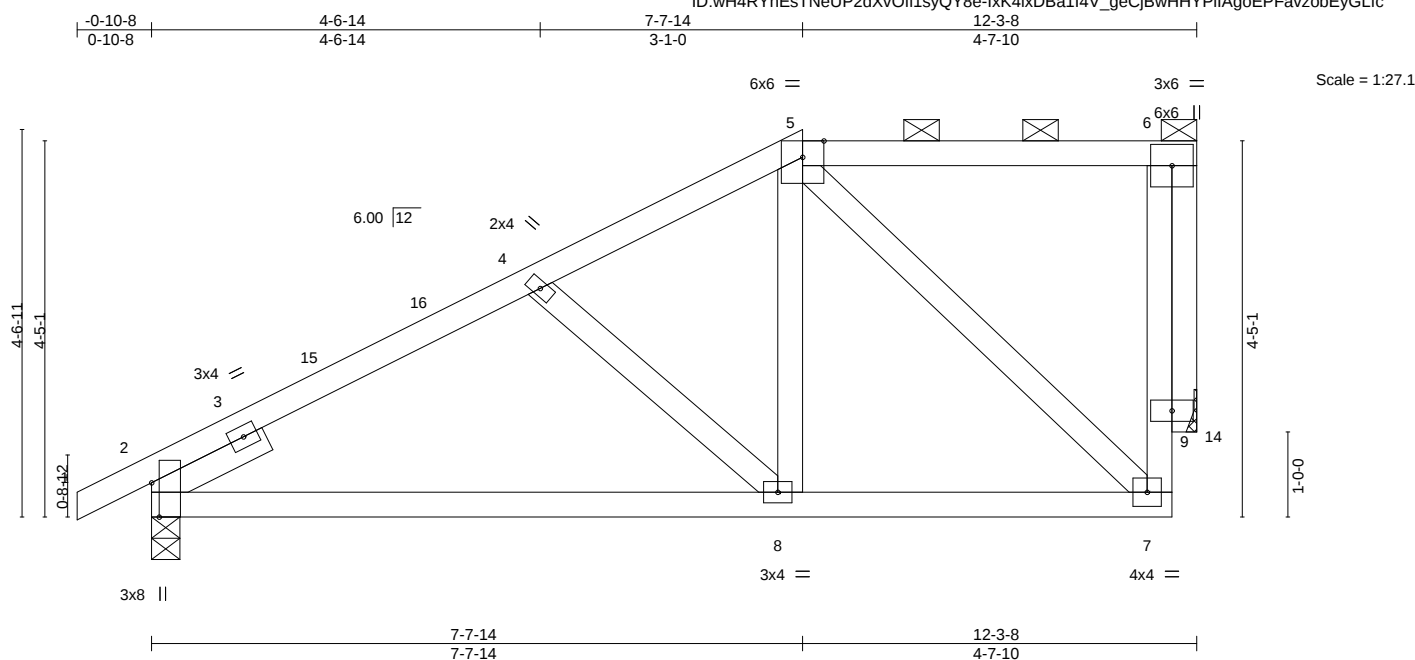


Plate Offsets (X,Y)-- [2-0-4-13,Edge]									
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d		PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.36	Vert(LL)	-0.05 8-12 >999 240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.35	Vert(CT)	-0.11 8-12 >999 180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.38	Horz(CT)	0.02 14 n/a n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS				Weight: 55 lb	FT = 20%
BCDL	10.0								

LUMBER-		BRACING-	
TOP CHORD	2x4 SPF No.2	TOP CHORD	Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 5-6.
BOT CHORD	2x4 SPF No.2	BOT CHORD	Rigid ceiling directly applied.
WEBS	2x4 SPF No.2		
OTHERS	2x4 SPF No.2		
SLIDER	Left 2x4 SPF No.2 1-6-0		

REACTIONS. (size) 2=0-4-0, 14=Mechanical
Max Horz 2=98(LC 16)
Max Uplift 2=-22(LC 16), 14=-34(LC 13)
Max Grav 2=915(LC 38), 14=644(LC 37)

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

TOP CHORD	2-4=-962/162, 4-5=-670/119, 7-9=-105/472, 6-9=-105/472
BOT CHORD	2-8=-272/841, 7-8=-151/507
WEBS	5-8=-47/397, 5-7=-616/161, 4-8=-423/159, 6-14=-651/168

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 7-7-14, Exterior(2E) 7-7-14 to 11-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCELL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 6) Provide adequate drainage to prevent water ponding.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 8) Refer to girder(s) for truss to truss connections.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 14.
- 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- 12) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020



Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCS1 Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601.



16023 Swingley Ridge Rd
Chesterfield, MO 63017

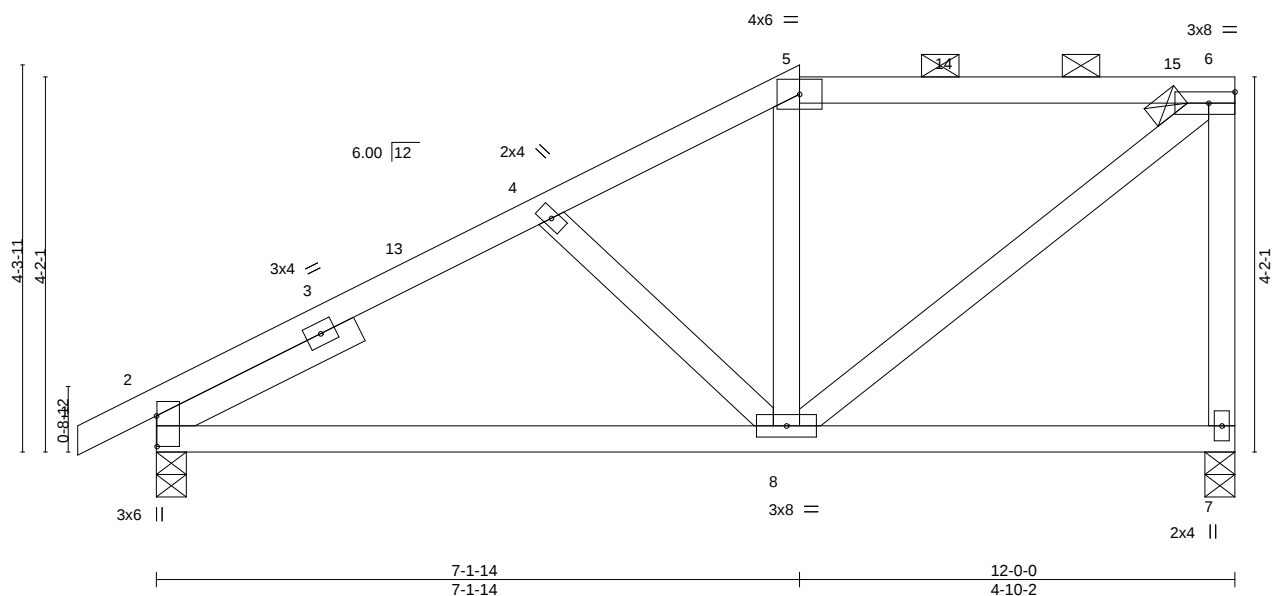
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733235
2544696	D14	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:41 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-EJRqAdFR5eYnklq1K8DOMidiC6tgGAFY1DSvf6yGLfa

-0-10-8	4-4-12	7-1-14	12-0-0
0-10-8	4-4-12	2-9-2	4-10-2



Scale = 1:25.6

Plate Offsets (X,Y)-- [2:0-4-1,0-0-1]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.49	Vert(LL) -0.04	8-11	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.32	Vert(CT) -0.08	8-11	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.16	Horz(CT) 0.01	7	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS							
BCDL 10.0								Weight: 51 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0

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

REACTIONS. (size) 7=0-4-0, 2=0-4-0
Max Horz 2=124(LC 15)
Max Uplift 7=-43(LC 13), 2=-31(LC 16)
Max Grav 7=686(LC 37), 2=883(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-895/191, 4-5=-666/171, 5-6=-530/176, 6-7=-642/217
BOT CHORD 2-8=-320/800
WEBS 6-8=-212/653, 4-8=-374/145

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 7-1-14, Exterior(2R) 7-1-14 to 11-4-13, Interior(1) 11-4-13 to 11-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 2.
 - 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



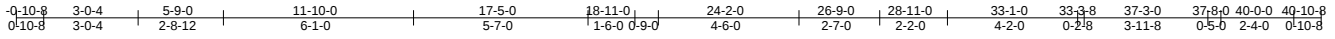
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733236
2544696	D15	ROOF SPECIAL GIRDER	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:47 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-3Tp5RgJChUJxSDHBgPKobzttdTWlygnwRQ9vDtmyGLfU



Scale = 1:73.7

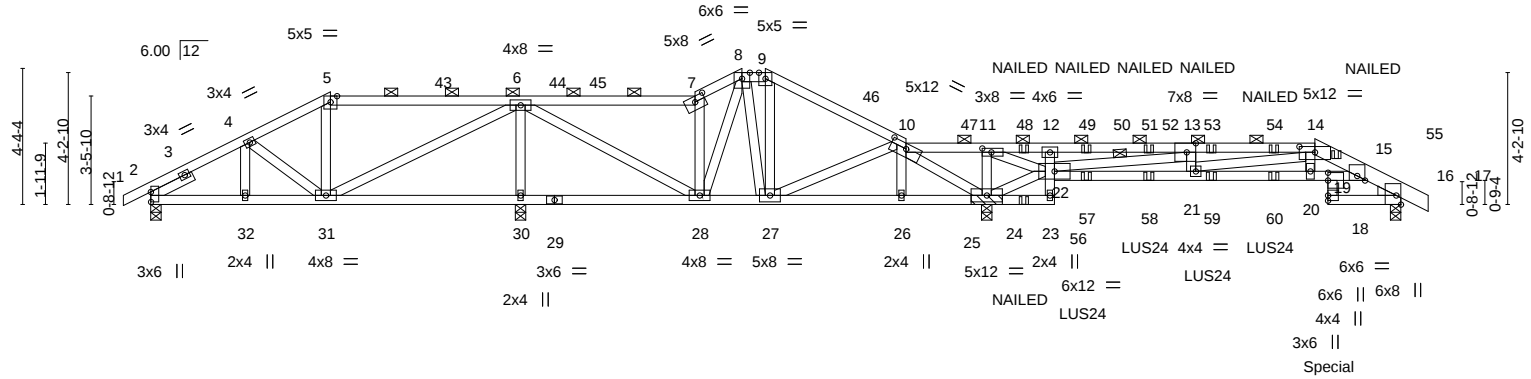


Plate Offsets (X,Y)--	[2:0-3-13,0-0-1], [7:0-4-0,0-2-1], [10:0-6-0,0-2-0], [11:0-3-8,0-1-8], [13:0-3-8,Edge], [14:0-6-0,0-2-3], [16:Edge,0-1-13], [16:0-0-14,0-6-7], [16:0-0-7,0-0-14], [19:0-3-0,0-0-0]
-----------------------	--

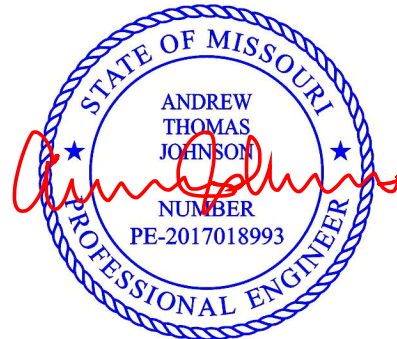
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	TC 0.95	Vert(LL)	-0.19	20-21	>833	MT20	197/144
Snow (Pf)	20.0	BC 0.96	Vert(CT)	-0.30	20-21	>522		
TCDL	20.0	WB 0.60	Horz(CT)	0.08	16	n/a		
BCLL	0.0	Matrix-MS						
BCDL	10.0						Weight: 175 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD	TOP CHORD
14-17: 2x6 SPF No.2	Structural wood sheathing directly applied or 4-1-11 oc purlins, except
BOT CHORD	BOT CHORD
15-22: 2x4 SPF 1650F 1.5E	2-0-0 oc purlins (2-6-8 max.): 5-7, 8-9, 10-14.
WEBS	WEBS
WEDGE	10-0-0 oc bracing: 19-20
Right: 2x4 SPF No.2	1 Row at midpt
SLIDER	13-22
Left 2x4 SPF No.2 1-6-0	

REACTIONS.	All bearings 0-4-0 except (jt=length) 24=0-4-6 (input: 0-4-0 + bearing block).
(lb) - Max Horz	2=-44(LC 121)
Max Uplift	All uplift 100 lb or less at joint(s) 2 except 16=-139(LC 13), 30=-175(LC 123), 24=-199(LC 13)
Max Grav	All reactions 250 lb or less at joint(s) except 2=759(LC 46), 16=1057(LC 45), 30=1629(LC 97), 24=2785(LC 45)

FORCES.	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	2-4=-804/66, 4-5=-604/65, 5-6=-521/73, 6-7=-474/146, 7-8=-557/170, 8-9=-476/191, 9-10=-623/191, 10-11=-176/2369, 11-12=-48/782, 12-13=-22/480, 13-14=-3348/335, 14-15=-2982/352, 15-16=-892/137
BOT CHORD	2-32=-57/672, 31-32=-57/672, 30-31=-268/84, 28-30=-268/84, 27-28=-84/430, 26-27=-1093/470, 24-26=-1097/465, 12-22=-460/57, 21-22=-312/3348, 20-21=-293/2891, 19-20=-281/2770, 15-19=-232/2333, 16-18=-54/437
WEBS	4-31=-262/50, 6-31=-75/790, 6-30=-1489/227, 6-28=-182/836, 7-28=-605/120, 8-28=-46/393, 9-27=-315/63, 10-27=-114/1242, 13-22=-3858/364, 13-21=-41/527, 11-24=-971/101, 22-24=-2297/212, 11-22=-151/1734, 10-24=-1609/96, 14-20=-71/759, 14-21=-62/468

NOTES-	
1)	2x4 SPF No.2 bearing block 12" long at jt. 24 attached to front face with 2 rows of 10d (0.131"x3") nails spaced 3" o.c. 8 Total fasteners. Bearing is assumed to be SPF No.2.
2)	Unbalanced roof live loads have been considered for this design.
3)	Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
4)	TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
5)	Unbalanced snow loads have been considered for this design.
6)	This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
7)	Provide adequate drainage to prevent water ponding.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	D15	ROOF SPECIAL GIRDER	1	1	I43733236
Job Reference (optional)					

- NOTES-**
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 16=139, 30=175, 24=199.
 - 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.
 - 12) Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent spaced at 2-0-0 oc max. starting at 29-11-4 from the left end to 35-11-4 to connect truss(es) to front face of bottom chord.
 - 13) Fill all nail holes where hanger is in contact with lumber.
 - 14) "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
 - 15) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 244 lb down and 39 lb up at 37-9-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
 - 16) 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 + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-5=-80, 5-7=-80, 7-8=-80, 8-9=-80, 9-10=-80, 10-14=-80, 14-17=-80, 23-33=-20, 19-22=-20, 18-40=-20

Concentrated Loads (lb)

Vert: 19=-244(F) 48=-95(F) 49=41(F) 51=41(F) 53=41(F) 54=41(F) 55=32(F) 56=-47(F) 57=-232(F) 58=-232(F) 59=-232(F) 60=-232(F)

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733237
2544696	D16	ROOF SPECIAL	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:50 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-T2UE3iM5_PhWJh0ILXtVdcVEakwgt9Nt678tU5yGLfR

Job Reference (optional)

0-10-8	4-3-0	7-11-10	11-10-0	15-11-0	17-5-0	21-2-0	26-11-0
0-10-8	4-3-0	3-8-10	3-10-6	4-1-0	1-6-0	3-9-0	5-9-0

Scale: 1/4"=1'

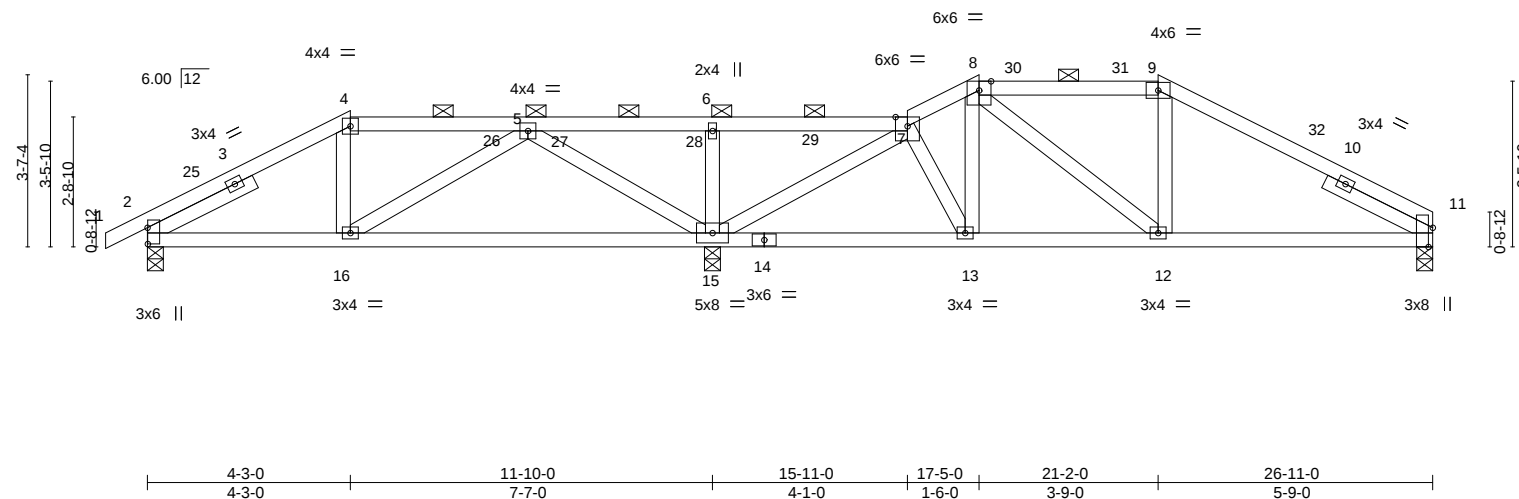


Plate Offsets (X,Y)-- [2:0-4-1,0-0-1], [11:0-4-13,Edge]											
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d			PLATES GRIP		
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.51	Vert(LL)	-0.07 15-16	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.39	Vert(CT)	-0.14 15-16	>990	180		
TCDL	20.0	Rep Stress Incr	YES	WB	0.55	Horz(CT)	0.02 11	n/a	n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS						Weight: 105 lb	FT = 20%
BCDL	10.0										

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x4 SPF No.2	2-0-0 oc purlins (6-0-0 max.): 4-7, 8-9.
WEBS 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied.
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0	

REACTIONS. (size) 11=0-4-0, 2=0-4-0, 15=0-4-0
Max Horz 2=37(LC 20)
Max Uplift 11=-31(LC 17), 2=-47(LC 16), 15=-59(LC 16)
Max Grav 11=832(LC 46), 2=692(LC 46), 15=1996(LC 45)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-600/119, 4-5=-547/136, 5-6=-1/675, 6-7=-1/678, 7-8=-747/192, 8-9=-848/218, 9-11=-967/196
BOT CHORD 2-16=-68/543, 15-16=-62/300, 13-15=-106/596, 12-13=-85/636, 11-12=-109/845
WEBS 6-15=-525/90, 7-15=-1355/202, 8-12=-48/279, 5-16=-13/343, 5-15=-1152/162

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 4-3-0, Exterior(2R) 4-3-0 to 7-3-0, Interior(1) 7-3-0 to 17-5-0, Exterior(2R) 17-5-0 to 20-5-0, Interior(1) 20-5-0 to 21-2-0, Exterior(2R) 21-2-0 to 24-2-0, Interior(1) 24-2-0 to 26-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 2, 15.
 - 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733238
2544696	D17	ROOF SPECIAL GIRDER	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

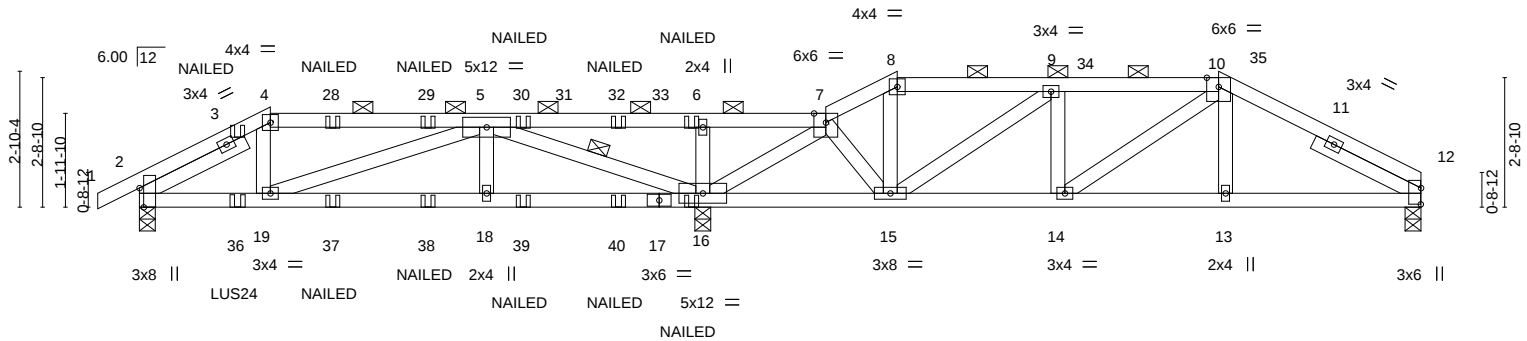
8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:54 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-LpkIv3Pb2eBxoIKXaNyRNSgrDLFWp?YT1I65dsyGLfN

Job Reference (optional)

0-10-8	2-9-0	7-3-8	11-10-0	14-5-0	15-11-0	19-3-8	22-8-0	26-11-0
0-10-8	2-9-0	4-6-8	4-6-8	2-7-0	1-6-0	3-4-8	3-4-8	4-3-0

Scale: 1/4"=1'



2-9-0	7-3-8	11-10-0	14-5-0	15-11-0	19-3-8	22-8-0	26-11-0
2-9-0	4-6-8	4-6-8	2-7-0	1-6-0	3-4-8	3-4-8	4-3-0

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

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.85	in (loc) l/defl L/d	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.56	Vert(LL) -0.05 18-19 >999 240		
TCDL 20.0	Lumber DOL 1.15	WB 0.41	Vert(CT) -0.10 18-19 >999 180		
BCLL 0.0	Rep Stress Incr NO	Matrix-MS	Horz(CT) 0.04 12 n/a n/a		
BCDL 10.0	Code IRC2018/TPI2014			Weight: 107 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-9-2 oc purlins, except 2-0-0 oc purlins (4-8-14 max.): 4-7, 8-10.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 15-16.
WEBS 1 Row at midpt 5-16

REACTIONS. (size) 12=0-4-0, 2=0-4-0, 16=0-4-0
Max Horz 2=30(LC 111)
Max Uplift 12=38(LC 108), 2=-110(LC 12), 16=-100(LC 8)
Max Grav 12=726(LC 86), 2=988(LC 42), 16=2506(LC 41)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1259/132, 4-5=-1097/140, 5-6=-32/1225, 6-7=-31/1225, 7-8=-552/157, 8-9=-495/139, 9-10=-1061/133, 10-12=-974/89
BOT CHORD 2-19=-123/1117, 18-19=-106/1227, 16-18=-106/1227, 15-16=-186/273, 14-15=-101/1058, 13-14=-49/878, 12-13=-47/882
WEBS 4-19=0/319, 5-18=0/269, 5-16=-2574/145, 6-16=-596/84, 7-16=-1449/34, 7-15=-13/668, 9-15=-761/41, 10-14=-83/267

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 12, 16 except (jt=lb) 2=110.
 - 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.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
 - Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent at 2-0-12 from the left end to connect truss(es) to front face of bottom chord.
 - Fill all nail holes where hanger is in contact with lumber.
 - "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
 - In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).



