

RE: 681099\_Master\_130 - H&H/Jackson/

Trenco  
 818 Soundside Rd  
 Edenton, NC 27932

**Site Information:**

Project Customer: H and H Project Name:  
 Lot/Block: B Subdivision: ALL  
 Model:  
 Address:  
 City: Fayetteville State: NC

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

Design Code: IRC2015/TPI2014 Design Program: MiTek 20/20 8.2  
 Wind Code: ASCE 7-10 Wind Speed: 130 mph Design Method: MWFRS (Envelope)/C-C hybrid Wind ASCE 7-10  
 Roof Load: 40.0 psf Floor Load: N/A psf  
 Mean Roof Height (feet): 25 Exposure Category: C

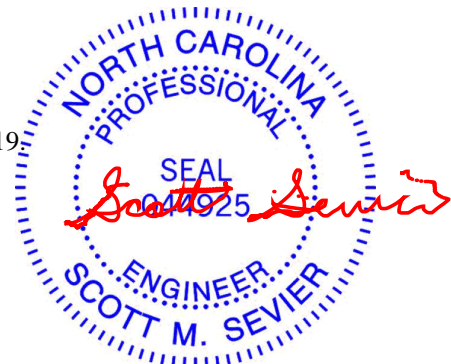
No.	Seal#	Truss Name	Date	No.	Seal#	Truss Name	Date
1	I37107367	A01	5/16/19	35	I37107401	C25	5/16/19
2	I37107368	A02	5/16/19	36	I37107402	C26	5/16/19
3	I37107369	A04	5/16/19	37	I37107403	D01	5/16/19
4	I37107370	A05	5/16/19	38	I37107404	D02	5/16/19
5	I37107371	A06	5/16/19	39	I37107405	D03	5/16/19
6	I37107372	A07	5/16/19	40	I37107406	E01	5/16/19
7	I37107373	A08	5/16/19	41	I37107407	E02	5/16/19
8	I37107374	A09	5/16/19	42	I37107408	FG01	5/16/19
9	I37107375	A10	5/16/19	43	I37107409	G01	5/16/19
10	I37107376	A11	5/16/19	44	I37107410	G02	5/16/19
11	I37107377	A20	5/16/19	45	I37107411	G03	5/16/19
12	I37107378	A21	5/16/19	46	I37107412	G04	5/16/19
13	I37107379	A22	5/16/19	47	I37107413	G05	5/16/19
14	I37107380	A23	5/16/19	48	I37107414	J01	5/16/19
15	I37107381	A24	5/16/19	49	I37107415	J02	5/16/19
16	I37107382	A25	5/16/19	50	I37107416	J03	5/16/19
17	I37107383	A26	5/16/19	51	I37107417	J04	5/16/19
18	I37107384	A27	5/16/19	52	I37107418	J05	5/16/19
19	I37107385	A28	5/16/19	53	I37107419	J06	5/16/19
20	I37107386	B01	5/16/19	54	I37107420	J07	5/16/19
21	I37107387	B02	5/16/19	55	I37107421	J22	5/16/19
22	I37107388	B03	5/16/19	56	I37107422	PB01	5/16/19
23	I37107389	B04	5/16/19	57	I37107423	PB02	5/16/19
24	I37107390	C01	5/16/19	58	I37107424	PB03	5/16/19
25	I37107391	C02	5/16/19	59	I37107425	PB04	5/16/19
26	I37107392	C03	5/16/19	60	I37107426	PB05	5/16/19
27	I37107393	C04	5/16/19	61	I37107427	PB06	5/16/19
28	I37107394	C05	5/16/19	62	I37107428	PB07	5/16/19
29	I37107395	C06	5/16/19	63	I37107429	PB08	5/16/19
30	I37107396	C07	5/16/19	64	I37107430	V01	5/16/19
31	I37107397	C21	5/16/19	65	I37107431	V02	5/16/19
32	I37107398	C22	5/16/19				
33	I37107399	C23	5/16/19				
34	I37107400	C24	5/16/19				

The truss drawing(s) referenced above have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Builders FirstSource-Sumter,SC.

Truss Design Engineer's Name: Sevier, Scott

My license renewal date for the state of North Carolina is December 31, 2019.