November 23, 2020

LOAD CASE(S) Standard

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component**
Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

MiTek
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733238
2544696	D17	ROOF SPECIAL GIRDER	1	1	Job Reference (optional)	

LOAD CASE(S) Standard

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

Uniform Loads (plf)

Vert: 1-4=-80, 4-7=-80, 7-8=-80, 8-10=-80, 10-12=-80, 20-24=-20

Concentrated Loads (lb)

Vert: 16=-51(F) 6=-96(F) 3=32(F) 28=-95(F) 29=-95(F) 30=-95(F) 32=-95(F) 36=-244(F) 37=-47(F) 38=-47(F) 39=-47(F) 40=-47(F)

Job 2544696	Truss E02	Truss Type HALF HIP	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733239
----------------	--------------	------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:56 2020 Page 1
ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-ICrVKlQrZFRf1cTvio_vTslKL9w4HxylU3bChlyGLfL

-0-10-8 0-10-8	2-4-0 2-4-0	4-1-14 1-9-14	7-7-7 3-5-9	11-1-0 3-5-9	13-5-0 2-4-0
-------------------	----------------	------------------	----------------	-----------------	-----------------

Scale = 1:24.3

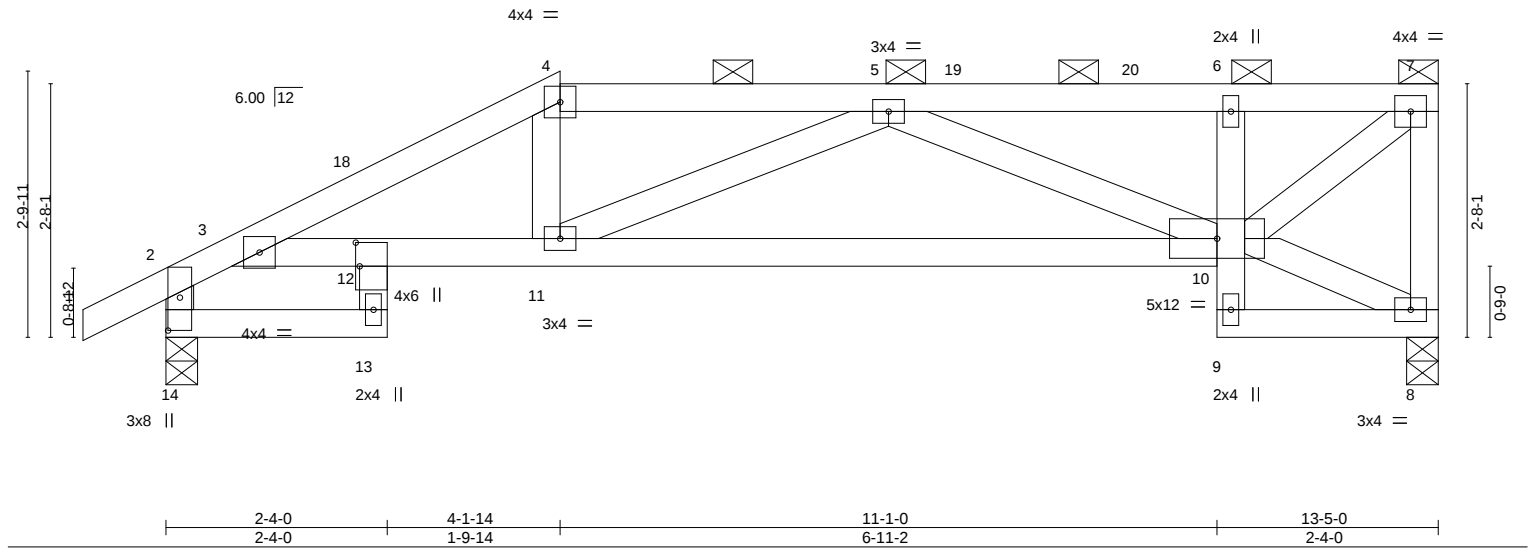


Plate Offsets (X,Y)-- [12:0-3-0,0-0-8], [14:0-4-3,0-1-8]							
LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc) l/defl L/d
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.30	Vert(LL)	-0.07 10-11 >999 240
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.58	Vert(CT)	-0.15 10-11 >999 180
TCDL	20.0	Rep Stress Incr	YES	WB	0.29	Horz(CT)	0.07 8 n/a n/a
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-AS			
BCDL	10.0						
						PLATES	GRIP
						MT20	197/144
						Weight: 55 lb	FT = 20%

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals, and
2-0-0 oc purlins (4-9-10 max.): 4-7.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 8=0-4-0, 14=0-4-0
Max Horz 14=80(LC 13)
Max Uplift 8=46(LC 13), 14=20(LC 16)
Max Grav 8=883(LC 37), 14=837(LC 38)

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

TOP CHORD 2-3=-554/122, 3-4=-1555/291, 4-5=-1367/295, 5-6=-1025/152, 6-7=-937/150,
7-8=-846/156, 2-14=-818/220
BOT CHORD 13-14=-158/264, 3-12=-187/1147, 11-12=-346/1396, 10-11=-354/1704, 6-10=-358/106
WEBS 4-11=-13/375, 7-10=-207/1179, 5-11=-373/92, 5-10=-745/209

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 4-1-14, Exterior(2R) 4-1-14 to 8-4-13, Interior(1) 8-4-13 to 13-3-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733240
2544696	E03	HALF HIP	1	1	Job Reference (optional)	

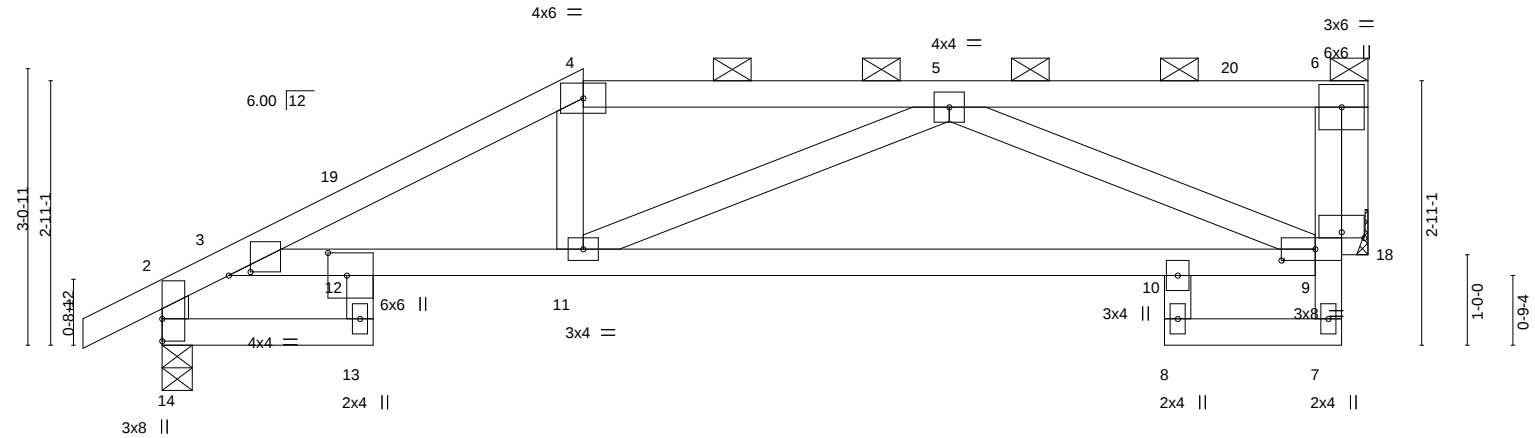
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:58 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-EbzGkRS65tiNGvdlpD1NYHqczybsloW2yN4lmdyGLfJ

-0-10-8	2-4-0	4-7-14	8-8-7	11-1-0	13-4-0
0-10-8	2-4-0	2-3-14	4-0-9	2-4-9	2-3-0

Scale = 1:25.5



	2-4-0	4-7-14	11-1-0	13-4-0
	2-4-0	2-3-14	6-5-2	2-3-0

Plate Offsets (X,Y)-- [2:0-0-14,0-1-12], [3:0-2-14,0-0-8], [9:0-3-0,0-0-12], [9:0-4-8,0-1-8], [12:0-3-0,0-2-8], [14:0-0-0,0-1-12]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	2-0-0	TC	0.49			MT20	197/144
Snow (Pf)	20.0	Plate Grip DOL	BC	0.69				
TCDL	20.0	Lumber DOL	WB	0.48				
BCLL	0.0	Rep Stress Incr	Matrix-AS					
BCDL	10.0	Code IRC2018/TPI2014						
							Weight: 53 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD	2x4 SPF No.2
BOT CHORD	2x4 SPF No.2
WEBS	2x4 SPF No.2
OTHERS	2x4 SPF No.2
	Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (4-10-13 max.): 4-6.
	Rigid ceiling directly applied.

REACTIONS. (size) 14=0-4-0, 18=Mechanical
Max Horz 14=67(LC 13)
Max Uplift 14=-19(LC 16), 18=-41(LC 13)
Max Grav 14=860(LC 38), 18=820(LC 37)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-587/101, 3-4=-1437/261, 4-5=-1270/276, 5-6=-270/0, 6-9=-86/578, 2-14=-839/217
BOT CHORD 13-14=-153/299, 3-12=-141/1031, 11-12=-292/1288, 10-11=-265/1412, 9-10=-213/1432
WEBS 4-11=0/296, 5-9=-1241/316, 6-18=-844/133

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 4-7-14, Exterior(2R) 4-7-14 to 8-8-7, Interior(1) 8-8-7 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 14, 18.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733241
2544696	E04	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:00:59 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-inXeynTksAqEu3CUNwYc4VNqRMzuUHmCA0psi4yGLfI

-0-10-8	2-4-0	3-9-6	6-1-14	9-5-7	11-1-0	13-4-0
0-10-8	2-4-0	1-5-6	2-4-8	3-3-9	1-7-9	2-3-0

Scale = 1:26.2

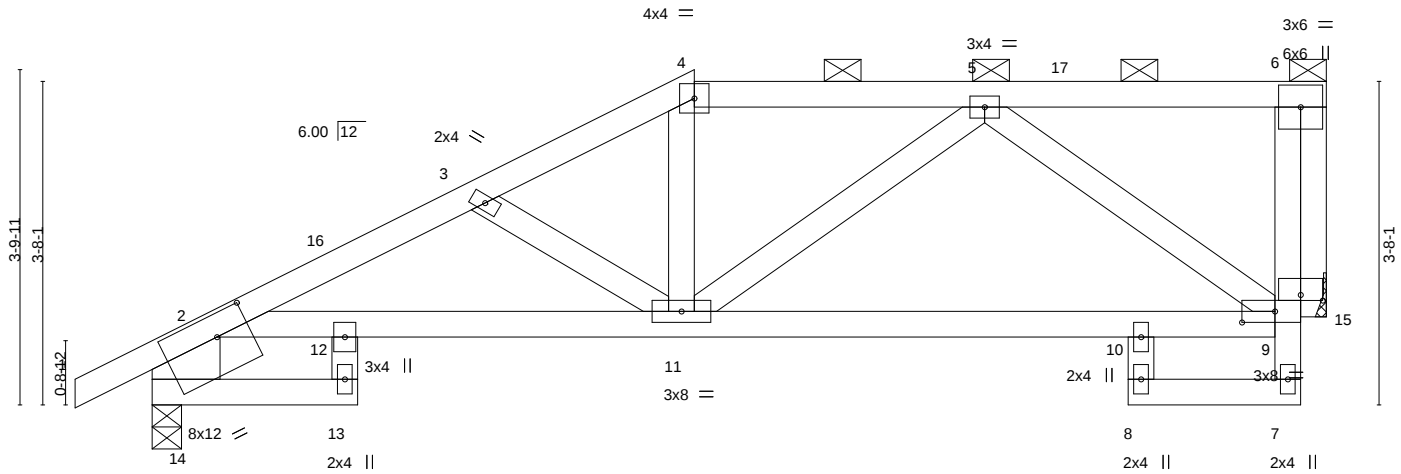


Plate Offsets (X,Y)--		[9:0-3-0,0-0-12], [9:0-4-8,0-1-8], [14:0-4-2,0-2-1], [14:0-4-8,0-3-0]							
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	25.0	Plate Grip DOL	2-0-0	TC	0.31	in (loc)	l/defl	MT20	GRIP
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.51	10-11	>999		197/144
TCDL	20.0	Rep Stress Incr	YES	WB	0.29	10-11	>999		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS		15	n/a		
BCDL	10.0							Weight: 60 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2
 WEBS 2x4 SPF No.2 *Except*
 2-14: 2x10 SP 2400F 2.0E
 OTHERS 2x4 SPF No.2

BRACING-

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

REACTIONS.

(size) 14=0-4-0, 15=Mechanical
 Max Horz 14=85(LC 13)
 Max Uplift 14=-21(LC 16), 15=-40(LC 13)
 Max Grav 14=935(LC 38), 15=766(LC 37)

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

TOP CHORD 2-3=-1342/299, 3-4=-1036/223, 4-5=-888/220, 6-9=-106/573, 2-14=-933/186
 BOT CHORD 2-12=-274/990, 11-12=-380/1156, 10-11=-191/836, 9-10=-166/843
 WEBS 5-11=-58/279, 5-9=-844/225, 3-11=-377/167, 6-15=-776/141

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 6-1-14, Exterior(2R) 6-1-14 to 10-4-13, Interior(1) 10-4-13 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 14, 15.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733242
2544696	E05	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:01 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-e9fONSU_Oo4y7NMTVL4aAwS5cAd4yC0UeKizMyyGLfG

0-10-8	2-4-0	4-9-11	7-7-14	11-1-0	13-4-0
0-10-8	2-4-0	2-5-11	2-10-3	3-5-2	2-3-0

Scale = 1:30.4

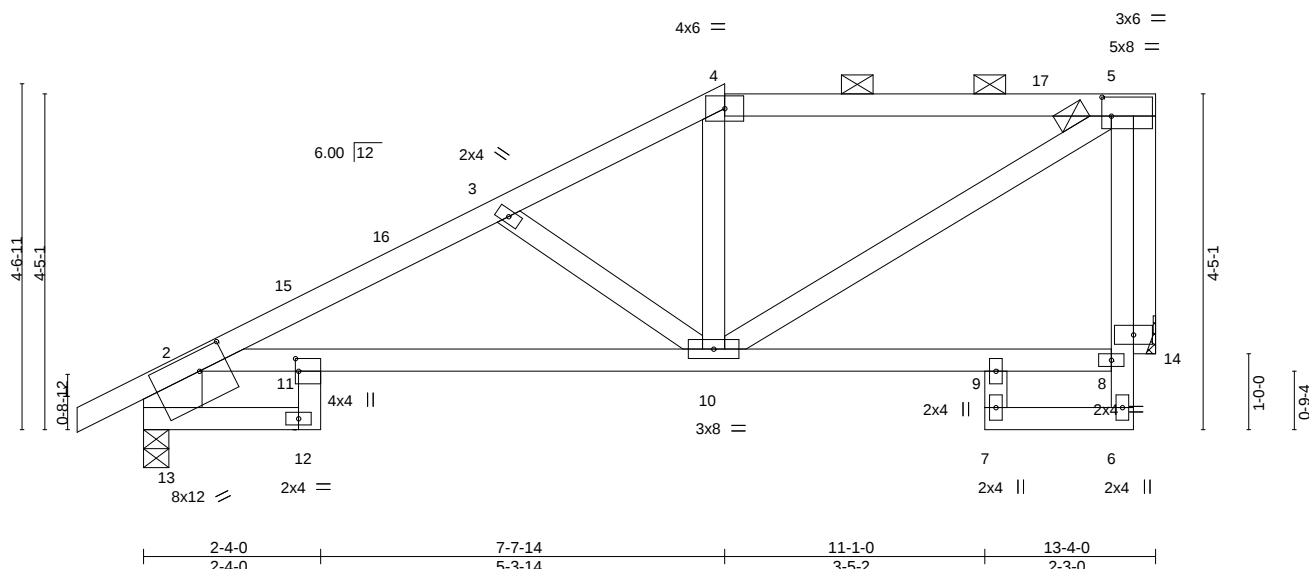


Plate Offsets (X, Y)-- [5:0-1-8,0-3-0], [11:0-2-0,0-0-8], [13:0-4-8,0-3-0], [13:0-4-2,0-2-1]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.59			MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.59				
TCDL	20.0	Rep Stress Incr	YES	WB	0.24				
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS					
BCDL	10.0							Weight: 61 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2
 WEBS 2x4 SPF No.2 *Except*
 2-13: 2x10 SP 2400F 2.0E
 OTHERS 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals, and
 2-0-0 oc purlins (5-5-11 max.): 4-5.
 BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 13=0-4-0, 14=Mechanical
 Max Horz 13=100(LC 13)
 Max Uplift 13=-22(LC 16), 14=-39(LC 13)
 Max Grav 13=986(LC 38), 14=713(LC 37)

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

TOP CHORD 2-3=-1322/259, 3-4=-891/186, 4-5=-728/194, 2-13=-986/179
 BOT CHORD 2-11=-230/941, 10-11=-360/1125
 WEBS 5-10=-200/733, 3-10=-491/183, 5-14=-721/156

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 7-7-14, Exterior(2R) 7-7-14 to 11-10-13, Interior(1) 11-10-13 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.0; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 13, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733243
2544696	E06	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:02 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-6MDmaoVc95CplXx3225Ji7?l?ZyRhZes_2WvOyGLfF

0-10-8	2-4-0	5-5-7	9-1-14	11-1-0	13-4-0
0-10-8	2-4-0	3-1-7	3-8-7	1-11-2	2-3-0

Scale = 1:33.8

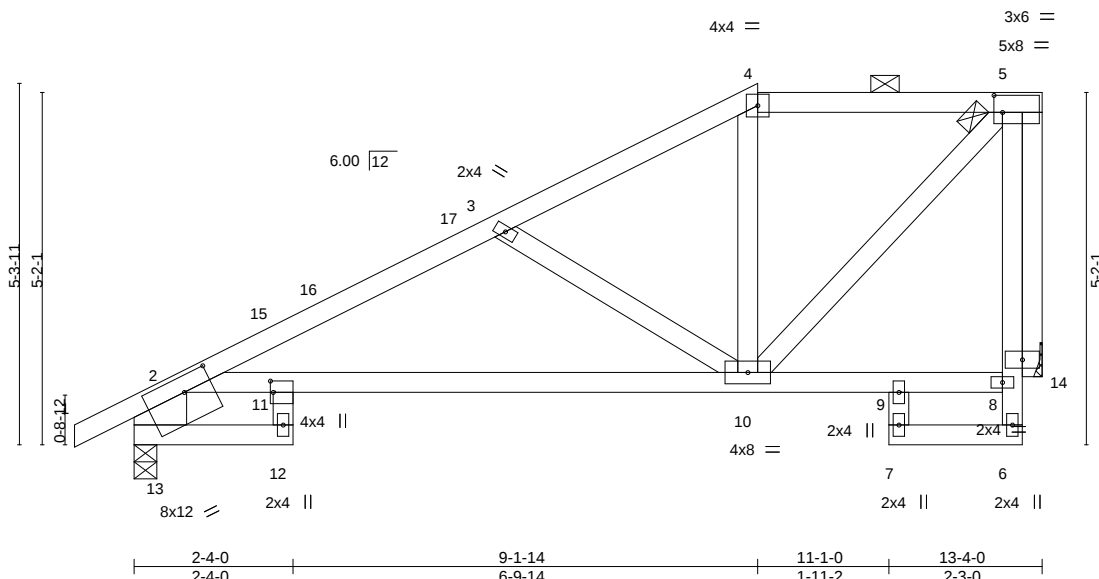


Plate Offsets (X,Y)-- [5:0-1-8,0-3-0], [11:0-2-0,0-0-8], [13:0-5-0,0-2-12], [13:0-4-2,0-2-1]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.48			MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.65				
TCDL	20.0	Rep Stress Incr	YES	WB	0.22				
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS					
BCDL	10.0							Weight: 64 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2
 WEBS 2x4 SPF No.2 *Except*
 2-13: 2x10 SP 2400F 2.0E
 OTHERS 2x4 SPF No.2

BRACING-

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

REACTIONS.

(size) 13=0-4-0, 14=Mechanical
 Max Horz 13=114(LC 13)
 Max Uplift 13=-21(LC 16), 14=-37(LC 13)
 Max Grav 13=1025(LC 38), 14=662(LC 2)

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

TOP CHORD 2-3=-1335/224, 3-4=-764/129, 4-5=-578/149, 2-13=-1014/166
 BOT CHORD 2-11=-204/961, 10-11=-349/1133
 WEBS 5-10=-189/747, 3-10=-655/218, 5-14=-666/164

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 9-1-14, Exterior(2E) 9-1-14 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 13, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733244
2544696	E07	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:04 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-3kKX?UXthjSX_q4SAT7nnY4bTNdK9W7xKIXdzHyGLfD

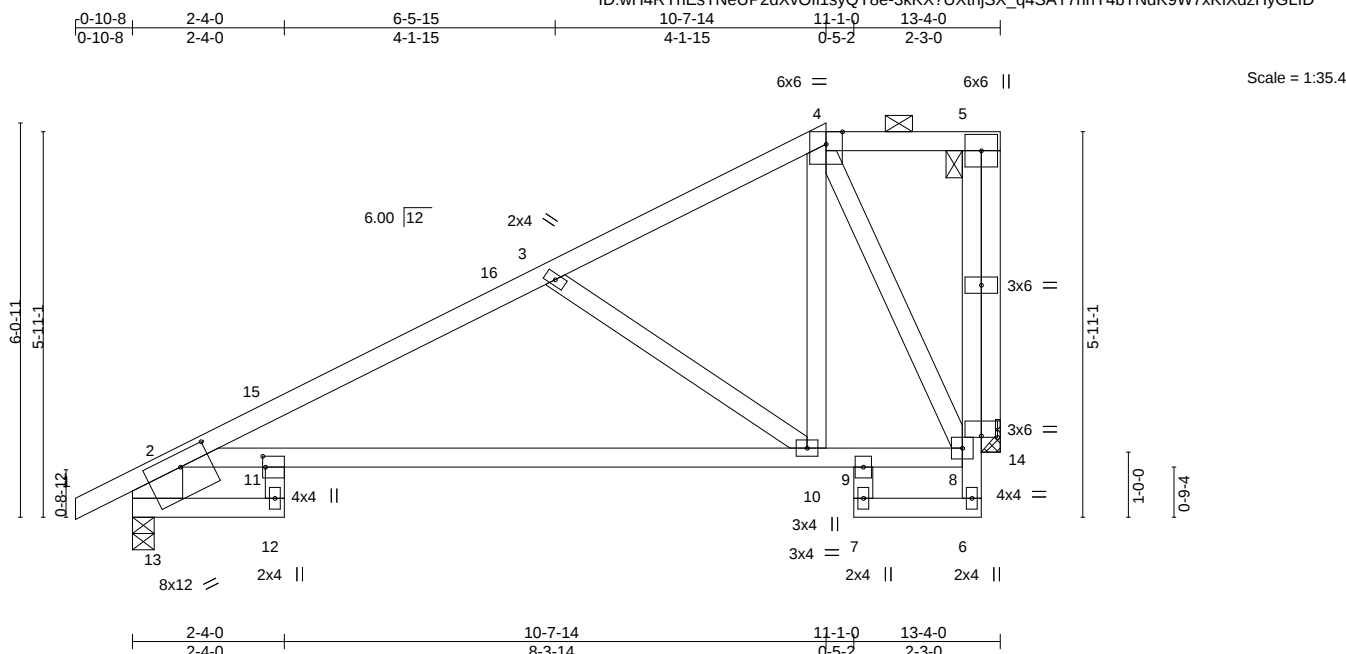


Plate Offsets (X,Y)-- [8:0-3-0,0-0-4], [11:0-2-0,0-0-8], [13:0-4-2,0-2-1], [13:0-5-8,0-2-8]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.68	Vert(LL) -0.21	10-11	>749	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.75	Vert(CT) -0.49	10-11	>314	180		
TCDL 20.0	Rep Stress Incr YES	WB 0.41	Horz(CT) 0.13	14	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS						
BCDL 10.0							Weight: 67 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except*
2-13: 2x10 SP 2400F 2.0E
OTHERS 2x4 SPF No.2

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

REACTIONS. (size) 13=0-4-0, 14=Mechanical
Max Horz 13=131(LC 16)
Max Uplift 13=-16(LC 16), 14=-54(LC 16)
Max Grav 13=1048(LC 38), 14=718(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1256/165, 3-4=-600/69, 5-8=-169/673, 2-13=-1046/158
BOT CHORD 2-11=-136/847, 10-11=-310/1044, 9-10=-110/388, 8-9=-107/445
WEBS 4-8=-810/189, 4-10=-93/677, 3-10=-770/239, 5-14=-720/183

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 10-7-14, Exterior(2E) 10-7-14 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 13, 14.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733245
2544696	E08	HALF HIP	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:05 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-XxuvDqXVS0aNc_fekBf0KmdnTn2XuqO4ZyGAWjyGLfC

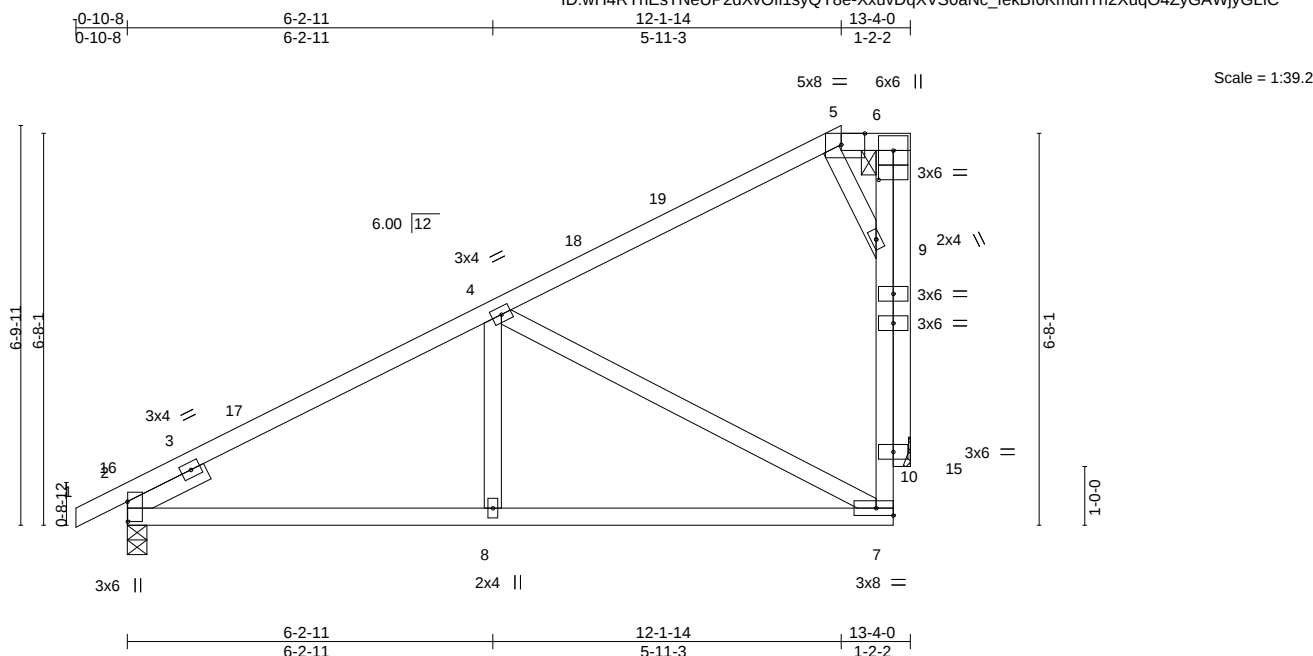


Plate Offsets (X,Y)-- [2:0-4-1,0-0-1], [5:0-4-13,Edge], [9:0-0-8,1-0-3]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.60	Vert(LL) -0.05	7-8	>999	240		MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.36	Vert(CT) -0.10	7-8	>999	180			
TCDL 20.0	Lumber DOL 1.15	WB 0.98	Horz(CT) 0.03	15	n/a	n/a			
BCLL 0.0	Rep Stress Incr YES	Matrix-AS							
BCDL 10.0	Code IRC2018/TPI2014								
								Weight: 62 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

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

REACTIONS. (size) 2=0-4-0, 15=Mechanical
Max Horz 2=171(LC 16)
Max Uplift 2=-11(LC 16), 15=-77(LC 16)
Max Grav 2=1029(LC 38), 15=834(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1173/54, 4-5=-309/8, 7-10=-74/531, 9-10=-75/533, 6-9=-309/1108
BOT CHORD 2-8=-222/998, 7-8=-222/998
WEBS 4-8=0/273, 4-7=-992/212, 5-9=-632/255, 6-15=-837/203

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 12-1-14, Exterior(2E) 12-1-14 to 12-10-12 zone; cantilever left and right exposed; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 15.
 - 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.
 - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	E09	JACK-CLOSED	3	1	I43733246

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:06 2020 Page 1

ID:wH4RYhEstTneUP2dXvOfi1syQY8e-?7SHQAY7DKiEE8EqHuAftz9yHBKmdQqEnc0k2AyGLfB

0-10-8 3-4-0 9-5-8 13-4-0
0-10-8 3-4-0 6-1-8 3-10-8

Scale = 1:41.0

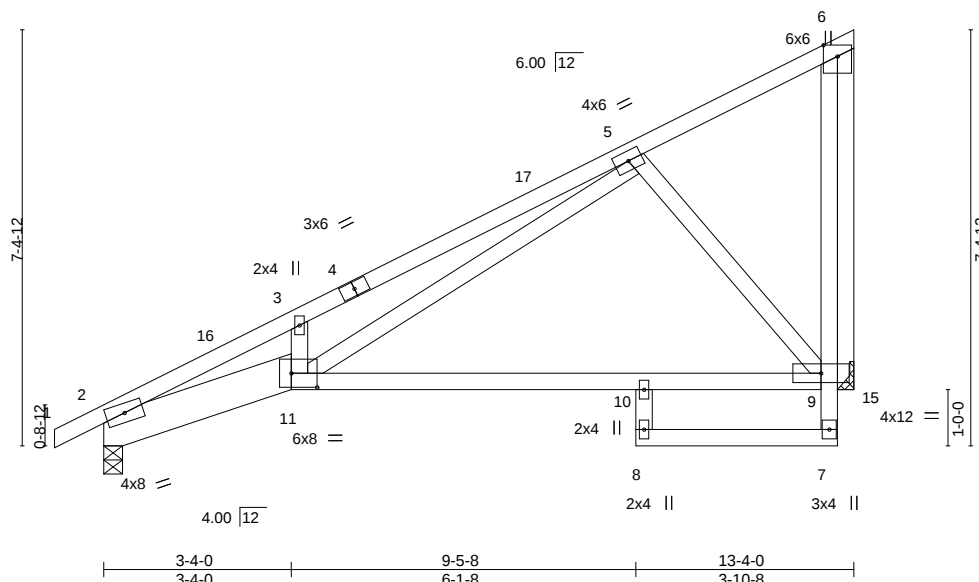


Plate Offsets (X,Y)-- [11:0-5-8,0-3-0]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	L/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.59	Vert(LL) -0.22	10-11	>720	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.62	Vert(CT) -0.51	10-11	>313	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.39	Horz(CT) 0.07	15	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-AS						
BCDL 10.0	Code IRC2018/TPI2014							
							Weight: 74 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except*
2-11: 2x8 SP 2400F 2.0E
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 2=0-4-0, 15=Mechanical
Max Horz 2=172(LC 16)
Max Uplift 2=5(LC 16), 15=-89(LC 16)
Max Grav 2=806(LC 2), 15=762(LC 23)

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

TOP CHORD 2-3=-2039/230, 3-5=-2146/350, 6-9=-122/656
BOT CHORD 2-11=-422/1821, 10-11=-156/539, 9-10=-158/521
WEBS 3-11=-393/166, 5-9=-734/209, 5-11=-334/1597, 6-15=-763/153

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 15.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



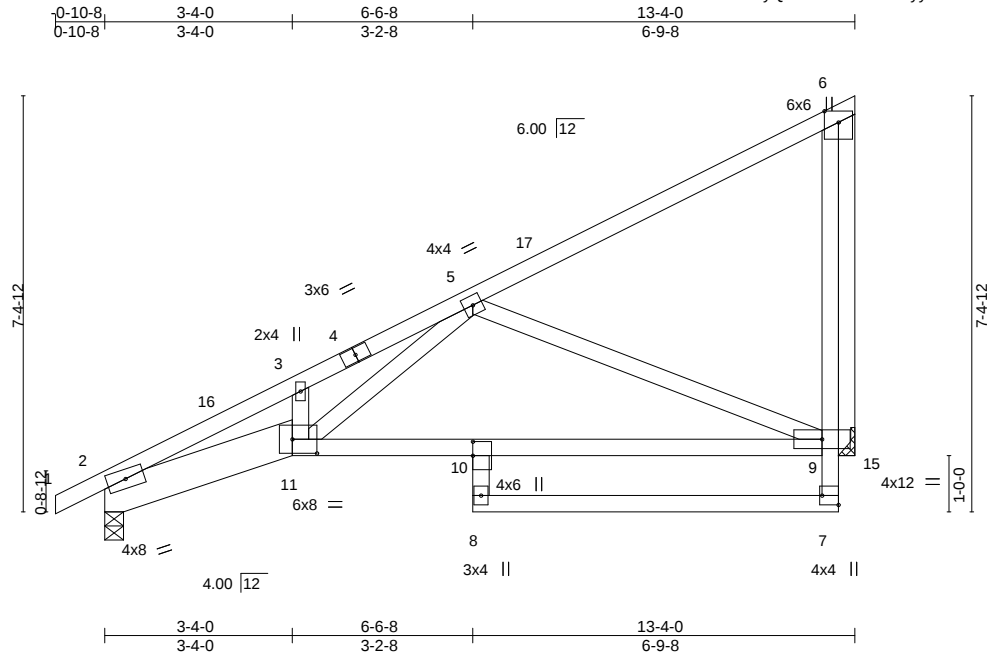
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733247
2544696	E10	JACK-CLOSED	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:08 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-xWa1rsaNlxyTSODPJCyOFJ8_?05EIWFwVq62yGLf9



Scale = 1:41.0

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.57	Vert(LL) -0.11	8	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.67	Vert(CT) -0.26	10	>599	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.81	Horz(CT) 0.05	15	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS							
BCDL 10.0								Weight: 76 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
 BOT CHORD 2x4 SPF No.2 *Except*
 2-11: 2x8 SP 2400F 2.0E
 WEBS 2x4 SPF No.2
 OTHERS 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals.
 BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 2=0-4-0, 15=Mechanical
 Max Horz 2=172(LC 16)
 Max Uplift 2=5(LC 16), 15=-89(LC 16)
 Max Grav 2=806(LC 2), 15=762(LC 23)

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

TOP CHORD 2-3=-1924/197, 3-5=-1843/243, 6-9=-68/466
 BOT CHORD 2-11=-386/1693, 10-11=-272/949, 9-10=-308/824
 WEBS 5-11=-139/967, 5-9=-954/258, 6-15=-764/153

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 12-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 15.
- 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



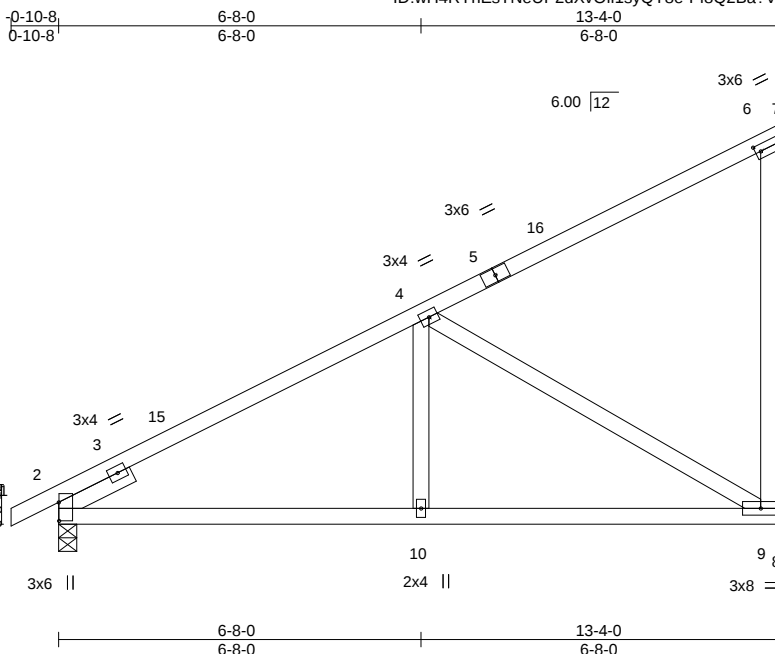
16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733248
2544696	E11	JACK-CLOSED	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:09 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-Pi8Q2Ba?VF4p5bzPz0jyUcnTKOQNqhNgTaEOfVyGLf8



Scale = 1:42.4

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

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.61				MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.37					
TCDL	20.0	Rep Stress Incr	YES	WB	0.79					
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS						
BCDL	10.0								Weight: 55 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-
TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 2=0-4-0, 9=Mechanical
Max Horz 2=223(LC 15)
Max Uplift 2=-28(LC 16), 9=-68(LC 16)
Max Grav 2=800(LC 2), 9=823(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-872/158, 6-9=-338/167
BOT CHORD 2-10=-283/740, 9-10=-283/740
WEBS 4-10=0/283, 4-9=-828/234

- NOTES-**
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 13-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - 3) Unbalanced snow loads have been considered for this design.
 - 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 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, 9.
 - 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



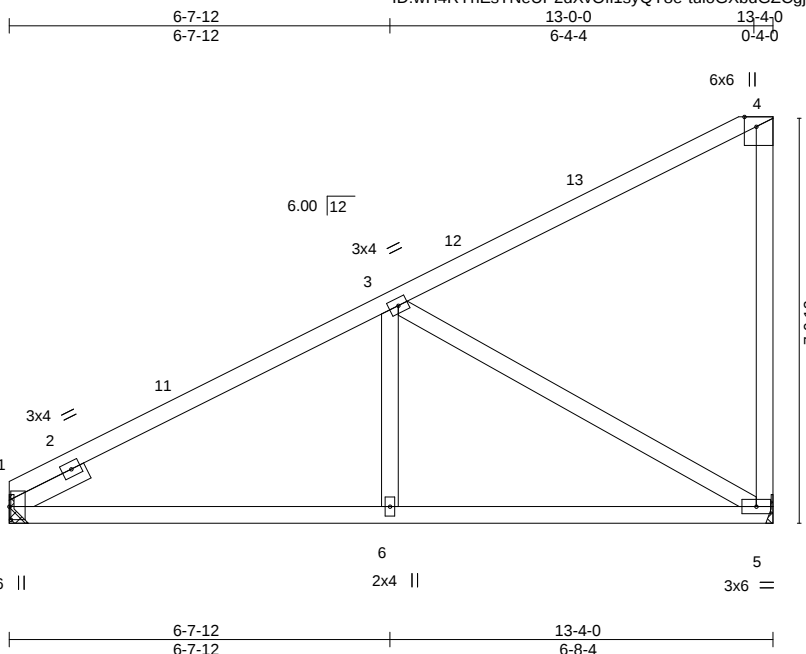
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss E12	Truss Type HALF HIP	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733249
----------------	--------------	------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:10 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-tuioGXbdGZCgijYbWkEB1pKdQoLOZ7ppiE_xBxyGLf7



Scale = 1:40.2

Plate Offsets (X,Y)-- [1:0-2-12,0-0-5], [4:0-2-1,Edge]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.65				MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.38					
TCDL	20.0	Rep Stress Incr	YES	WB	0.84					
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS						
BCDL	10.0								Weight: 54 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 1=Mechanical, 5=Mechanical
Max Horz 1=217(LC 15)
Max Uplift 1=-21(LC 16), 5=-67(LC 16)
Max Grav 1=725(LC 2), 5=797(LC 22)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-862/170, 4-5=-312/151
BOT CHORD 1-6=-277/766, 5-6=-277/766
WEBS 3-6=0/289, 3-5=-855/227

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 13-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5.
- 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss E14	Truss Type HALF HIP	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733251
----------------	--------------	------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:12 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-qHpYhDduoASOy3i_e9Hf6EP1AbNo19d6AYT2FpyGLf5

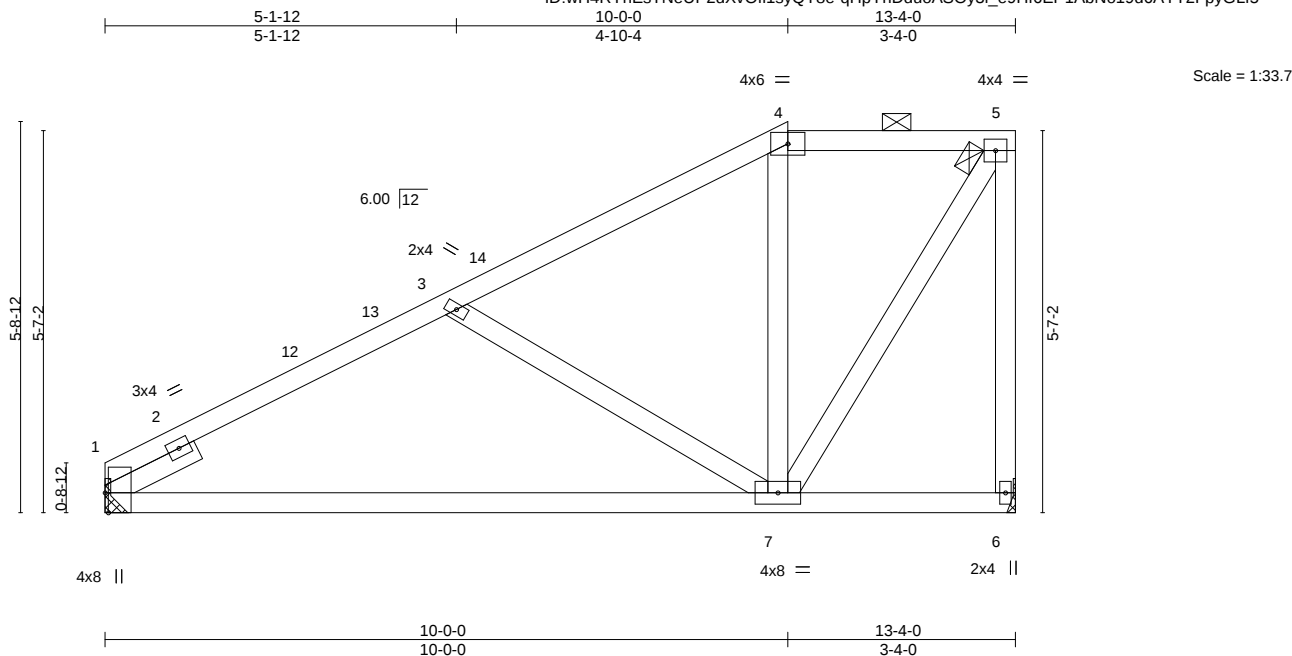


Plate Offsets (X,Y)-- [1:0-3-8,Edge]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.44	Vert(LL) -0.16	7-10	>998	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.58	Vert(CT) -0.32	7-10	>487	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.37	Horz(CT) 0.02	1	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS							
BCDL 10.0								Weight: 58 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-6-0

BRACING-

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

REACTIONS.

(size) 1=Mechanical, 6=Mechanical
Max Horz 1=163(LC 15)
Max Uplift 1=-27(LC 16), 6=-49(LC 13)
Max Grav 1=905(LC 37), 6=738(LC 37)

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

TOP CHORD 1-3=-1124/208, 3-4=-622/139, 4-5=-433/153, 5-6=-740/228
BOT CHORD 1-7=-349/1006
WEBS 3-7=-674/201, 5-7=-229/813

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 10-0-0, Exterior(2E) 10-0-0 to 13-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733252
2544696	G01	HIP GIRDER	1	1		
Job Reference (optional)						

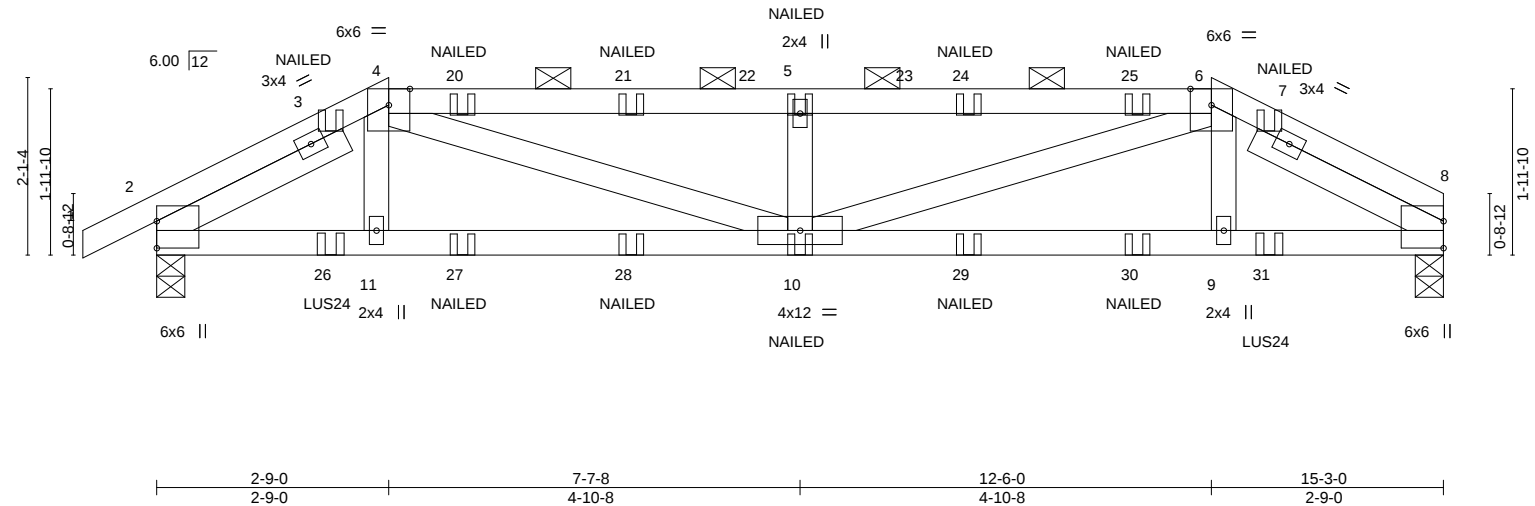
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:16 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-i233WbgOsPzqRg?It?LbH4adiDgyzyoi4ARFObyGLf1

-0-10-8	2-9-0	7-7-8	12-6-0	15-3-0
0-10-8	2-9-0	4-10-8	4-10-8	2-9-0

Scale = 1:27.3



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.72	Vert(LL)	-0.13 10 >999 240	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.95	Vert(CT)	-0.24 10-11 >770 180				
TCDL	20.0	Rep Stress Incr	NO	WB	0.42	Horz(CT)	0.04 8 n/a n/a				
BCLL	0.0	Code IRC2018/TPI2014		Matrix-MS							
BCDL	10.0										

LUMBER-		BRACING-	
TOP CHORD	2x4 SPF No.2 *Except* 4-6: 2x4 SPF 1650F 1.5E	TOP CHORD	Structural wood sheathing directly applied or 3-0-14 oc purlins, except
BOT CHORD	2x4 SPF No.2		2-0-0 oc purlins (3-0-0 max.): 4-6.
WEBS	2x4 SPF No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
SLIDER	Left 2x4 SPF No.2 2-6-0, Right 2x4 SPF No.2 2-6-0		

REACTIONS.	
(size)	8=0-4-0, 2=0-4-0
Max Horz	2=22(LC 85)
Max Uplift	8=-119(LC 8), 2=-121(LC 9)
Max Grav	8=1372(LC 36), 2=1465(LC 37)