**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.



May 16, 2019

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107367
681099_Master_130	A01	GABLE	4	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:50 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-6Crj3UtUxTKEy7SwNfhaqJEhrIV8xyGaZchwpzG\_qZ

-0-10-8	19-3-4	23-7-12	42-11-0	43-9-8
0-10-8	19-3-4	4-4-9	19-3-4	0-10-8

Scale = 1:77.8

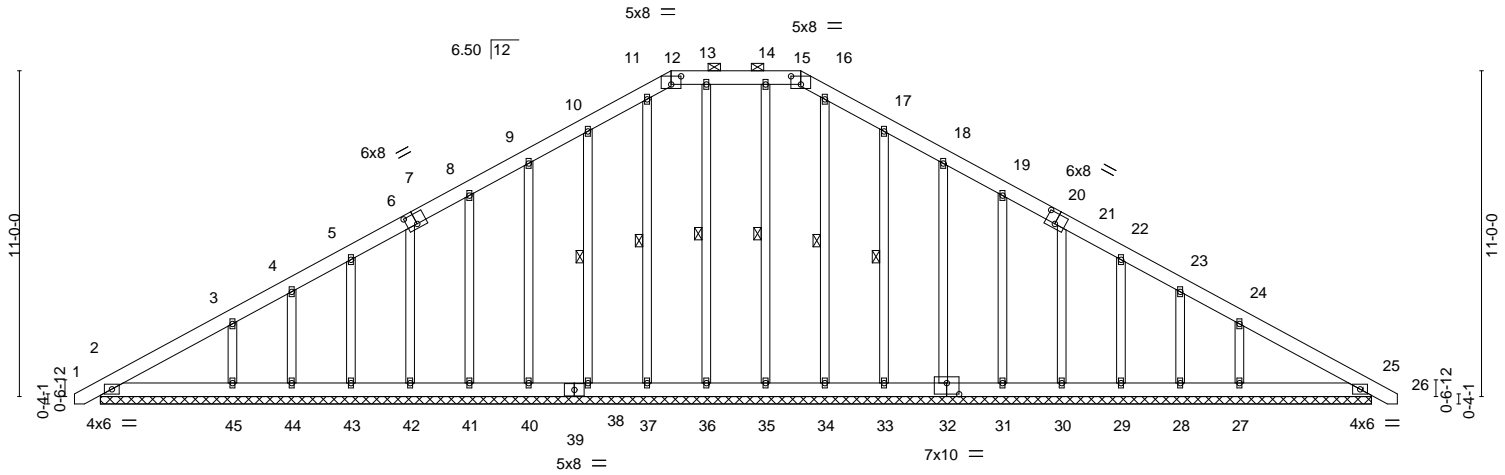


Plate Offsets (X,Y)--	[6:0-2-0,0-0-0], [7:0-4-0,0-4-4], [7:0-0-0,0-2-12], [12:0-4-0,0-3-5], [15:0-4-0,0-3-5], [20:0-4-0,0-4-4], [20:0-0-0,0-2-12], [21:0-2-0,0-0-0], [32:0-5-0,0-4-8]
-----------------------	---

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.10	Vert(LL)	0.00	26	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.06	Vert(CT)	0.00	26	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.17	Horz(CT)	0.01	25	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 388 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except 2-0-0 oc purlins (6-0-0 max.): 12-15.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 13-36, 11-37, 10-38, 14-35, 16-34, 17-33

**REACTIONS.** All bearings 42-11-0.  
 (lb) - Max Horz 2=-279(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 36, 37, 38, 40, 41, 42, 43, 44, 35, 33, 32, 31, 30, 29, 28 except 45=-195(LC 12), 27=-193(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 25, 36, 37, 38, 40, 41, 42, 43, 44, 35, 34, 33, 32, 31, 30, 29, 28 except 45=356(LC 19), 27=355(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-303/215, 8-9=-190/268, 9-10=-242/306, 10-11=-296/346, 11-12=-293/343, 12-13=-289/345, 13-14=-289/345, 14-15=-289/345, 15-16=-293/343, 16-17=-297/346, 17-18=-242/282  
 WEBS 3-45=-309/226, 24-27=-309/224

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 36, 37, 38, 40, 41, 42, 43, 44, 35, 33, 32, 31, 30, 29, 28 except (it=lb) 45=195, 27=193.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.</b></p> <p>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 <b>ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information</b> available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.</p>	<p>ENGINEERING BY</p> <p><b>TRENCO</b></p> <p>A MiTek Affiliate</p> <p>818 Soundside Road Edenton, NC 27932</p>
---	---

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107368
681099_Master_130	A02	PIGGYBACK BASE	38	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:51 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-aOPCwPVVFFbBs5ieU5Aw61rHzFTNiGxPpDLFGzG\_qY

0-10-8 9-8-4 19-3-4 23-7-12 33-2-12 42-11-0 43-9-8  
 0-10-8 9-8-4 9-6-15 4-4-9 9-6-15 9-8-4 0-10-8