FORCES.	
(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.	
TOP CHORD	2-4=-2253/174, 4-5=-3599/245, 5-6=-3599/245, 6-8=-2261/174
BOT CHORD	2-11=-161/1982, 10-11=-164/1964, 9-10=-149/1972, 8-9=-147/1991
WEBS	4-11=0/260, 4-10=-90/1730, 5-10=-924/126, 6-10=-89/1721, 6-9=0/262

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 8=119, 2=121.
 - 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.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
 - Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent spaced at 11-1-8 oc max. starting at 2-0-12 from the left end to 13-2-4 to connect truss(es) to back face of bottom chord.
 - Fill all nail holes where hanger is in contact with lumber.
 - "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
 - 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



November 23, 2020

Continued on page 2

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component**

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

MiTek

16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733252
2544696	G01	HIP GIRDER	1	1	Job Reference (optional)	

LOAD CASE(S) Standard

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

Uniform Loads (plf)

Vert: 1-4=-80, 4-6=-80, 6-8=-80, 12-16=-20

Concentrated Loads (lb)

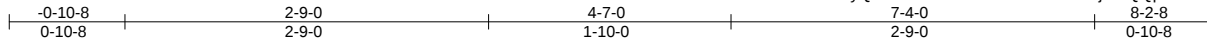
Vert: 10=-47(B) 5=-95(B) 3=32(B) 7=32(B) 20=-95(B) 21=-95(B) 24=-95(B) 25=-95(B) 26=-244(B) 27=-47(B) 28=-47(B) 29=-47(B) 30=-47(B) 31=-244(B)

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733253
2544696	H01	HIP GIRDER	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:19 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-7dkC9ciH9KLOi8kkY7vluJCHQqPVAOH8n8fw?vyGLf_



Scale = 1:17.4

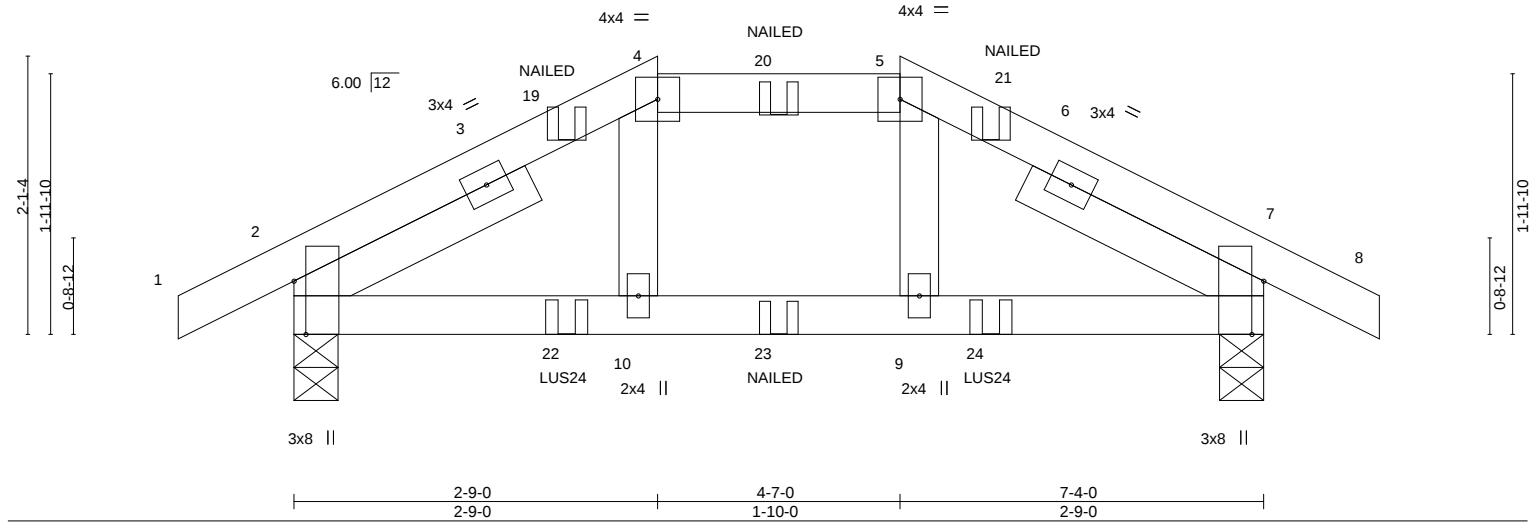


Plate Offsets (X,Y)-- [2:0-4-13,Edge], [7:0-4-13,Edge]											
LOADING (psf)		SPACING- 2-0-0		CSI.	DEFL. in (loc) l/defl L/d				PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC 0.18	Vert(LL)	-0.01	9	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC 0.38	Vert(CT)	-0.02	9	>999	180		
TCDL	20.0	Rep Stress Incr	NO	WB 0.06	Horz(CT)	0.01	7	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP						Weight: 28 lb	FT = 20%
BCDL	10.0										

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-0-0, Right 2x4 SPF No.2 2-0-0

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except 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) 2=0-4-0, 7=0-4-0
Max Horz 2=19(LC 11)
Max Uplift 2=-102(LC 12), 7=-102(LC 13)
Max Grav 2=837(LC 37), 7=838(LC 37)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-879/142, 4-5=-756/124, 5-7=-879/142
BOT CHORD 2-10=-96/775, 9-10=-96/756, 7-9=-97/775

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; 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
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=102, 7=102.
- 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.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- Use Simpson Strong-Tie LUS24 (4-10d Girder, 2-10d Truss, Single Ply Girder) or equivalent spaced at 3-2-8 oc max. starting at 2-0-12 from the left end to 5-3-4 to connect truss(es) to back face of bottom chord.
- Fill all nail holes where hanger is in contact with lumber.
- "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidelines.
- In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

- Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15



November 23, 2020

Continued on page 2

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733253
2544696	H01	HIP GIRDER	1	1	Job Reference (optional)	

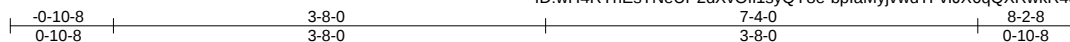
LOAD CASE(S) Standard
Uniform Loads (plf)
Vert: 1-4=-80, 4-5=-80, 5-8=-80, 11-15=-20
Concentrated Loads (lb)
Vert: 19=32(B) 20=-95(B) 21=32(B) 22=-244(B) 23=-47(B) 24=-244(B)

Job 2544696	Truss H02	Truss Type COMMON	Qty 4	Ply 1	Summit/17 Woodside I43733254
Job Reference (optional)					

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:20 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-bplaMyjvwdTFvJX6qQXRwkR4qD9vr_H?oPTWMyGLEz



Scale = 1:19.5

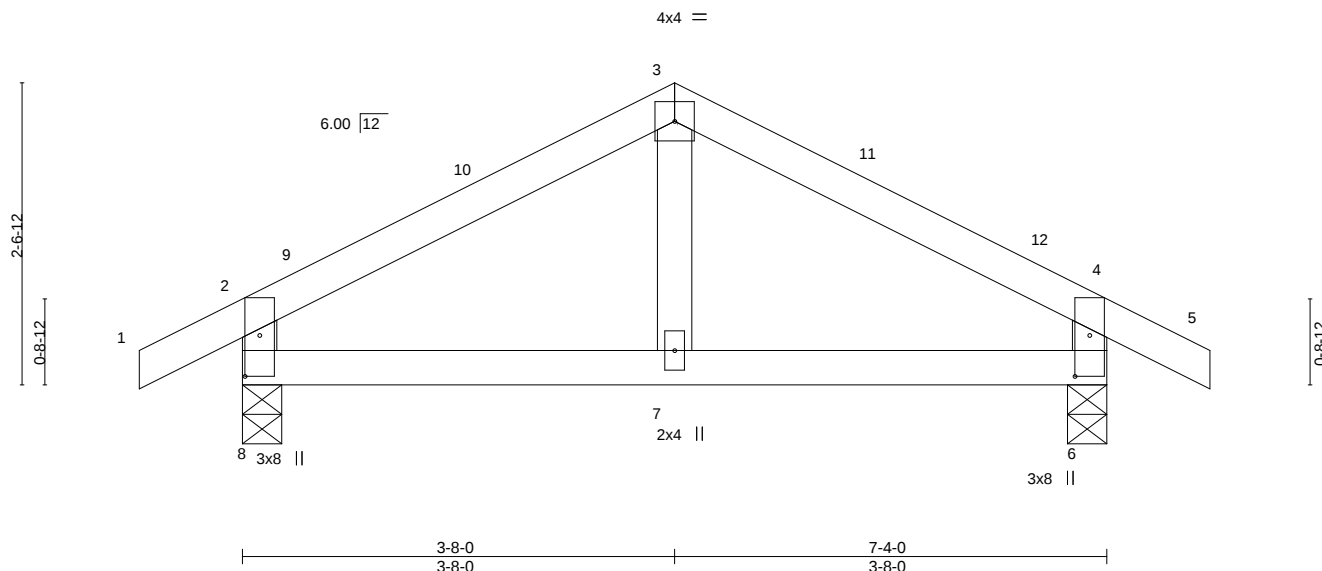


Plate Offsets (X,Y)-- [6:0-4-3,0-1-8], [8:0-4-3,0-1-8]

LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.25	in (loc)	l/defl	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.17	-0.01	7 >999				
TCDL	20.0	Rep Stress Incr	YES	WB	0.03	-0.01	7 >999				
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS		0.00	6 n/a				
BCDL	10.0										
								Weight: 23 lb		FT = 20%	

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD Rigid ceiling directly applied.

REACTIONS.

(size) 8=0-4-0, 6=0-4-0
Max Horz 8=-39(LC 14)
Max Uplift 8=-22(LC 16), 6=-22(LC 17)
Max Grav 8=531(LC 23), 6=531(LC 24)

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

TOP CHORD 2-3=-414/185, 3-4=-414/184, 2-8=-482/231, 4-6=-482/231
BOT CHORD 7-8=-75/295, 6-7=-75/295

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 3-8-0, Exterior(2R) 3-8-0 to 6-8-0, Interior(1) 6-8-0 to 8-2-8 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 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.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



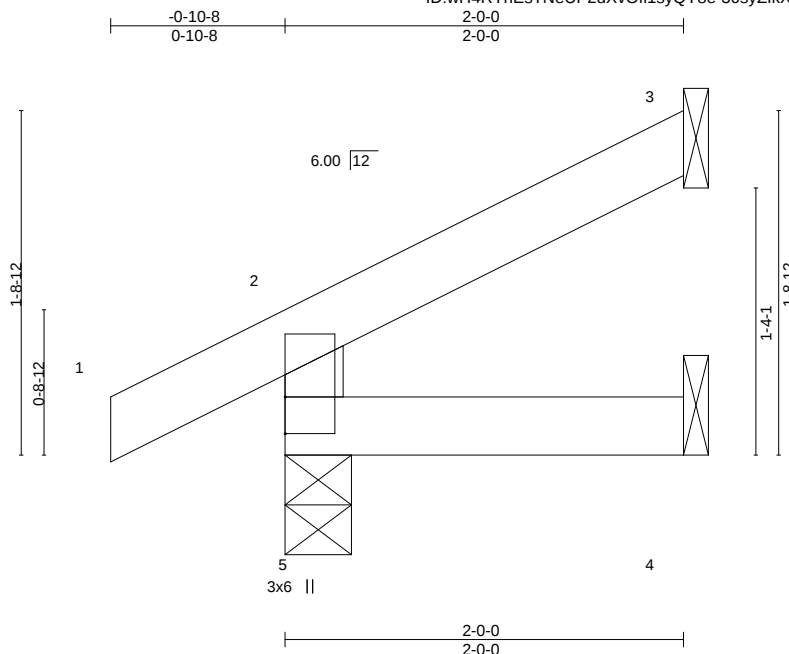
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss J01	Truss Type JACK-OPEN	Qty 7	Ply 1	Summit/17 Woodside Job Reference (optional) I43733255
----------------	--------------	-------------------------	----------	----------	---

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:21 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-30syZlkXhxb6XRujgYxm_8He5EbOelfRES803oyGLey



Scale = 1:11.6

Plate Offsets (X,Y)-- [2:0-0-14,0-1-12], [5:0-0-0,0-1-12]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.11	Vert(LL)	-0.00	5	>999	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	-0.00	4-5	>999		
TCDL	20.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	-0.00	3	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR						Weight: 6 lb	FT = 20%
BCDL	10.0										

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

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

REACTIONS. (size) 5=0-4-0, 3=Mechanical, 4=Mechanical
Max Horz 5=34(LC 13)
Max Uplift 5=-5(LC 16), 3=-19(LC 16)
Max Grav 5=253(LC 23), 3=71(LC 23), 4=33(LC 7)

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

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



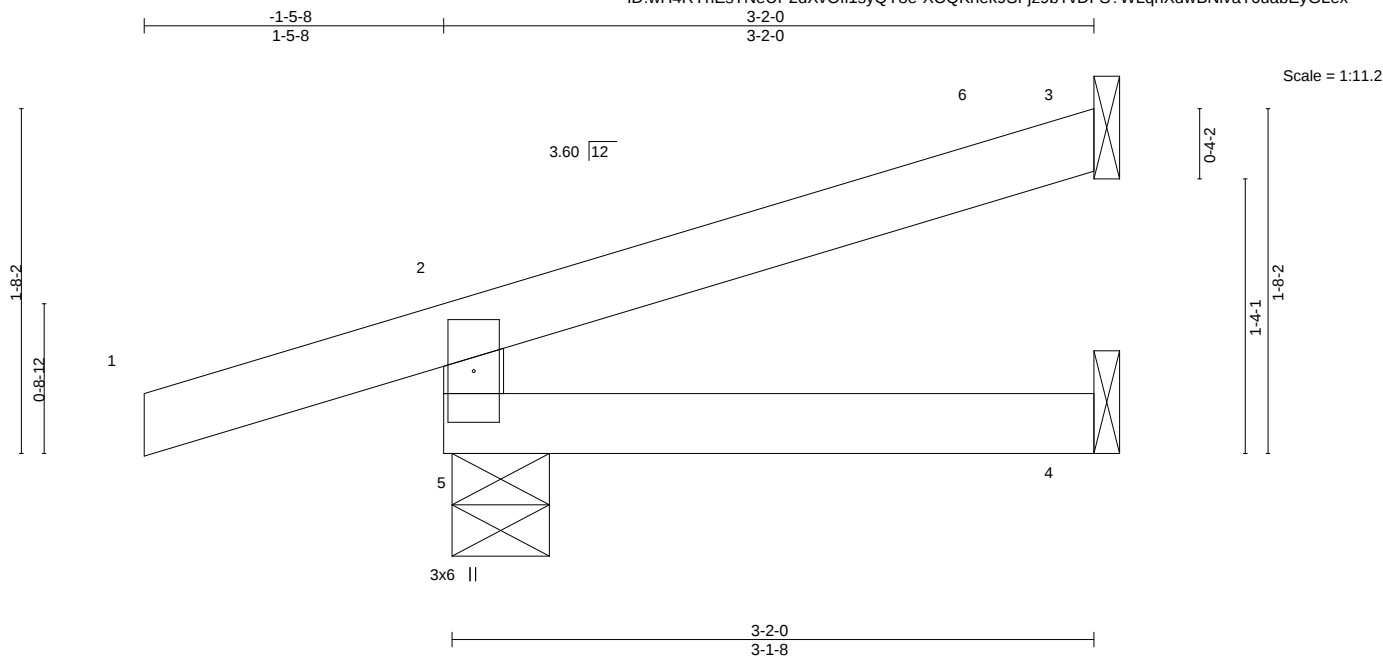
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss J02	Truss Type JACK-OPEN	Qty 9	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733256
----------------	--------------	-------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:22 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-XCQKnek9SFjz9bTvDFS?WLqnXdwBNlvaT6uabEyGLex



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.25	Vert(LL)	-0.00	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.07	Vert(CT)	-0.01				
TCDL	20.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00				
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR							
BCDL	10.0										

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 3-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-5-11, 3=Mechanical, 4=Mechanical
Max Horz 5=38(LC 12)
Max Uplift 5=-59(LC 12), 3=-22(LC 16)
Max Grav 5=398(LC 23), 3=115(LC 23), 4=52(LC 7)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-363/215

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Corner(3) -1-5-8 to 2-9-7, Exterior(2R) 2-9-7 to 3-1-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



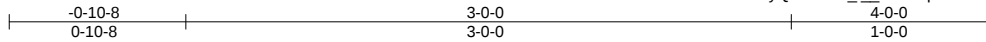
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733257
2544696	J03	HALF HIP GIRDER	9	1		
Job Reference (optional)						

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:23 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-?O_i_InCYrqm15nzzE3ZMyQ1BN6Cukhld77hyGLew



Scale = 1:11.4

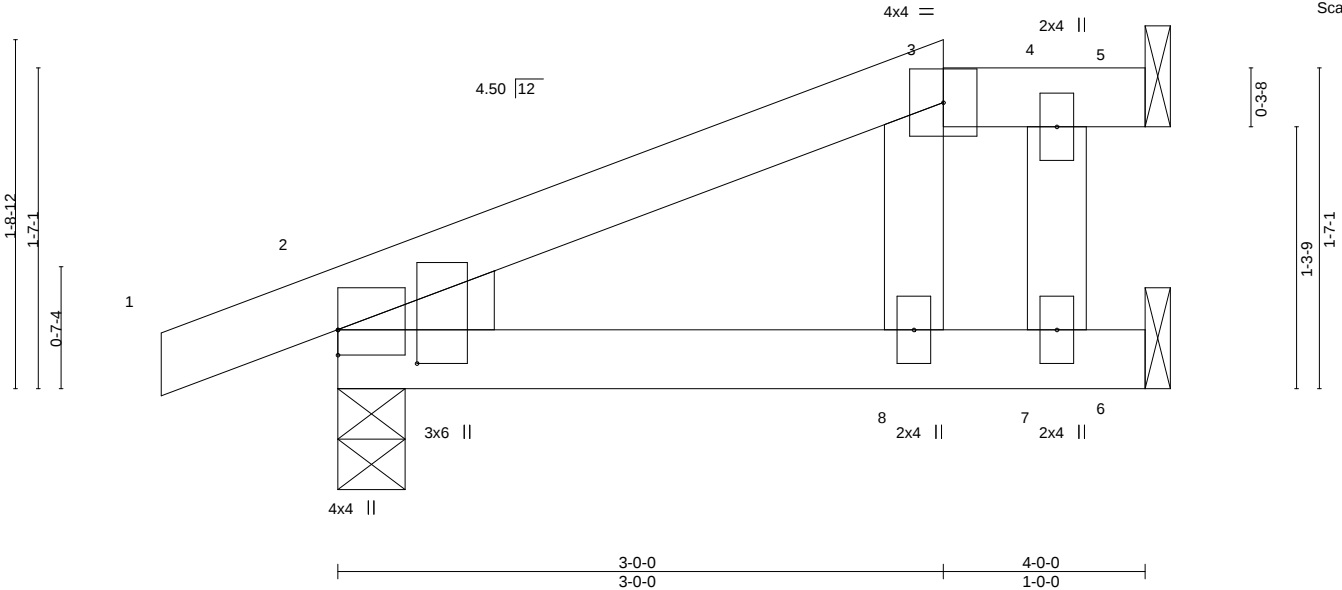


Plate Offsets (X,Y)-- [2:0-2-0,0-4-11]

LOADING (psf)		SPACING-		CSI.		DEFL.		in (loc)		l/defl		L/d		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.25	Vert(LL)	-0.03	8-11	>999	240				MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.39	Vert(CT)	-0.06	8-11	>854	180							
TCDL	20.0	Rep Stress Incr	NO	WB	0.02	Horz(CT)	0.03	5	n/a	n/a							
BCLL	0.0	Code IRC2018/TPI2014		Matrix-MP													
BCDL	10.0																
														Weight: 14 lb		FT = 20%	

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied or 4-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins: 3-5.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS.

(size) 5=Mechanical, 2=0-4-0, 6=Mechanical
Max Horz 2=44(LC 11)
Max Uplift 5=-67(LC 44), 2=-35(LC 8), 6=-19(LC 12)
Max Grav 5=48(LC 30), 2=373(LC 34), 6=264(LC 34)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 2, 6.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 63 lb down and 31 lb up at 3-11-4, and 48 lb down and 23 lb up at 3-0-0 on top chord, and 29 lb down and 12 lb up at 3-0-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
- In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

- Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (plf)
Vert: 1-3=-80, 3-4=-80, 4-5=-80, 6-9=-20



November 23, 2020

Continued on page 2

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733257
2544696	J03	HALF HIP GIRDER	9	1	Job Reference (optional)	

LOAD CASE(S) Standard
 Concentrated Loads (lb)
 Vert: 3=-6(F) 5=-49(F) 8=0(F)

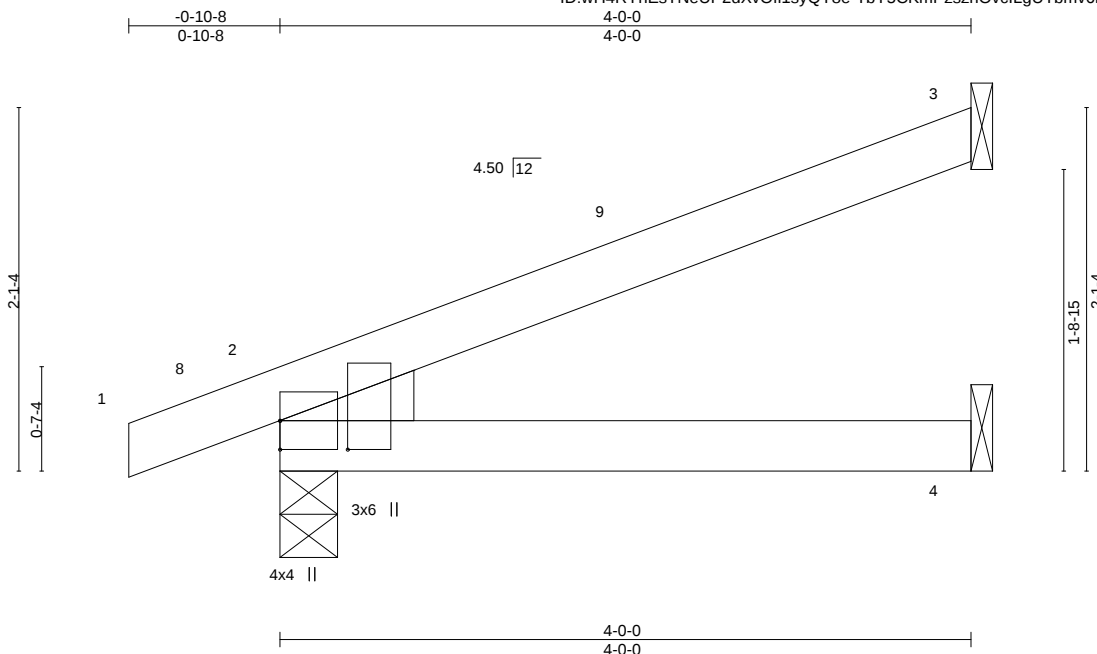
Job 2544696	Truss J04	Truss Type JACK-OPEN	Qty 18	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733258
----------------	--------------	-------------------------	-----------	----------	--	-----------

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:24 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-TbY5CKmPzszhOvclLgUTbmV6mRZ_rfPtwPNgg7yGLEv



Scale = 1:13.3

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.27	Vert(LL) -0.02	4-7	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.24	Vert(CT) -0.04	4-7	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.01	2	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS							
BCDL 10.0								Weight: 12 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 3=Mechanical, 2=0-4-0, 4=Mechanical
Max Horz 2=50(LC 12)
Max Uplift 3=28(LC 16), 2=25(LC 12)
Max Grav 3=175(LC 23), 2=359(LC 23), 4=77(LC 7)

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 3-11-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCDL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 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) 3, 2.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 9) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



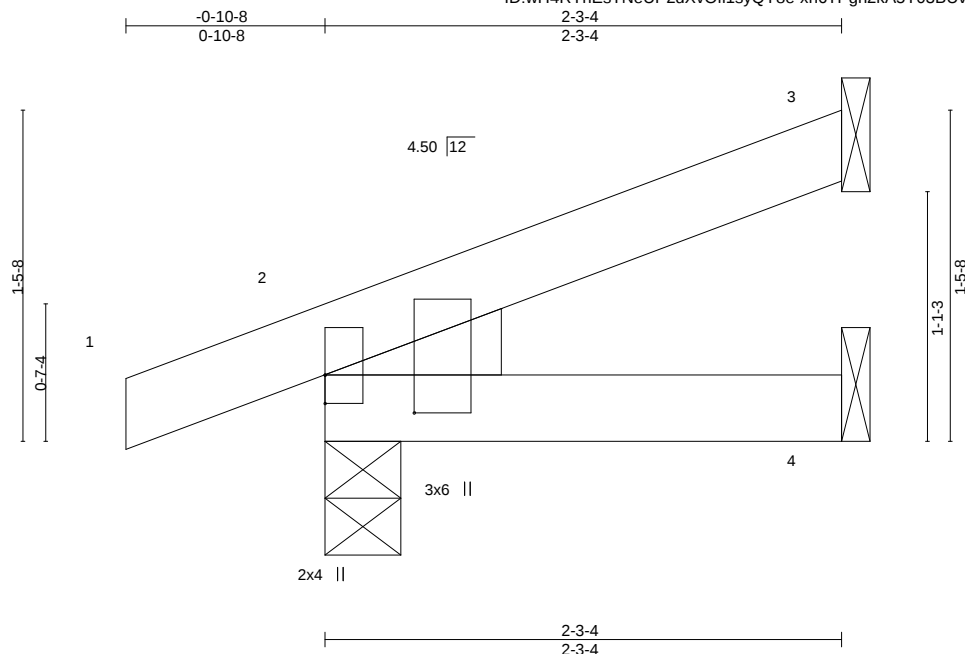
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733259
2544696	J05	Jack-Open	1	1		
Job Reference (optional)						

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:25 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-xn6TPgn2kA5Y03BUvN0i8_SKary0a6e1937ECZyGLEu



Scale = 1:10.1

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.08	Vert(LL) -0.00	7	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.06	Vert(CT) -0.00	7	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.00	2	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MP							
BCDL 10.0									
								Weight: 7 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied or 2-3-4 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 3=Mechanical, 2=0-4-0, 4=Mechanical
Max Horz 2=34(LC 12)
Max Uplift 3=-14(LC 16), 2=-26(LC 12)
Max Grav 3=82(LC 23), 2=243(LC 23), 4=41(LC 7)

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCDL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 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) 3, 2.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



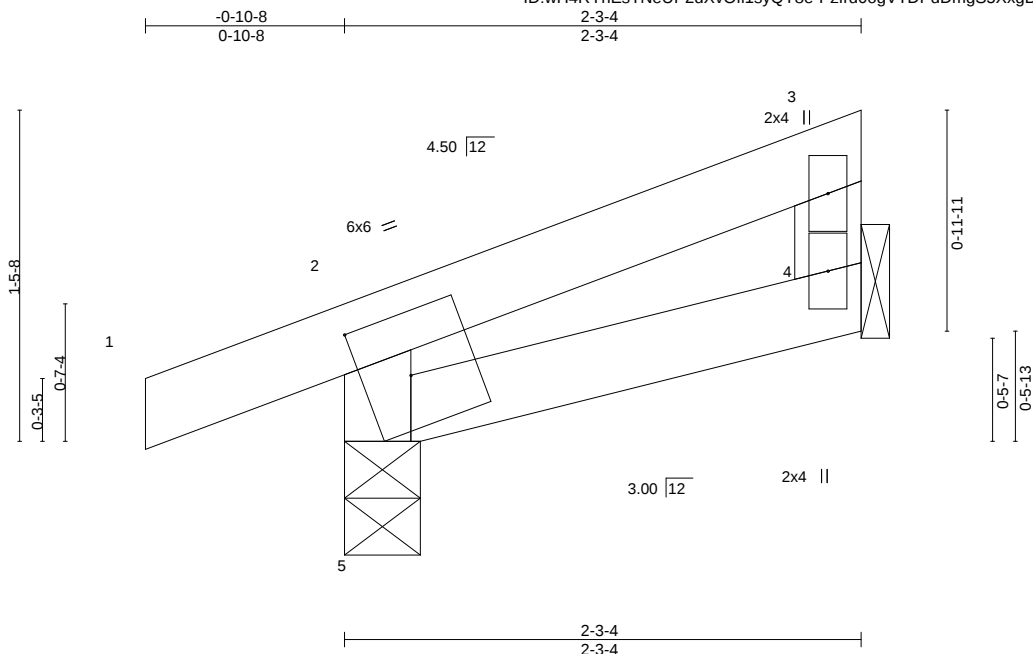
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss J05A	Truss Type Monopitch	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733260
----------------	---------------	-------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:26 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-Pzfrd0ogVTDpdDmgS5XxgB_VwFIJZuAojsnk?yGLet



Scale = 1:10.1

Plate Offsets (X,Y)-- [2:0-1-14,0-0-0], [2:0-2-8,0-3-4], [5:0-0-10,0-1-10]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.10	Vert(LL)	-0.00	5	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.03	Vert(CT)	-0.00	4-5	>999	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.00	Horz(CT)	-0.00	4	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-MR							
BCDL 10.0	Code IRC2018/TPI2014								
								Weight: 7 lb	FT = 20%

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

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

REACTIONS. (size) 4=Mechanical, 5=0-4-0
Max Horz 5=35(LC 13)
Max Uplift 4=-10(LC 13), 5=-35(LC 12)
Max Grav 4=94(LC 23), 5=253(LC 23)

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Refer to girder(s) for truss to truss connections.
- 7) Bearing at joint(s) 5 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 5.
- 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

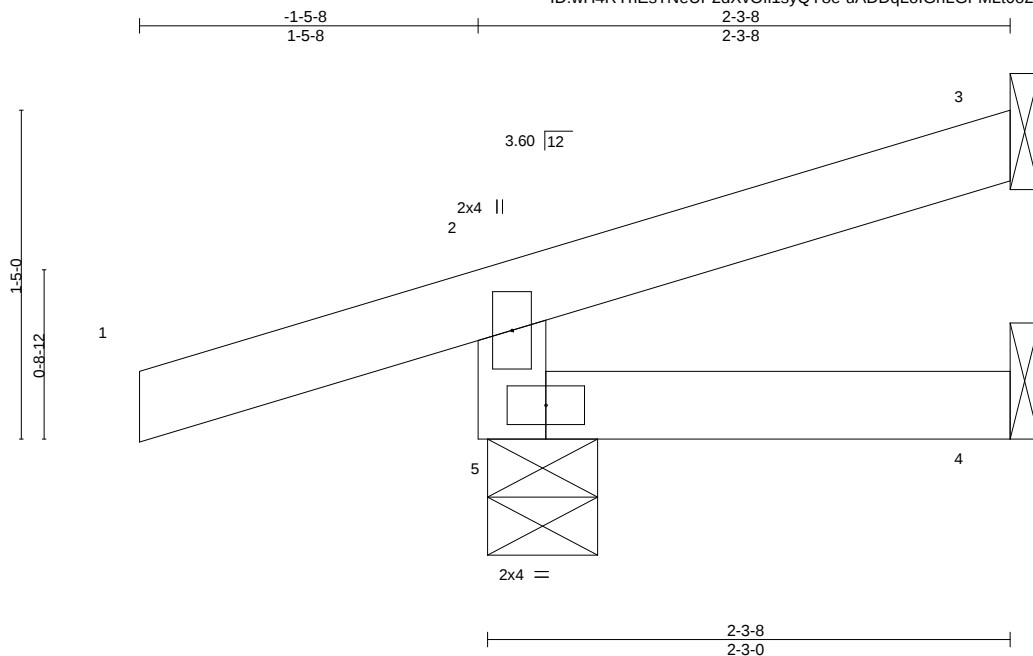
Job 2544696	Truss J06	Truss Type Jack-Open	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733261
----------------	--------------	-------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:27 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-uADDqLoLGNLGFMLt0o2ADPxeMedN208JcNcLGsYGLes



Scale = 1:9.9

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.25	Vert(LL)	0.00	4-5	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.06	Vert(CT)	0.00	4-5	>999	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.00	Horz(CT)	-0.00	3	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-MR						Weight: 7 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014								

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 2-3-8 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=0-5-11, 3=Mechanical, 4=Mechanical
Max Horz 5=31(LC 12)
Max Uplift 5=61(LC 12), 3=-14(LC 16)
Max Grav 5=355(LC 23), 3=59(LC 23), 4=32(LC 7)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-318/202

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Corner(3) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Bearing at joint(s) 5 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



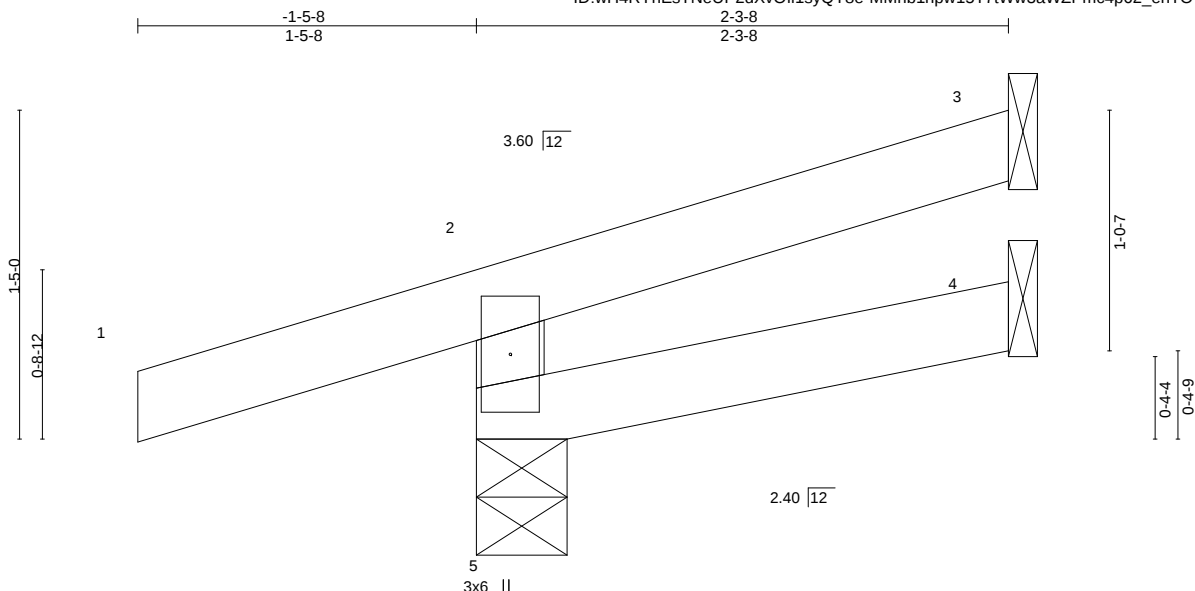
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss J06A	Truss Type Jack-Open	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733262
----------------	---------------	-------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:28 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-MMnb1hpw15T7tWw3aWZPmc4p62_enTOTr1LupuyGLer



Scale = 1:9.9

LOADING (psf)	SPACING-	CS.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.25	Vert(LL) 0.00	4-5	>999	240	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.06	Vert(CT) 0.00	4-5	>999	180		
TCDL 20.0	Lumber DOL 1.15	WB 0.00	Horz(CT) -0.00	3	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-MR						
BCDL 10.0	Code IRC2018/TPI2014						Weight: 8 lb	FT = 20%

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 2-3-8 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. (size) 5=0-4-11, 3=Mechanical, 4=Mechanical
Max Horz 5=30(LC 12)
Max Uplift 5=61(LC 12), 3=-15(LC 16)
Max Grav 5=355(LC 23), 3=59(LC 23), 4=33(LC 7)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-318/202

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Corner(3) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Bearing at joint(s) 5 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733263
2544696	J07	Half Hip Girder	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:29 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-qYL_F1qYoOc_UgVF7D4elqczhSJUWw7c4h5RLKyGLEq

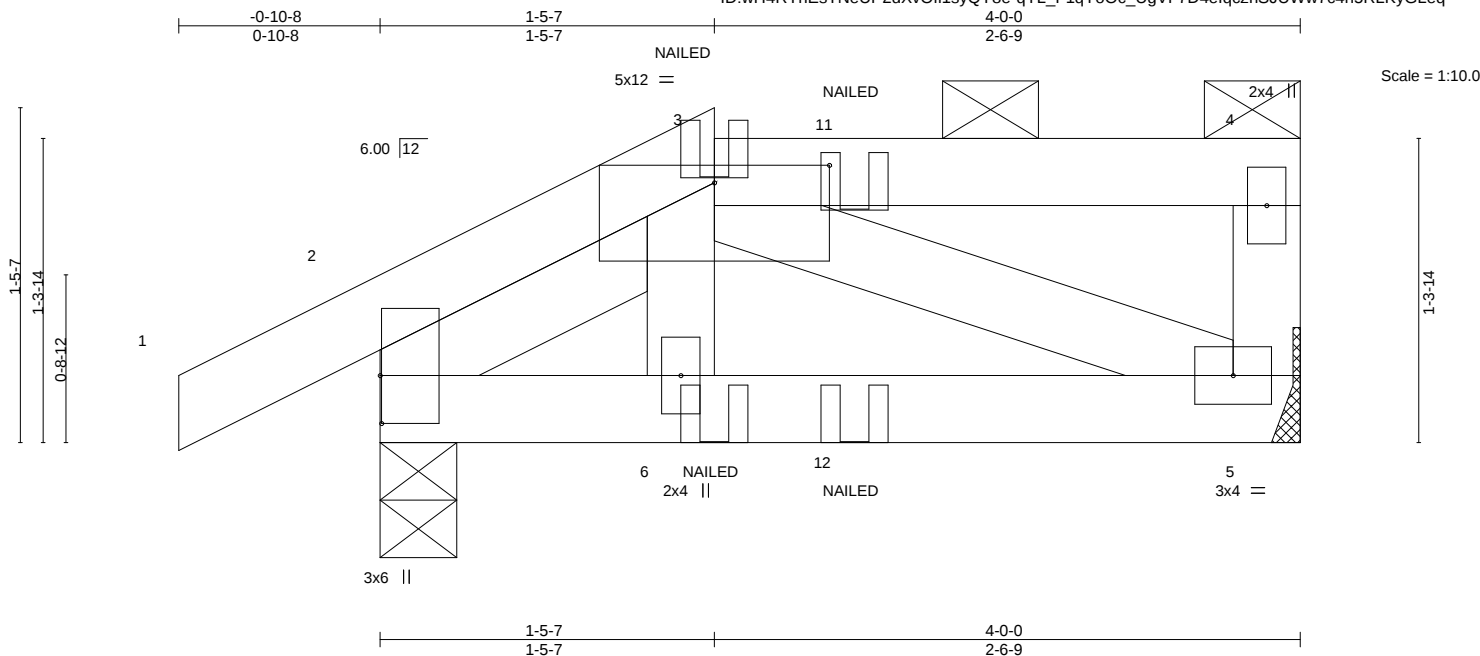


Plate Offsets (X,Y)-- [2:0-2-8,0-0-1], [3:0-6-0,0-0-15]												
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d				PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.20	Vert(LL)	-0.00	5-6	>999	240	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.09	Vert(CT)	-0.00	5-6	>999	180		
TCDL	20.0	Rep Stress Incr	NO	WB	0.03	Horz(CT)	0.00	5	n/a	n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-MP							Weight: 17 lb	FT = 20%
BCDL	10.0											

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 1-4-3

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

REACTIONS. (size) 2=0-4-0, 5=Mechanical
Max Horz 2=34(LC 54)
Max Uplift 2=-15(LC 12), 5=-14(LC 9)
Max Grav 2=355(LC 34), 5=257(LC 33)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 5.
- 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.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- "NAILED" indicates 3-10d (0.148"x3") or 2-12d (0.148"x3.25") toe-nails per NDS guidelines.
- In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

- Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (plf)
Vert: 1-3=-80, 3-4=-80, 5-7=-20
Concentrated Loads (lb)
Vert: 6=1(F) 11=-7(F) 12=-16(F)



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733264
2544696	J07A	Half Hip Girder	1	1		
Job Reference (optional)						

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:31 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-mxTKgJroK0shk_feFe66NFjvGzi_qqvX?ayPDyGLEo

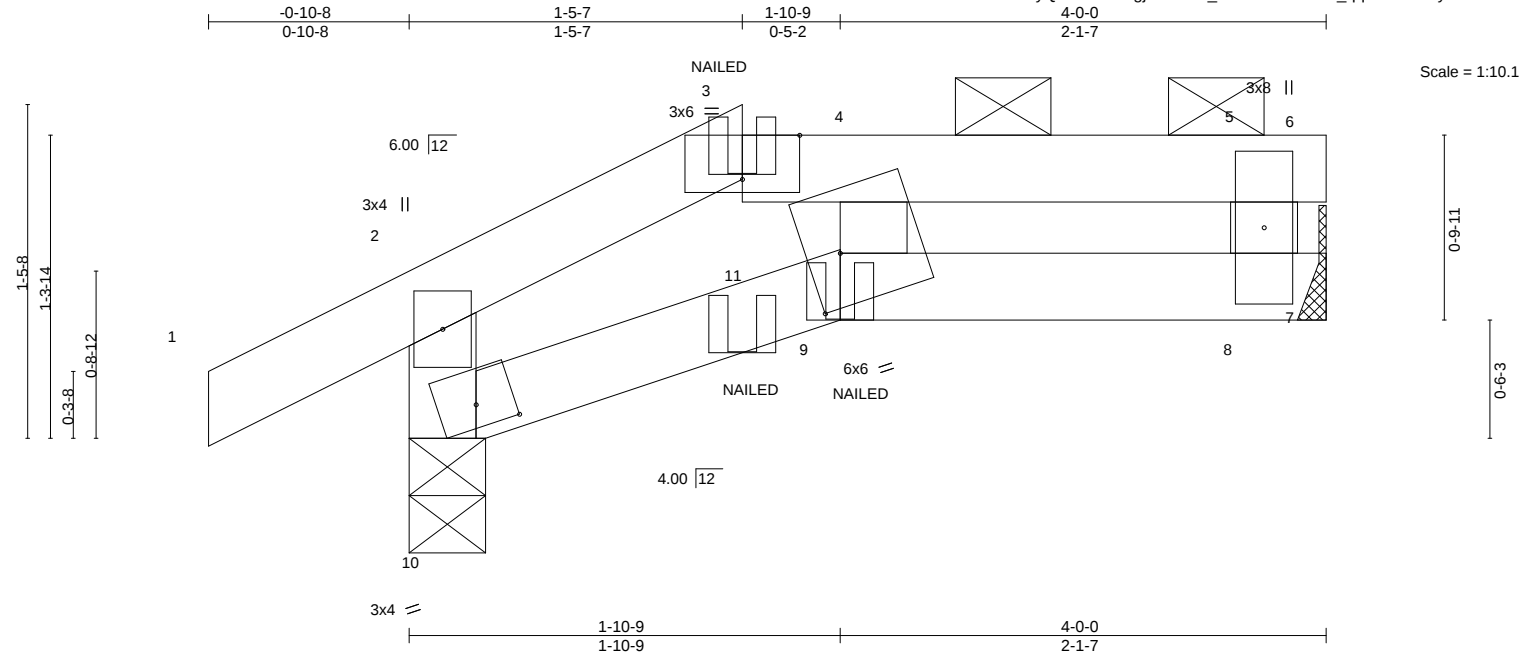


Plate Offsets (X,Y)-- [3:0-3-0,Edge], [4:0-1-11,0-0-9], [9:0-1-12,0-2-12], [10:0-2-0,0-1-3]											
LOADING (psf)		SPACING-		CSL		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	2-0-0		TC	0.21	in (loc)	l/defl	L/d	MT20	197/144	
Snow (Pf)	20.0	Plate Grip DOL	1.15	BC	0.17	Vert(LL)	-0.01	9	>999	240	
TCDL	20.0	Lumber DOL	1.15	WB	0.02	Vert(CT)	-0.02	9	>999	180	
BCLL	0.0	Rep Stress Incr	NO	Matrix-MR		Horz(CT)	0.01	8	n/a	n/a	
BCDL	10.0	Code IRC2018/TPI2014								Weight: 12 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 4-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins: 3-6.
BOT CHORD 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SPF No.2	

REACTIONS. (size) 8=Mechanical, 10=0-4-0
Max Horz 10=33(LC 9)
Max Uplift 8=-24(LC 9), 10=-23(LC 12)
Max Grav 8=304(LC 33), 10=381(LC 34)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-293/35, 2-10=-369/33

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; 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
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Bearing at joint(s) 10 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 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.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- "NAILED" indicates 3-10d (0.148"x3") or 2-12d (0.148"x3.25") toe-nails per NDS guidelines.
- In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

- Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (plf)
Vert: 1-2=-80, 2-3=-80, 3-5=-80, 5-6=-80, 9-10=-20, 7-9=-20
Concentrated Loads (lb)
Vert: 9=-74(B) 11=1(B)



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



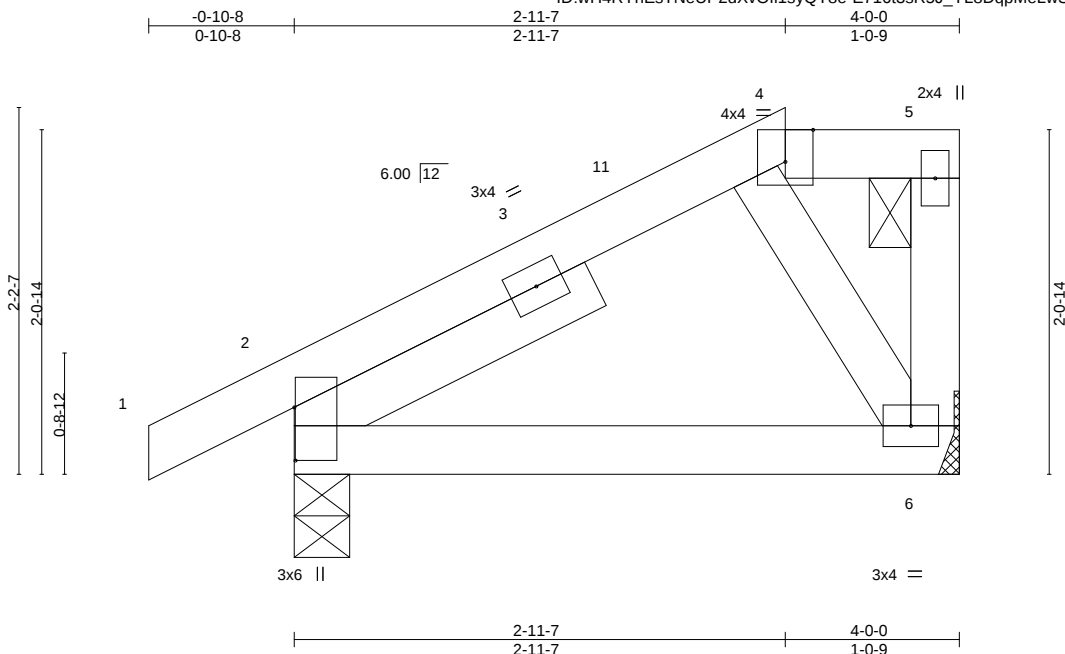
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733265
2544696	J08	Half Hip	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:32 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-E716t3sR5J_YL8DqpMeLwSEVBfKujH12mfJ6yfyGLen



Scale = 1:13.9

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.18	Vert(LL) -0.01	6-9	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.11	Vert(CT) -0.02	6-9	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.02	Horz(CT) 0.01	2	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MP							
BCDL 10.0								Weight: 17 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-0-0

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

REACTIONS. (size) 2=0-4-0, 6=Mechanical
Max Horz 2=58(LC 15)
Max Uplift 2=-16(LC 16), 6=-17(LC 13)
Max Grav 2=383(LC 38), 6=205(LC 38)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 2-11-7, Exterior(2E) 2-11-7 to 3-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 6.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



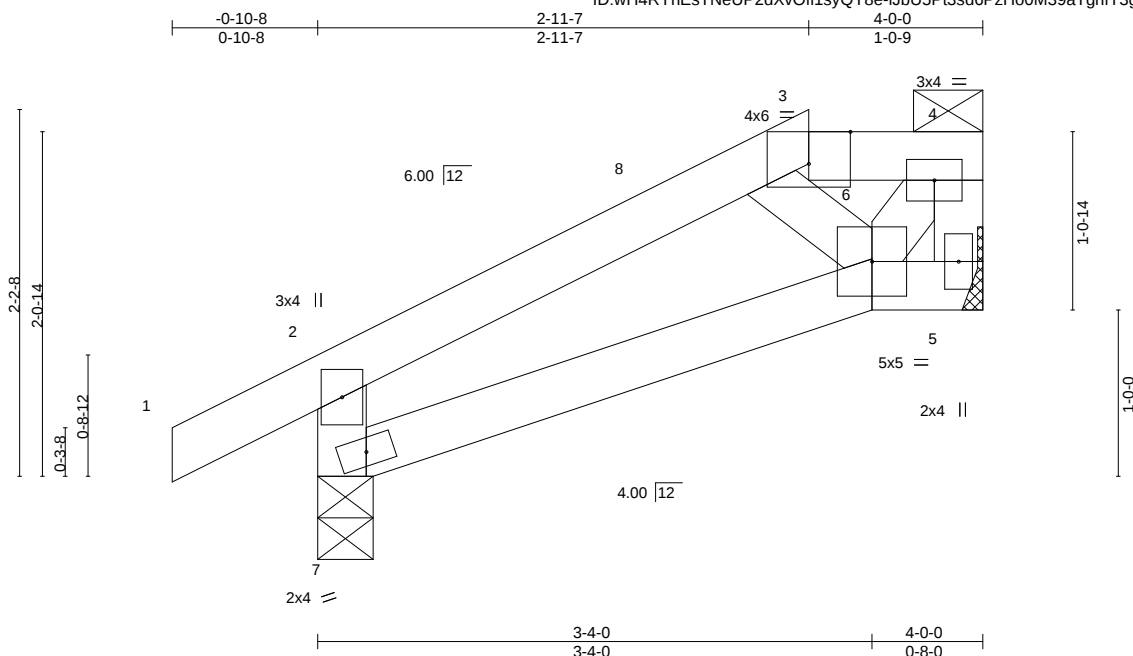
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733266
2544696	J08A	Half Hip	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:33 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-iJbU5Pt3sd6PzHoM39aTgnfT3gVSKyC?J3fU5yGLem



Scale = 1:13.9

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.21	Vert(LL) -0.00	6-7	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.08	Vert(CT) -0.01	6-7	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.04	Horz(CT) 0.00	5	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MS							
BCDL 10.0								Weight: 14 lb	FT = 20%

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

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

REACTIONS. (size) 5=Mechanical, 7=0-4-0
Max Horz 7=51(LC 13)
Max Uplift 5=-17(LC 13), 7=-15(LC 16)
Max Grav 5=191(LC 2), 7=395(LC 38)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-258/85, 2-7=-404/181

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 2-11-7, Exterior(2E) 2-11-7 to 3-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
 - Provide adequate drainage to prevent water ponding.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Refer to girder(s) for truss to truss connections.
 - Bearing at joint(s) 7 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 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.
 - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



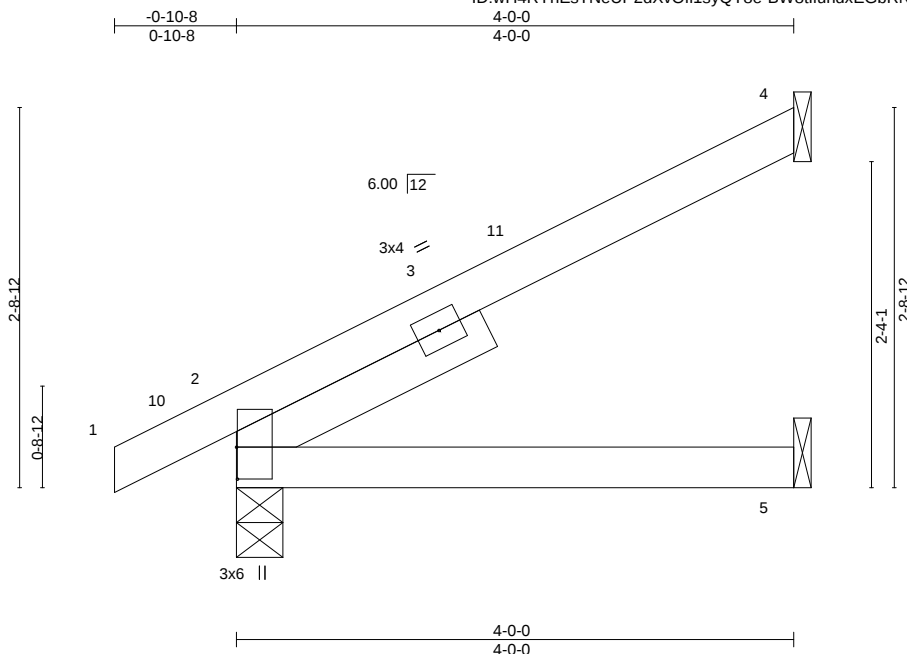
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733267
2544696	J09	Jack-Open	8	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:34 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-BW8tlluhdxEGbRNDwmgp?tKoRT_cBBtLDzoC0YyGLel



Scale = 1:16.5

Plate Offsets (X,Y)-- [2:0-2-12,0-0-1]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.32	Vert(LL) -0.02	5-8	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.22	Vert(CT) -0.04	5-8	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.01	2	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MP							
BCDL 10.0									

Weight: 13 lb FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
SLIDER Left 2x4 SPF No.2 2-0-0

BRACING-

TOP CHORD Structural wood sheathing directly applied or 4-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 4=Mechanical, 2=0-4-0, 5=Mechanical
Max Horz 2=63(LC 16)
Max Uplift 4=-36(LC 16), 2=-3(LC 16)
Max Grav 4=187(LC 23), 2=372(LC 23), 5=76(LC 7)

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

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 3-11-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

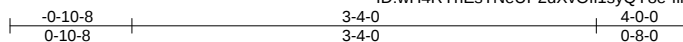
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733268
2544696	J09A	Jack-Open	1	1		

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:35 2020 Page 1

ID:wH4RYhESTNeUP2dXvOfi1syQY8e-fiiFV4vJOEM7CbyPUUB2Y5s_btLXwdvVSdYmY_yGLek



Scale = 1:16.5

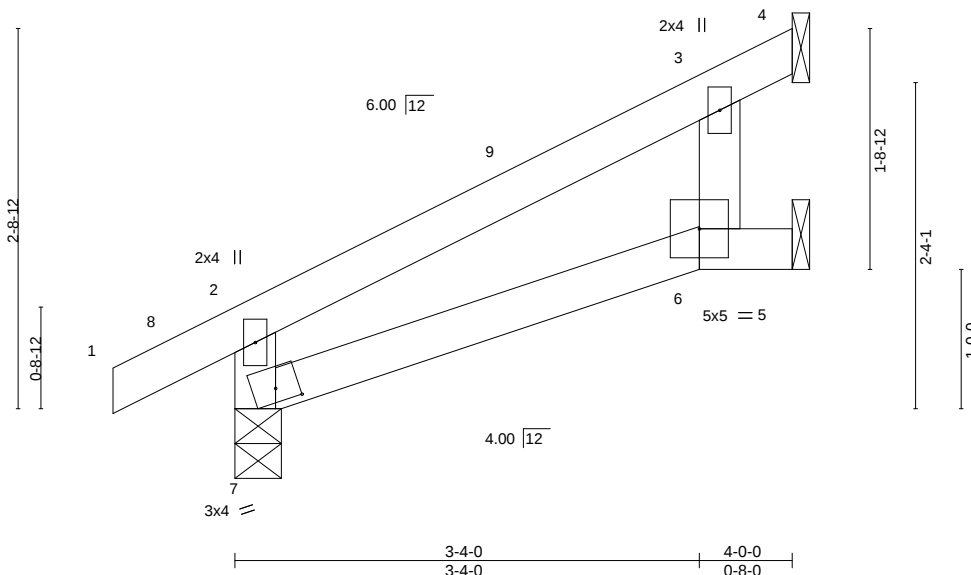


Plate Offsets (X,Y)-- [7:0-2-0,0-1-3]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.30	Vert(LL) -0.02	6-7	>999	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.17	Vert(CT) -0.03	6-7	>999	180		
TCDL 20.0	Rep Stress Incr YES	WB 0.01	Horz(CT) 0.02	4	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MP						
BCDL 10.0							Weight: 13 lb	FT = 20%

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 4-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS.

(size) 7=0-4-0, 4=Mechanical, 5=Mechanical
Max Horz 7=59(LC 16)
Max Uplift 7=-3(LC 16), 4=-11(LC 16), 5=-22(LC 16)
Max Grav 7=383(LC 23), 4=117(LC 23), 5=119(LC 23)

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

TOP CHORD 2-7=-336/134

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-8, Interior(1) 2-1-8 to 3-11-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCDL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Refer to girder(s) for truss to truss connections.
- 7) Bearing at joint(s) 7 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 4, 5.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733269
2544696	J10	JACK-OPEN	4	1		

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:36 2020 Page 1

ID:wH4RYhEstNeUP2dXvOfi1syQY8e-7uGdjQvx9YU_qlXb2BiH4IP7YHg9f4oehHHJ5QyGLEj

Job Reference (optional)



Scale = 1:13.3

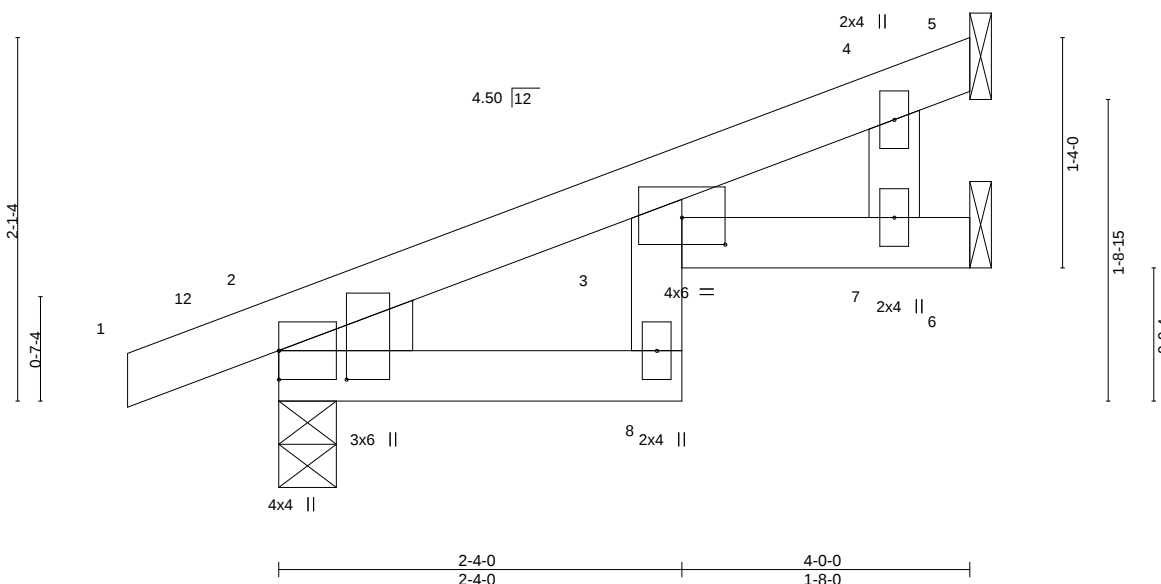


Plate Offsets (X,Y)-- [2:0-2-0,0-4-11], [3:0-3-0,0-1-14]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.41				MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.21					
TCDL	20.0	Rep Stress Incr	YES	WB	0.04					
BCLL	0.0	Code IRC2018/TPI2014		Matrix-AS						
BCDL	10.0								Weight: 13 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 5=Mechanical, 2=0-4-0, 6=Mechanical
Max Horz 2=50(LC 12)
Max Uplift 5=9(LC 23), 2=-25(LC 12), 6=-28(LC 16)
Max Grav 5=5(LC 16), 2=359(LC 23), 6=252(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 4-7=-293/173

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) -0-10-8 to 2-1-1, Interior(1) 2-1-1 to 3-11-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); PF=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 2, 6.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

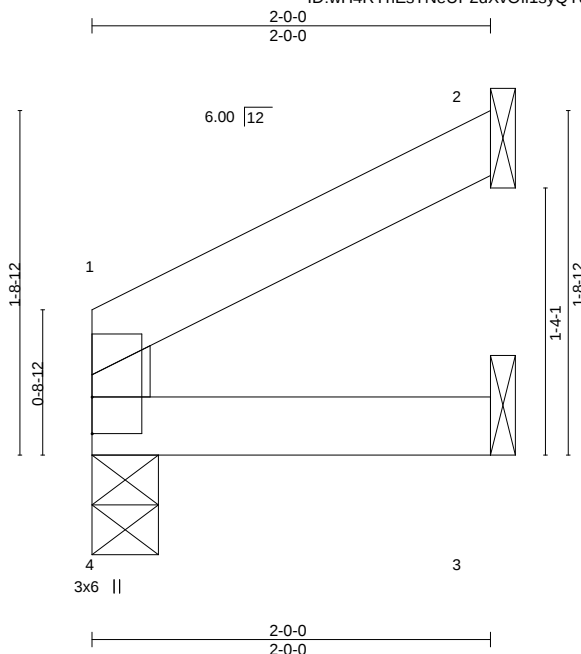
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733271
2544696	J12	JACK-OPEN	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:38 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-3HON86xBg9ki43h_9ckiAjUYQ4OG7_sx8bmQ9JyGLEh



Scale = 1:11.6

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.07	Vert(LL) -0.00	4	>999	240		MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.04	Vert(CT) -0.00	3-4	>999	180			
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT) -0.00	2	n/a	n/a			
BCLL 0.0	Code IRC2018/TPI2014	Matrix-MR							
BCDL 10.0									

Weight: 5 lb FT = 20%

LUMBER-

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

BRACING-

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

REACTIONS.

(size) 4=0-4-0, 2=Mechanical, 3=Mechanical
Max Horz 4=26(LC 13)
Max Uplift 2=21(LC 16)
Max Grav 4=111(LC 22), 2=85(LC 22), 3=37(LC 7)

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

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



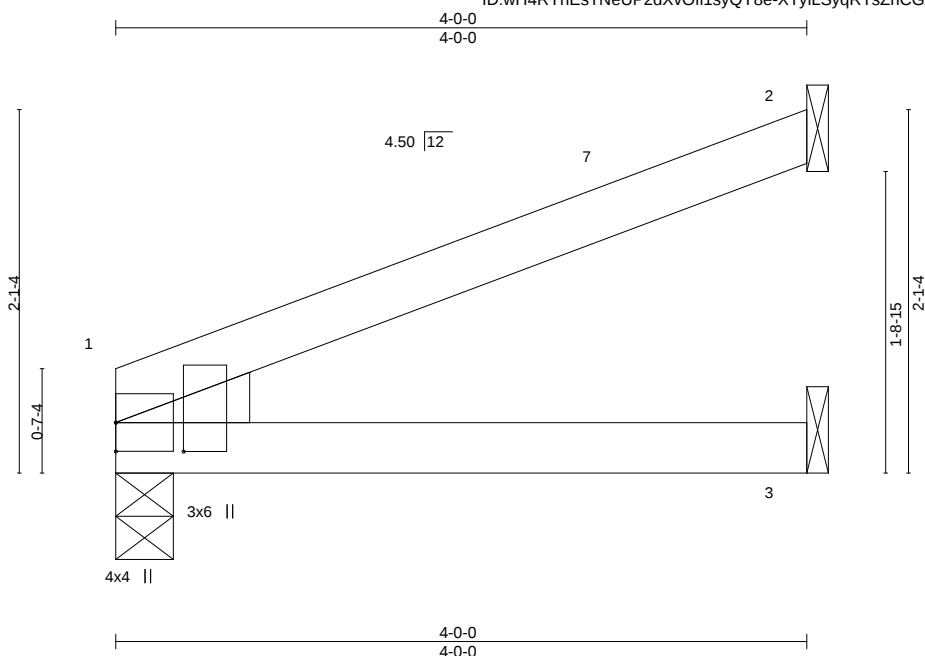
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss J13	Truss Type JACK-OPEN	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733272
----------------	--------------	-------------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:39 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-XTyILSyqRTsZhCGAjkG_ix1gqUg3sR64NFWzhlyGLeg



Scale = 1:13.3

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

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.28	Vert(LL) -0.02	3-6	>999	240	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.26	Vert(CT) -0.04	3-6	>999	180		
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.01	1	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-AS						
BCDL 10.0							Weight: 10 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEDGE
Left: 2x4 SPF No.2

BRACING-

TOP CHORD Structural wood sheathing directly applied.
BOT CHORD Rigid ceiling directly applied.

REACTIONS. (size) 1=0-4-0, 2=Mechanical, 3=Mechanical
Max Horz 1=40(LC 16)
Max Uplift 1=-3(LC 16), 2=-29(LC 16)
Max Grav 1=248(LC 22), 2=176(LC 22), 3=79(LC 7)

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 3-11-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCDL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 2.
- 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) This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheetrock be applied directly to the bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



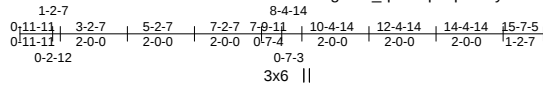
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	LG01	GABLE	1	1	143733273
Job Reference (optional)					

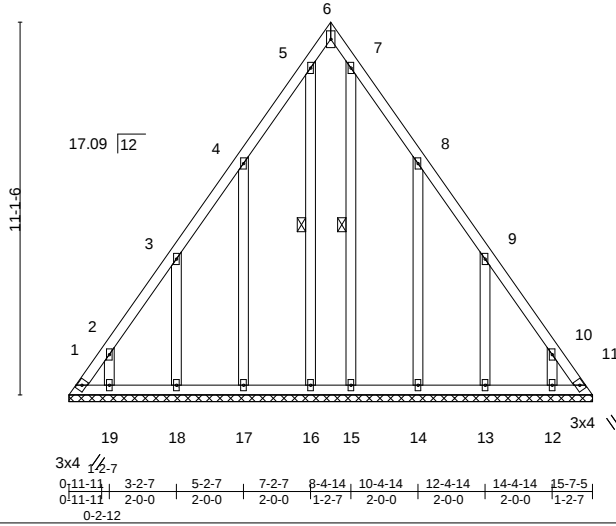
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:40 2020 Page 1

ID:3seZTgShN_qvhelqPBpz4myNXMX-?gW8ZoySCn_QJMrNH1nDF8ZuGu4ibrUEcvFXECyGLef



Scale = 1:68.7



LOADING (psf)	SPACING-	CSL.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.11	Vert(LL) n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.05	Vert(CT) n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.25	Horz(CT) 0.01	11	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S					Weight: 97 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014							

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 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.
WEBS 1 Row at midpt 5-16, 7-15

REACTIONS.

All bearings 15-7-5.
(lb) - Max Horz 1=235(LC 13)
Max Uplift All uplift 100 lb or less at joint(s) 16, 15 except 1=-190(LC 12), 11=-166(LC 13), 19=-105(LC 14), 18=-124(LC 14), 17=-139(LC 14), 12=-105(LC 15), 13=-124(LC 15), 14=-140(LC 15)
Max Grav All reactions 250 lb or less at joint(s) 19, 16, 12, 15 except 1=309(LC 14), 11=298(LC 15), 18=266(LC 25), 17=273(LC 25), 13=266(LC 26), 14=275(LC 26)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-441/410, 2-3=-305/290, 9-10=-305/290, 10-11=-441/410
BOT CHORD 1-19=-232/263, 18-19=-232/263, 17-18=-232/263, 16-17=-232/263, 15-16=-232/263, 14-15=-232/263, 13-14=-232/263, 12-13=-232/263, 11-12=-232/263
WEBS 3-18=-276/189, 4-17=-299/211, 9-13=-276/189, 8-14=-299/211

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-3-6 to 3-2-7, Interior(1) 3-2-7 to 7-9-11, Exterior(2R) 7-9-11 to 10-9-11, Interior(1) 10-9-11 to 15-3-15 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 16, 15 except (jt=lb) 1=190, 11=166, 19=105, 18=124, 17=139, 12=105, 13=124, 14=140.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	LG03	GABLE	1	1	I43733274
Job Reference (optional)					

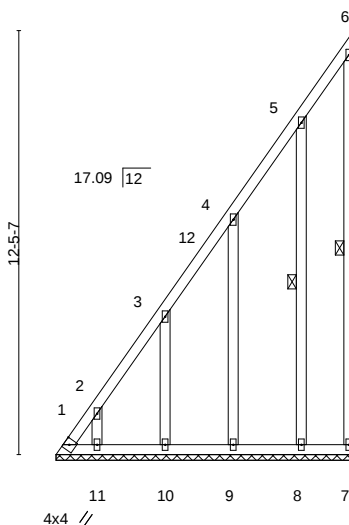
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:41 2020 Page 1

ID:3seZTgShN_qvheIqPBpz4myNXMX-Ts3Wm8z4z46HxWQZqllSnM62BIQIKImNqZ?4meyGLee

1-2-7 3-2-7 5-2-7 7-2-7 8-8-15
1-2-7 2-0-0 2-0-0 2-0-0 1-6-8

Scale = 1:67.7



1-2-7 3-2-7 5-2-7 7-2-7 8-8-15
1-2-7 2-0-0 2-0-0 2-0-0 1-6-8

LOADING (psf)	SPACING-	CS.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.16	Vert(LL) n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.02	Vert(CT) n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.25	Horz(CT) 0.00		n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-P					Weight: 65 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014							

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
WEBS 1 Row at midpt 6-7, 5-8

REACTIONS.

All bearings 8-8-15.
(lb) - Max Horz 1=321(LC 14)
Max Uplift All uplift 100 lb or less at joint(s) 7 except 1=-226(LC 12), 11=-104(LC 14), 10=-126(LC 14), 9=-112(LC 14), 8=-112(LC 14)
Max Grav All reactions 250 lb or less at joint(s) 7, 11, 8 except 1=445(LC 14), 10=267(LC 25), 9=266(LC 25)

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

TOP CHORD 1-2=-831/720, 2-3=-651/585, 3-4=-425/409
WEBS 3-10=-296/252, 4-9=-296/217, 5-8=-265/187

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Corner(3) 0-3-6 to 4-6-4, Exterior(2R) 4-6-4 to 8-7-3 zone; cantilever left and right exposed ; end vertical left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) All plates are 2x4 MT20 unless otherwise indicated.
- 4) Gable requires continuous bottom chord bearing.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7 except (jt=lb) 1=226, 11=104, 10=126, 9=126, 8=112.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss LG04	Truss Type GABLE	Qty 1	Ply 1	Summit/17 Woodside 143733275
Builders FirstSource (Valley Center), Valley Center, KS - 67147, 8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:42 2020 Page 1					
Job Reference (optional) ID:3seZTgShN_qvheiqPBpz4myNXMX-y2du_U_ikOE7Yg_IOSphKZfEHhml3o3X3DkdI4yGLed					

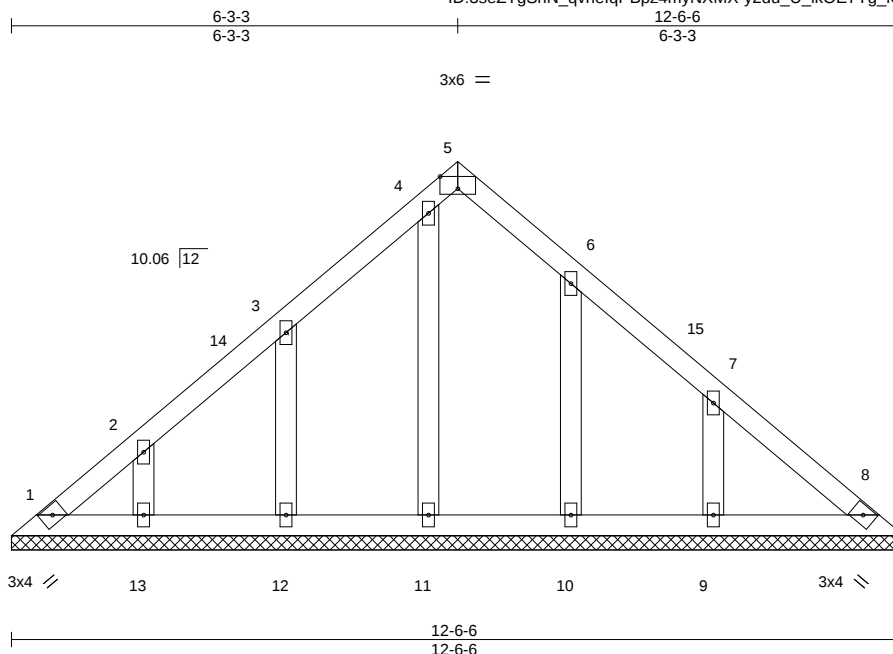


Plate Offsets (X,Y)-- [5:0-3:0,Edge]												
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d				PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.08	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.04	Vert(CT)	n/a	-	n/a	999		
TCDL	20.0	Rep Stress Incr	YES	WB	0.05	Horz(CT)	0.00	8	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-S							Weight: 47 lb	FT = 20%
BCDL	10.0											

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

REACTIONS.

All bearings 12-6-6.
(lb) - Max Horz 1=98(LC 13)
Max Uplift All uplift 100 lb or less at joint(s) 1, 13, 12, 10, 9
Max Grav All reactions 250 lb or less at joint(s) 1, 8, 13, 12, 11, 10 except 9=282(LC 26)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 6-3-3, Exterior(2R) 6-3-3 to 9-3-3, Interior(1) 9-3-3 to 12-1-9 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 13, 12, 10, 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	143733276
2544696	LG05	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:43 2020 Page 1

ID:3seZTgShN_qvheLqPBp4myNXMX-QFBGBq?KViM_AqZxy9KwtnBO555AoFTgtUBqWyGLec

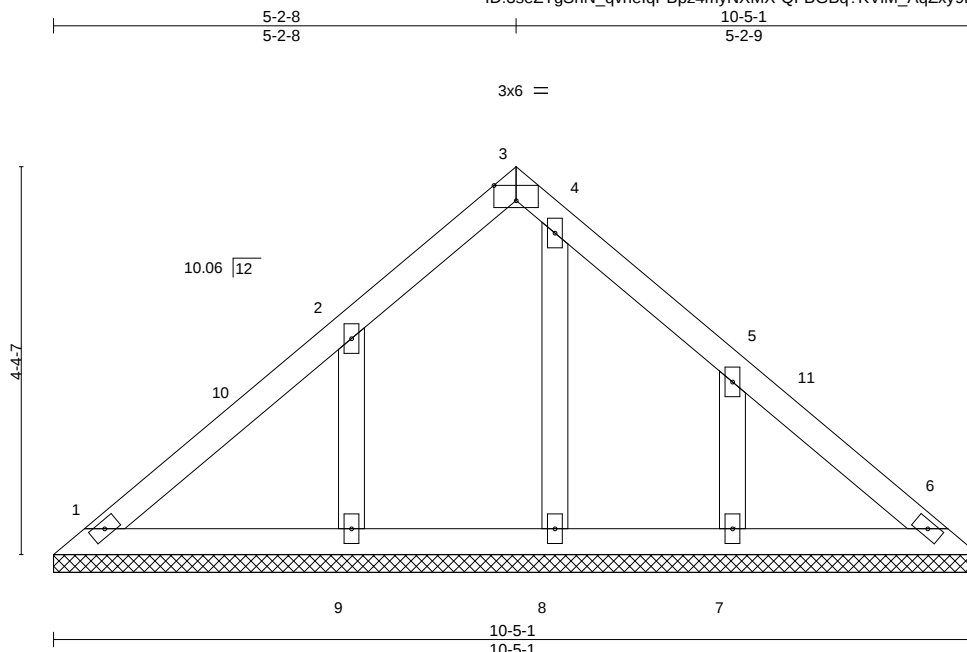


Plate Offsets (X,Y)-- [3:0-3:0,Edge]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.14	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.06	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.04	Horz(CT)	0.00	6	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S							
BCDL 10.0	Code IRC2018/TPI2014							Weight: 35 lb	FT = 20%

LUMBER-

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

BRACING-

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

REACTIONS.

All bearings 10-5-1.
(lb) - Max Horz 1=80(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 7, 9
Max Grav All reactions 250 lb or less at joint(s) 1, 6, 8 except 7=298(LC 26), 9=354(LC 25)

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

WEBS 2-9=-278/195

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-4-13 to 3-4-4, Interior(1) 3-4-4 to 5-2-8, Exterior(2R) 5-2-8 to 8-2-8, Interior(1) 8-2-8 to 10-0-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

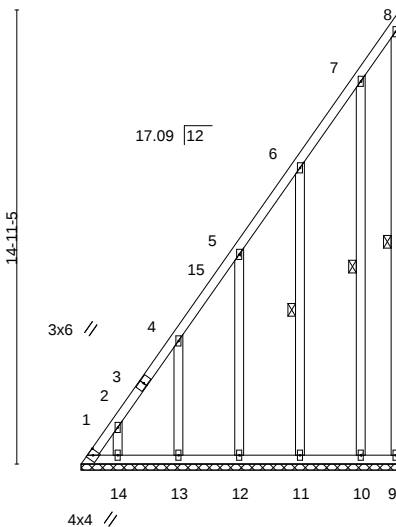
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	LG06	GABLE	1	1	I43733277
Job Reference (optional)					

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:44 2020 Page 1

ID:3seZTgShN_qvhelqPBpz4myNXMX-uRleO9?yG?Uro_88Wtr9P_kZAVR_XfjqWXDkNzyGLEb

1-2-7 3-2-7 5-2-7 7-2-7 9-2-7 10-5-15
1-2-7 2-0-0 2-0-0 2-0-0 2-0-0 1-3-8



Scale = 1:75.8

1-2-7 3-2-7 5-2-7 7-2-7 9-2-7 10-5-15
1-2-7 2-0-0 2-0-0 2-0-0 2-0-0 1-3-8

LOADING (psf)	SPACING-	CS.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.18	Vert(LL) n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.02	Vert(CT) n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.23	Horz(CT) 0.00	9	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S						
BCDL 10.0	Code IRC2018/TPI2014						Weight: 87 lb	FT = 20%

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 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.
WEBS 1 Row at midpt 8-9, 6-11, 7-10

REACTIONS.

All bearings 10-5-15.
(lb) - Max Horz 1=388(LC 14)
Max Uplift All uplift 100 lb or less at joint(s) 9, 10 except 1=-278(LC 12), 14=-104(LC 14), 13=-127(LC 14), 12=-121(LC 14), 11=-129(LC 14)
Max Grav All reactions 250 lb or less at joint(s) 9, 14, 10 except 1=541(LC 14), 13=269(LC 25), 12=257(LC 25), 11=272(LC 25)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-957/841, 2-4=-792/717, 4-5=-573/543, 5-6=-388/380
WEBS 4-13=-293/244, 5-12=-279/203, 6-11=-297/208

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Corner(3) 0-3-6 to 4-6-4, Exterior(2R) 4-6-4 to 10-4-3 zone; cantilever left and right exposed ;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 9, 10 except (jt=lb) 1=278, 14=104, 13=127, 12=121, 11=129.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



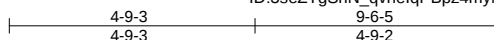
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733278
2544696	LG07	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:45 2020 Page 1

ID:3seZTgShN_qvheIQPBpz4myNXMX-MdJ1cV0a1JdiP7jK3aNoyCHkqvpG8MzIBzlvPyGLea



4x4 =

Scale = 1:44.7

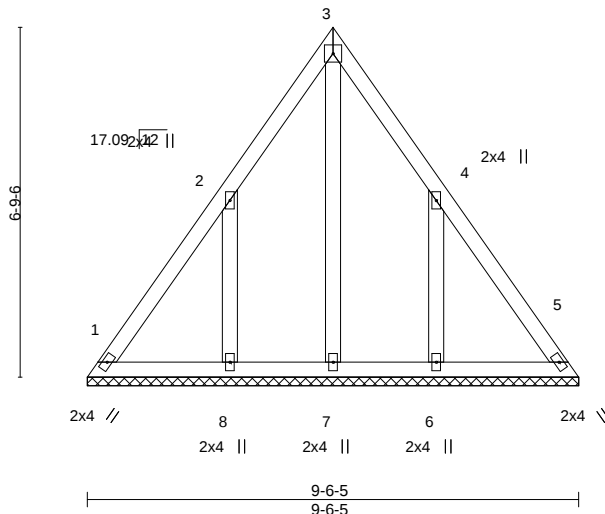


Plate Offsets (X,Y)-- [4:0-0-1,0-0-0]

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.12	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.05	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.08	Horz(CT)	0.00	5	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S							
BCDL 10.0	Code IRC2018/TPI2014							Weight: 43 lb	FT = 20%

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

REACTIONS.

- All bearings 9-6-5.
(lb) - Max Horz 1=-140(LC 10)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 8=-168(LC 14), 6=-167(LC 15)
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 7 except 8=358(LC 25), 6=357(LC 26)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-8=-368/255, 4-6=-368/255

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-3-6 to 3-3-6, Interior(1) 3-3-6 to 4-9-3, Exterior(2R) 4-9-3 to 7-9-3, Interior(1) 7-9-3 to 9-2-15 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (jt=lb) 8=168, 6=167.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



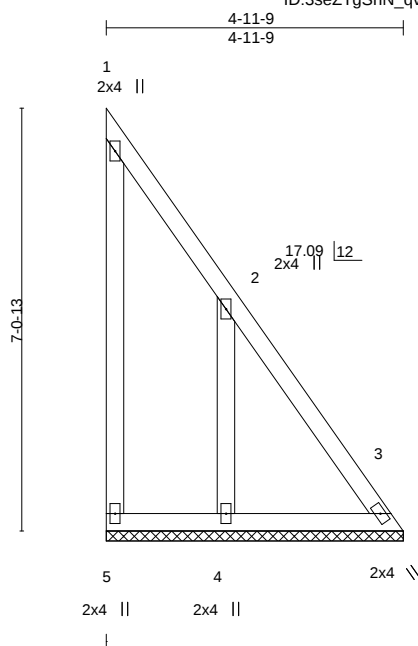
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	LG08	GABLE	1	1	143733279
Job Reference (optional)					

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:46 2020 Page 1

ID:3se2TgShN_qvhelqPBp4myNXMX-qqtPpr1DodlZ1HIWdludUPpqtJ7r?bB6_qirRryGLEZ



Scale = 1:38.5

LOADING (psf)	SPACING-	CS.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.42	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.06	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.11	Horz(CT)	0.00	3	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-P							
BCDL 10.0	Code IRC2018/TPI2014							Weight: 26 lb	FT = 20%

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 4-11-9 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 5=4-11-9, 3=4-11-9, 4=4-11-9

Max Horz 5=-196(LC 10)
Max Uplift 5=-85(LC 12), 3=-77(LC 11), 4=-177(LC 15)
Max Grav 5=95(LC 11), 3=218(LC 25), 4=378(LC 26)

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

TOP CHORD 2-3=-492/527
BOT CHORD 4-5=-330/340, 3-4=-330/340
WEBS 2-4=-438/314

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3 except (jt=lb) 4=177.
- 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733280
2544696	LG09	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:48 2020 Page 1

ID:3seZTgShN_qvhelqPBpz4myNXMX-mC?9EX3TKE?HGbSvlw5aqvFa6phTVXPR8ByWkyGLeX

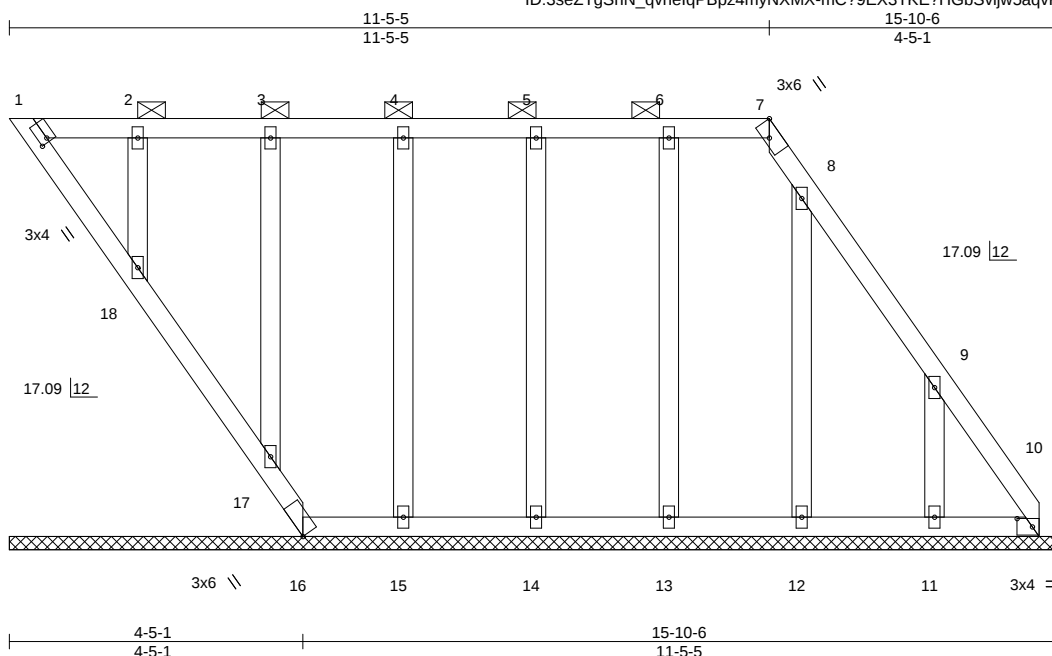


Plate Offsets (X,Y)-- [1:0-0-12,0-1-8], [7:0-2-14,Edge], [10:0-2-12,0-1-8], [16:0-0-0,Edge]

LOADING (psf)	SPACING-	CSL	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.09	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.04	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.12	Horz(CT)	0.01	10	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S							
BCDL 10.0	Code IRC2018/TPI2014							Weight: 78 lb	FT = 20%

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.): 1-7.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

All bearings 15-10-6.
(lb) - Max Horz 1=-163(LC 15)
Max Uplift All uplift 100 lb or less at joint(s) 1, 10, 14, 15, 17, 18, 13, 12 except 16=-143(LC 15),
11=-149(LC 15)
Max Grav All reactions 250 lb or less at joint(s) 1, 10, 16, 14, 15, 17, 18, 13, 12 except 11=275(LC 26)

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

WEBS 9-11=-296/214

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-3-6 to 3-3-6, Interior(1) 3-3-6 to 11-5-5, Exterior(2R) 11-5-5 to 14-5-5, Interior(1) 14-5-5 to 15-6-2 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Provide adequate drainage to prevent water ponding.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 10, 14, 15, 17, 18, 13, 12 except (jt=lb) 16=143, 11=149.
- Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 1, 17, 18.
- 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.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

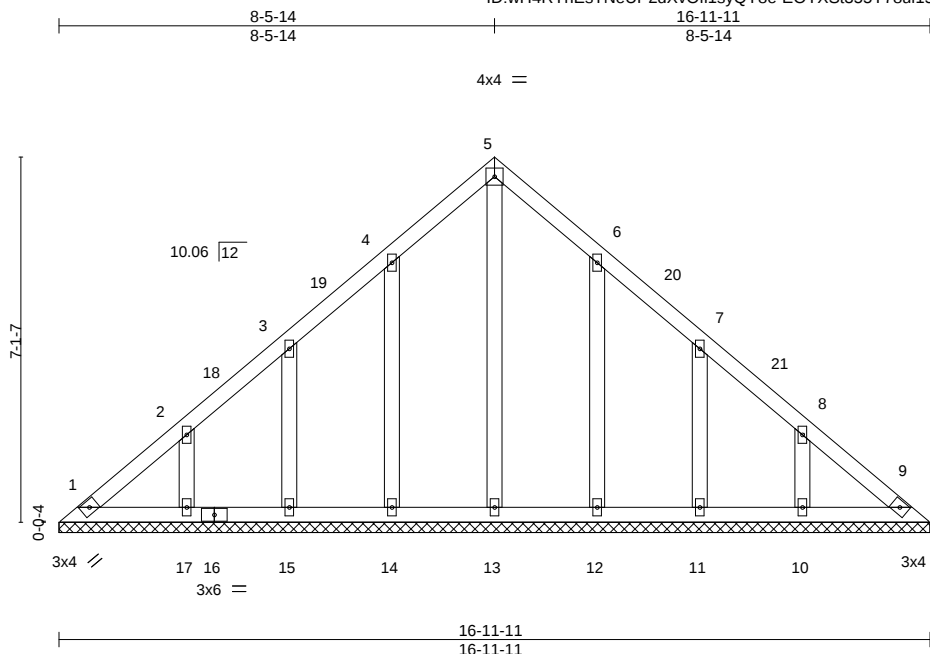
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside
2544696	LG10	GABLE	1	1	I43733281

Builders FirstSource (Valley Center),

Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:49 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-EOYXSt355Y78ul15lQRK62RQfW90CyyZgoxV2AyGLeW



Scale = 1:44.9

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.07	Vert(LL)	n/a	-	n/a	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.03	Vert(CT)	n/a	-	n/a		
TCDL 20.0	Lumber DOL 1.15	WB 0.11	Horz(CT)	0.00	9	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S					Weight: 73 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014							

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

REACTIONS.

All bearings 16-11-11.
(lb) - Max Horz 1=135(LC 13)
Max Uplift All uplift 100 lb or less at joint(s) 1, 14, 15, 17, 12, 11, 10
Max Grav All reactions 250 lb or less at joint(s) 1, 9, 13, 14, 15, 12, 11 except 17=263(LC 25), 10=263(LC 26)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 8-5-14, Exterior(2R) 8-5-14 to 11-5-14, Interior(1) 11-5-14 to 16-6-14 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 14, 15, 17, 12, 11, 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

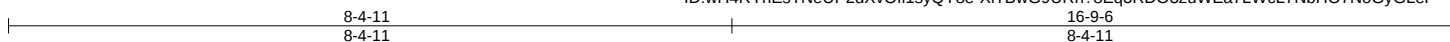
Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733282
2544696	V1	Valley	1	1		

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

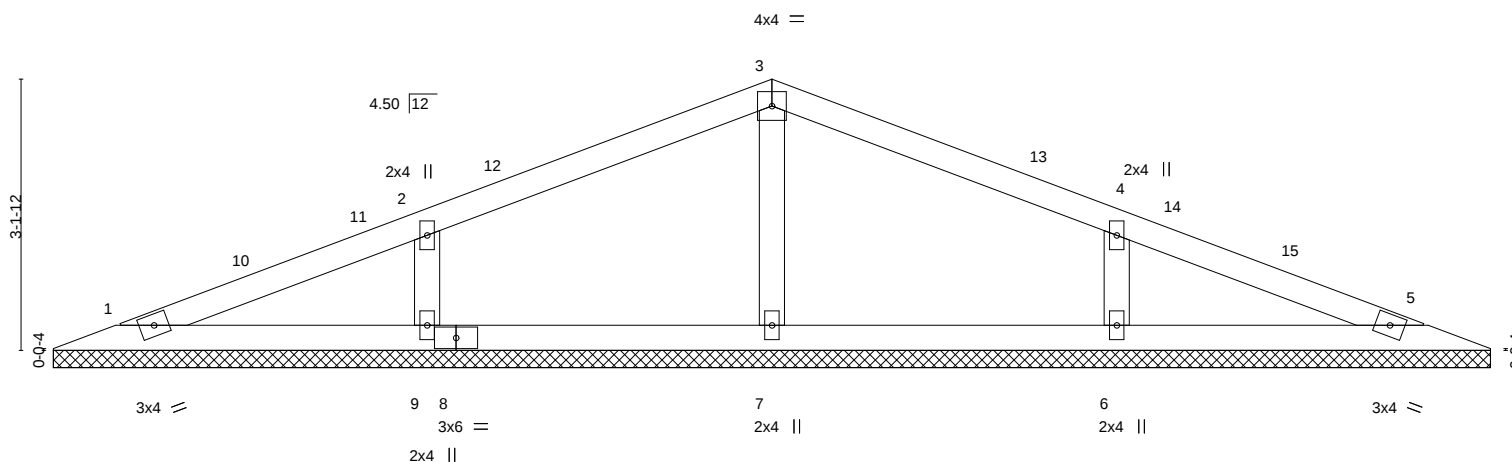
8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:56 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-XITBwG9URh?8Eq3RDO3zuWEa7LWcL7NbHO7NoGyGLeP

Job Reference (optional)



Scale = 1:26.7



0-0-11	16-9-6
0-0-11	16-8-12

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.31	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.10	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.06	Horz(CT)	0.00	5	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S							
BCDL 10.0	Code IRC2018/TPI2014							Weight: 43 lb	FT = 20%

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

REACTIONS.

All bearings 16-8-1.
(lb) - Max Horz 1=-28(LC 21)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5, 9, 6
Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=379(LC 2), 9=563(LC 22), 6=563(LC 23)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 3-7=-305/72, 2-9=-472/163, 4-6=-472/163

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-10-1 to 3-10-1, Interior(1) 3-10-1 to 8-4-11, Exterior(2R) 8-4-11 to 11-4-11, Interior(1) 11-4-11 to 15-11-6 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 9, 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



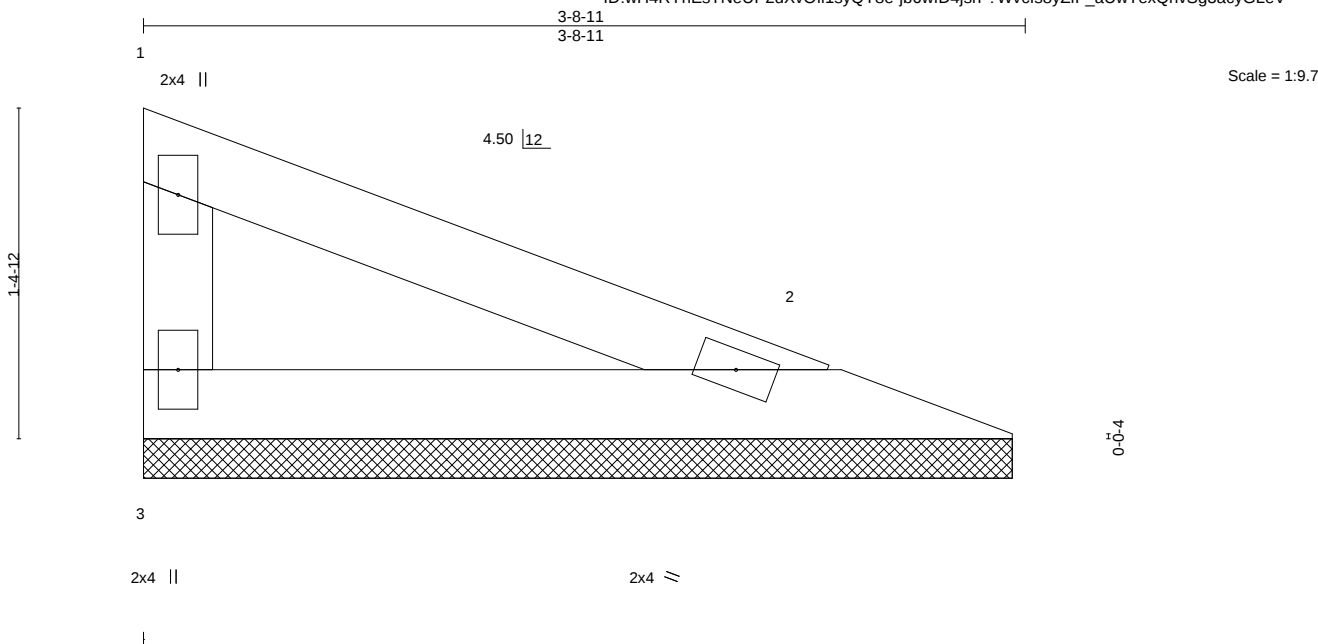
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss V03	Truss Type VALLEY	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733284
----------------	--------------	----------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:50 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOf1syQY8e-jb6wfD4jsrF?Wvcls8yZif_aUwTexQrivSg3acyGLEv



LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.19	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.07	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.00	Horz(CT)	0.00	2	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-P						Weight: 9 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014								

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 3-8-11 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 3=3-8-0, 2=3-8-0
Max Horz 3=-34(LC 12)
Max Uplift 3=-12(LC 17), 2=-7(LC 17)
Max Grav 3=167(LC 23), 2=167(LC 23)

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=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) Gable requires continuous bottom chord bearing.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



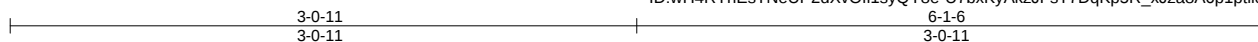
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733285
2544696	V3	Valley	1	1	Job Reference (optional)	

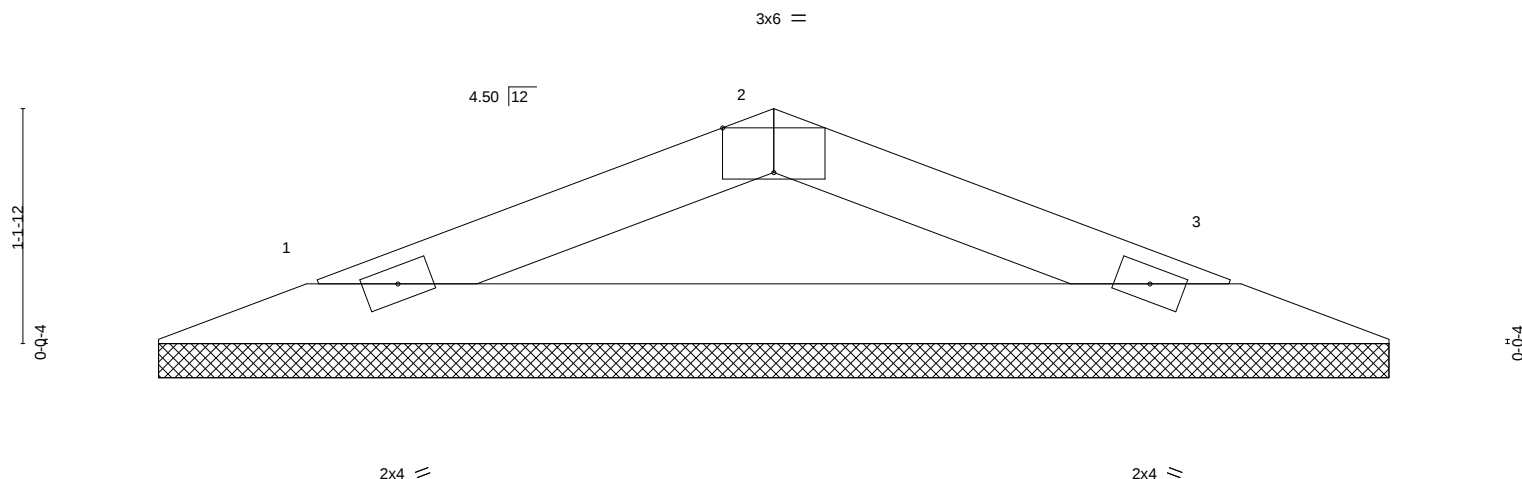
Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:58 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-U7bxKyAkzJFsT7DqKp5R_xJza8A6p1ptlicUs9yGLEn



Scale = 1:11.2



0-0-11	6-1-6
0-0-11	6-0-12

Plate Offsets (X,Y)-- [2-0-3-0,Edge]												
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) l/defl L/d				PLATES	GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.12	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.23	Vert(CT)	n/a	-	n/a	999		
TCDL	20.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00	3	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-P							Weight: 12 lb	FT = 20%
BCDL	10.0											

LUMBER-

TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 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=6-0-1, 3=6-0-1
Max Horz 1=-8(LC 21)
Max Uplift 1=-9(LC 16), 3=-9(LC 17)
Max Grav 1=244(LC 2), 3=244(LC 2)

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

TOP CHORD 1-2=-309/192, 2-3=-309/199
BOT CHORD 1-3=-154/263

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCCL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCCL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733286
2544696	V04	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:51 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-BngIsZ5Lc9Ns72AUQrToBTXiwKpBgt8r86Qc73yGLeU

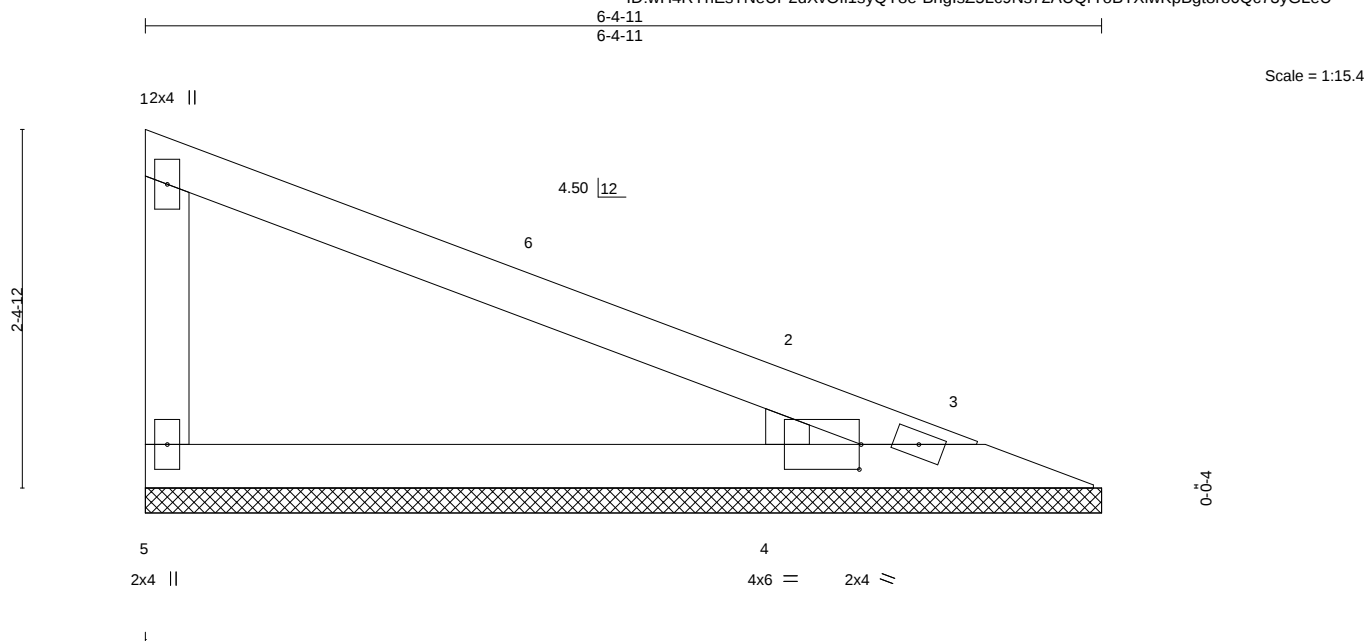


Plate Offsets (X,Y)-- [2:0-1-12,0-0-10], [4:0-0-2,0-2-0], [4:0-1-12,0-0-0]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL	1.15	TC 0.34	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Lumber DOL	1.15	BC 0.12	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Rep Stress Incr	YES	WB 0.06	Horz(CT)	0.00	3	n/a	n/a		
BCLL 0.0	Code	IRC2018/TPI2014	Matrix-P						Weight: 16 lb	FT = 20%
BCDL 10.0										

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) 5=6-4-11, 3=6-4-11, 4=6-4-11
Max Horz 5=-66(LC 12)
Max Uplift 5=-12(LC 17), 3=-91(LC 23), 4=-47(LC 17)
Max Grav 5=215(LC 23), 3=23(LC 17), 4=573(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-4=-484/263

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 4-3-8, Interior(1) 4-3-8 to 5-6-10 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) Gable requires continuous bottom chord bearing.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



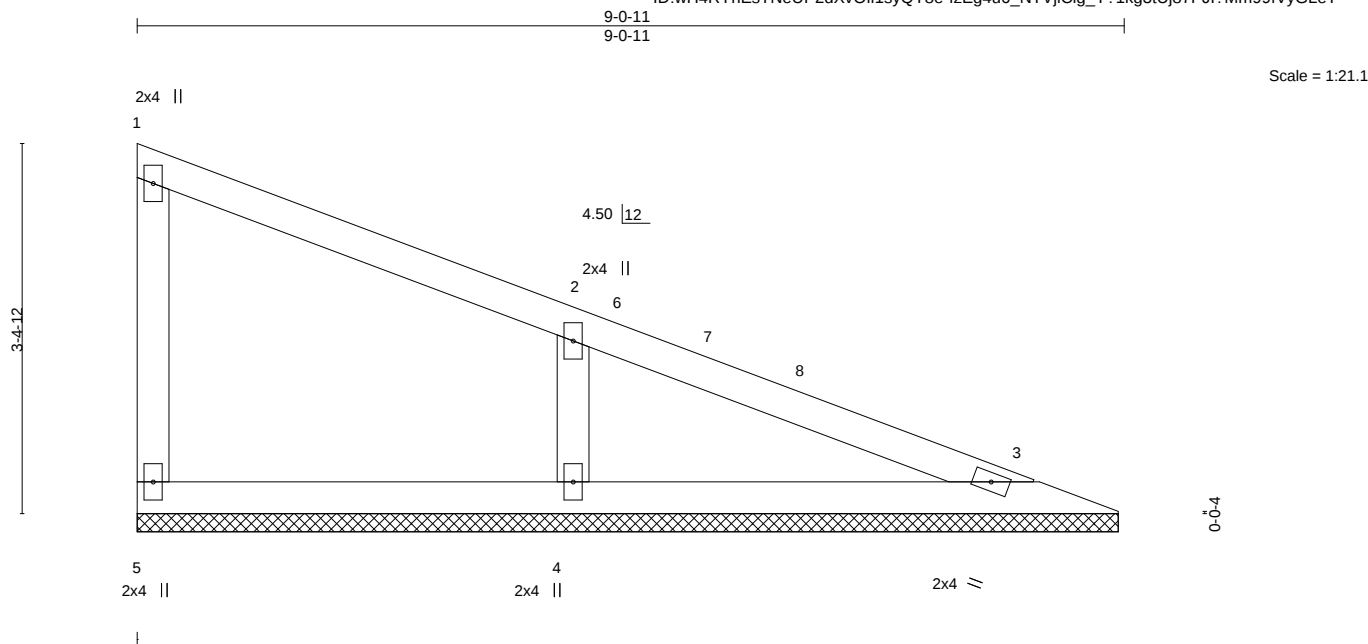
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733287
2544696	V05	VALLEY	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:52 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-fzEg4u6_NTVjIClg_Y?1kg3tUj87PJl?Mm99fVyGLeT



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.35	Vert(LL)	n/a	-	n/a	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.13	Vert(CT)	n/a	-	n/a		
TCDL 20.0	Lumber DOL 1.15	WB 0.07	Horz(CT)	0.00	3	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-S					Weight: 25 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014							

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) 5=9-0-0, 3=9-0-0, 4=9-0-0
Max Horz 5=-98(LC 14)
Max Uplift 5=-11(LC 12), 4=-52(LC 17)
Max Grav 5=193(LC 23), 3=185(LC 2), 4=611(LC 23)

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

WEBS 2-4=-503/217

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 4-4-11, Interior(1) 4-4-11 to 8-2-10 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) Gable requires continuous bottom chord bearing.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



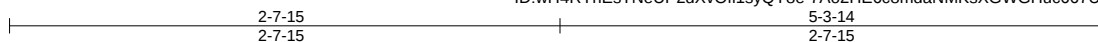
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss V06	Truss Type VALLEY	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733288
----------------	--------------	----------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:53 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOfi1syQY8e-7Ao2HE6c8mdaNMksXGwGHuc667Ub8na8bQvjBxyGLes



3x6 =

Scale = 1:11.1

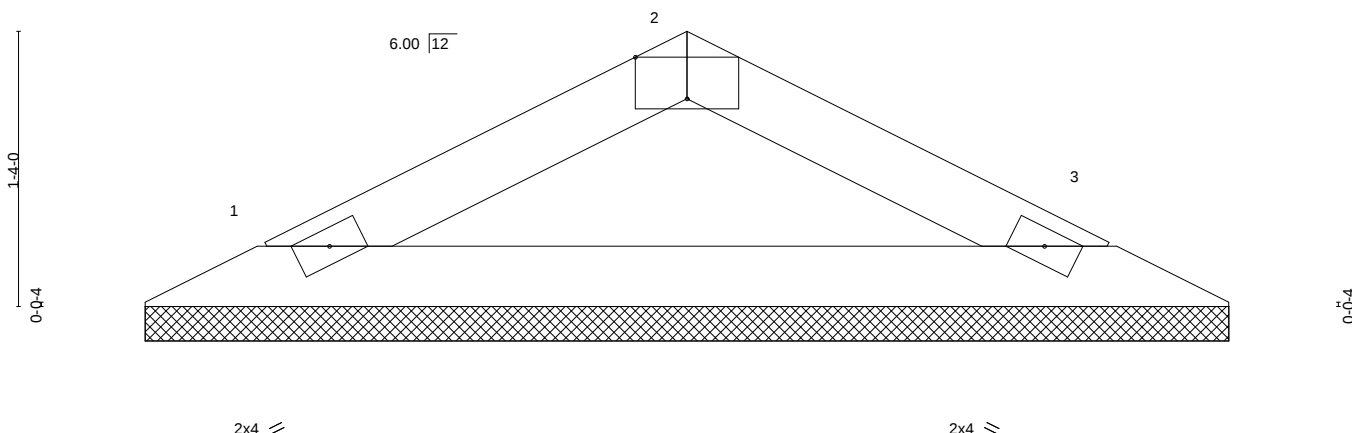


Plate Offsets (X,Y)--	[2-0-3-0,Edge]	5-3-6	5-3-6	5-3-14	0-0-8
-----------------------	----------------	-------	-------	--------	-------

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	Plate Grip DOL 1.15	TC 0.10	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Lumber DOL 1.15	BC 0.18	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Rep Stress Incr YES	WB 0.00	Horz(CT)	0.00	3	n/a	n/a		
BCLL 0.0	Code IRC2018/TPI2014	Matrix-P							
BCDL 10.0								Weight: 11 lb	FT = 20%

LUMBER-

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

BRACING-

TOP CHORD Structural wood sheathing directly applied or 5-3-14 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=5-2-14, 3=5-2-14
Max Horz 1=11(LC 15)
Max Uplift 1=7(LC 16), 3=7(LC 17)
Max Grav 1=223(LC 2), 3=223(LC 2)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); PF=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 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.



November 23,2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



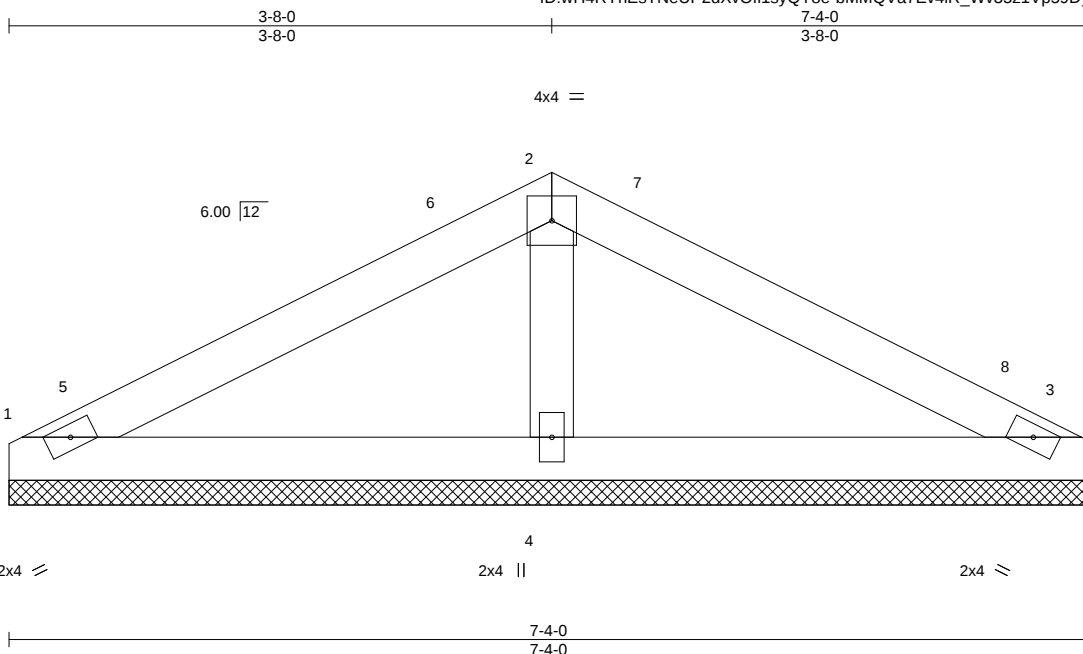
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job 2544696	Truss V07	Truss Type VALLEY	Qty 1	Ply 1	Summit/17 Woodside Job Reference (optional)	I43733289
----------------	--------------	----------------------	----------	----------	--	-----------

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:54 2020 Page 1

ID:wH4RYhEsTNeUP2dXvOfi1syQY8e-bMMQVa7Ev4IR_Wv35z1Vp59DyXr1tDElq4eGjOyGLeR



Scale = 1:15.6

LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.35	Vert(LL)	n/a	MT20		197/144	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.11	Vert(CT)	n/a				
TCDL	20.0	Rep Stress Incr	YES	WB	0.04	Horz(CT)	0.00				
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-P							
BCDL	10.0										

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

REACTIONS.

(size) 1=7-4-0, 3=7-4-0, 4=7-4-0
Max Horz 1=19(LC 15)
Max Uplift 1=-17(LC 16), 3=-20(LC 17)
Max Grav 1=230(LC 22), 3=230(LC 23), 4=375(LC 2)

FORCES.

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-4=-286/156

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 3-8-0, Exterior(2R) 3-8-0 to 6-8-0, Interior(1) 6-8-0 to 7-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 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.



November 23, 2020

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



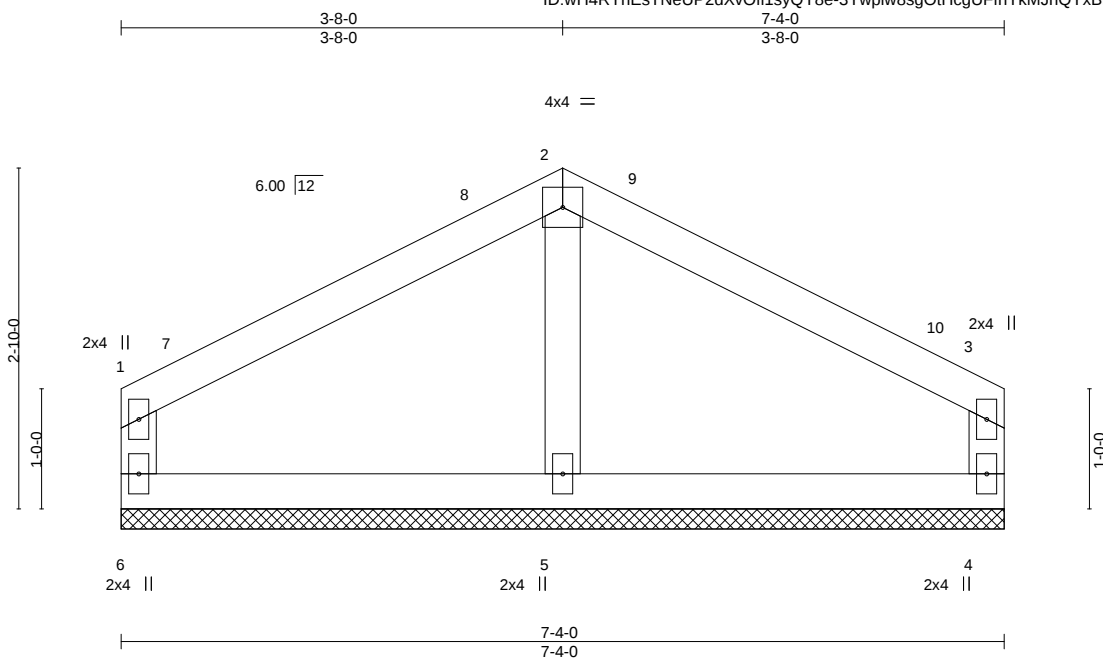
16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	Qty	Ply	Summit/17 Woodside	I43733290
2544696	V08	VALLEY	1	1	Job Reference (optional)	

Builders FirstSource (Valley Center), Valley Center, KS - 67147,

8.240 s Mar 9 2020 MiTek Industries, Inc. Mon Nov 23 09:01:55 2020 Page 1

ID:WH4RYhEsTNeUP2dXvOf1syQY8e-3Ywpiw8sgOtHcgUFhYkMjHqYxBMcgTR2kOpGqyGLEQ



Scale = 1:19.1

LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 25.0	2-0-0	TC 0.23	Vert(LL)	n/a	-	n/a	999	MT20	197/144
Snow (Pf) 20.0	Plate Grip DOL 1.15	BC 0.10	Vert(CT)	n/a	-	n/a	999		
TCDL 20.0	Lumber DOL 1.15	WB 0.04	Horz(CT)	0.00	4	n/a	n/a		
BCLL 0.0	Rep Stress Incr YES	Matrix-R						Weight: 22 lb	FT = 20%
BCDL 10.0	Code IRC2018/TPI2014								

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) 6=7-4-0, 4=7-4-0, 5=7-4-0
Max Horz 6=-41(LC 14)
Max Uplift 6=-23(LC 16), 4=-23(LC 17)
Max Grav 6=253(LC 22), 4=253(LC 23), 5=327(LC 2)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=4.2psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 3-8-0, Exterior(2R) 3-8-0 to 6-8-0, Interior(1) 6-8-0 to 7-2-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6, 4.
- 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.



November 23, 2020

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

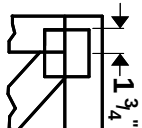
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



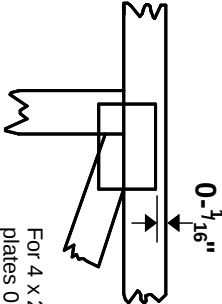
16023 Swingley Ridge Rd
Chesterfield, MO 63017

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- $\frac{1}{16}$ " from outside edge of truss.

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

*** Plate location details available in MITek 20120 software or upon request.**

PLATE SIZE

4 X 4

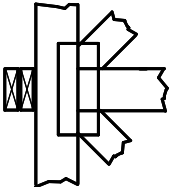
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

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



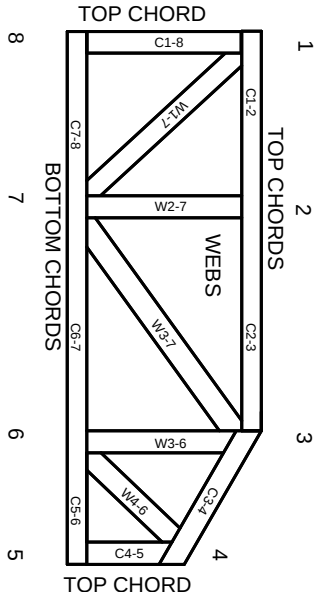
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TP1.1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

Numbering System

6-4-8 dimensions shown in ft-in-sixteenths (Drawings not to scale)



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/TP1 1 section 6.3 These truss designs rely on lumber values established by others.

© 2012 MITek® All Rights Reserved



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/TP1 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TP1 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/TP1 1 Quality Criteria.
21. The design does not take into account any dynamic or other loads other than those expressly stated.