Scale = 1:77.9

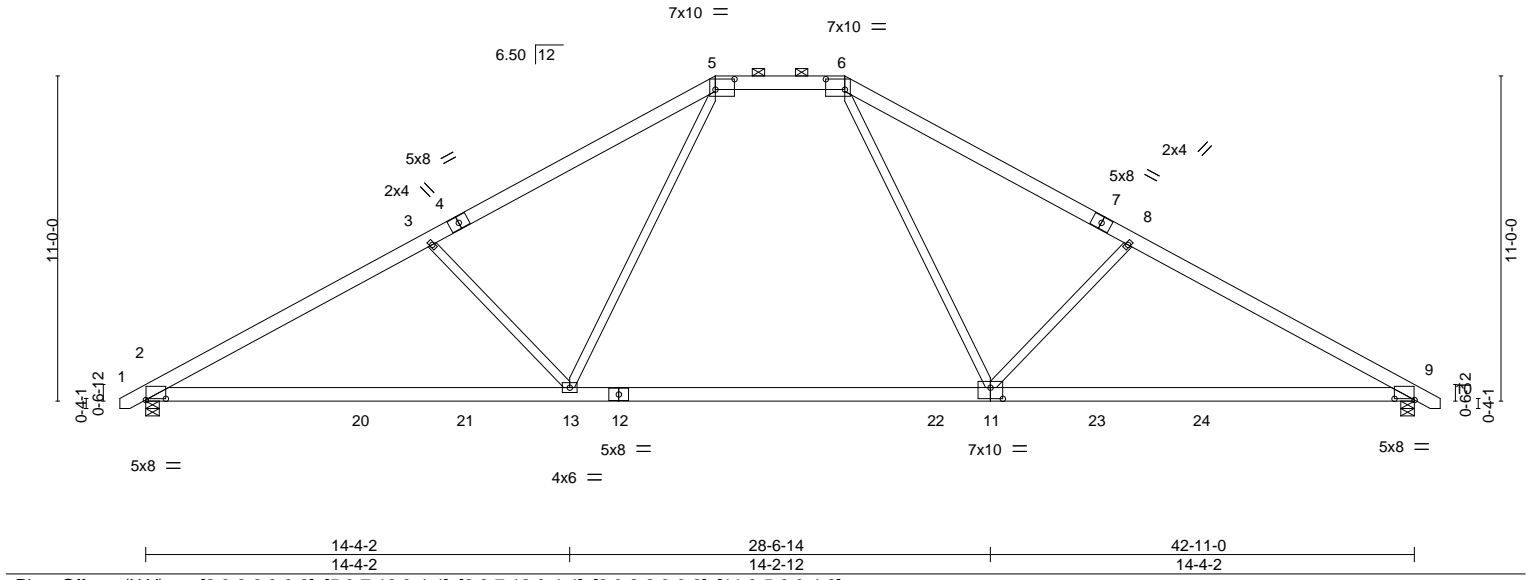


Plate Offsets (X,Y)-- [2:0-8-2,0-0-8], [5:0-7-12,0-4-4], [6:0-7-12,0-4-4], [9:0-8-2,0-0-8], [11:0-5-0,0-4-8]

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.58	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.79	Vert(LL) -0.43 11-13 >999 360		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.70	Vert(CT) -0.62 11-13 >827 240		
BCDL 10.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.09 9 n/a n/a		
	Code IRC2015/TPI2014		Wind(LL) 0.27 13-16 >999 240	Weight: 272 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1	2-0-0 oc purlins (5-1-14 max.): 5-6.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.

**REACTIONS.** (lb/size) 2=1759/0-5-8, 9=1759/0-5-8  
 Max Horz 2=-279(LC 10)  
 Max Uplift 2=-451(LC 12), 9=-451(LC 13)  
 Max Grav 2=1805(LC 2), 9=1803(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3063/1020, 3-5=-2750/957, 5-6=-1878/846, 6-8=-2746/957, 8-9=-3059/1020  
 BOT CHORD 2-13=-740/2754, 11-13=-315/1865, 9-11=-734/2645  
 WEBS 3-13=-744/576, 5-13=-265/1128, 6-11=-265/1122, 8-11=-744/576

- NOTES-** (9)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=451, 9=451.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



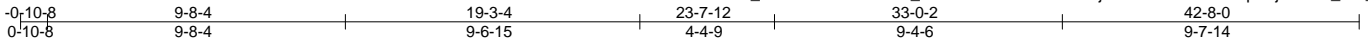
May 16, 2019

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107369
681099_Master_130	A04	PIGGYBACK BASE	10	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:52 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-3bza7kW80Zj2TFHr1oh9fFOSepVcj8Z2t5o\_izG\_qX



Scale = 1:74.9

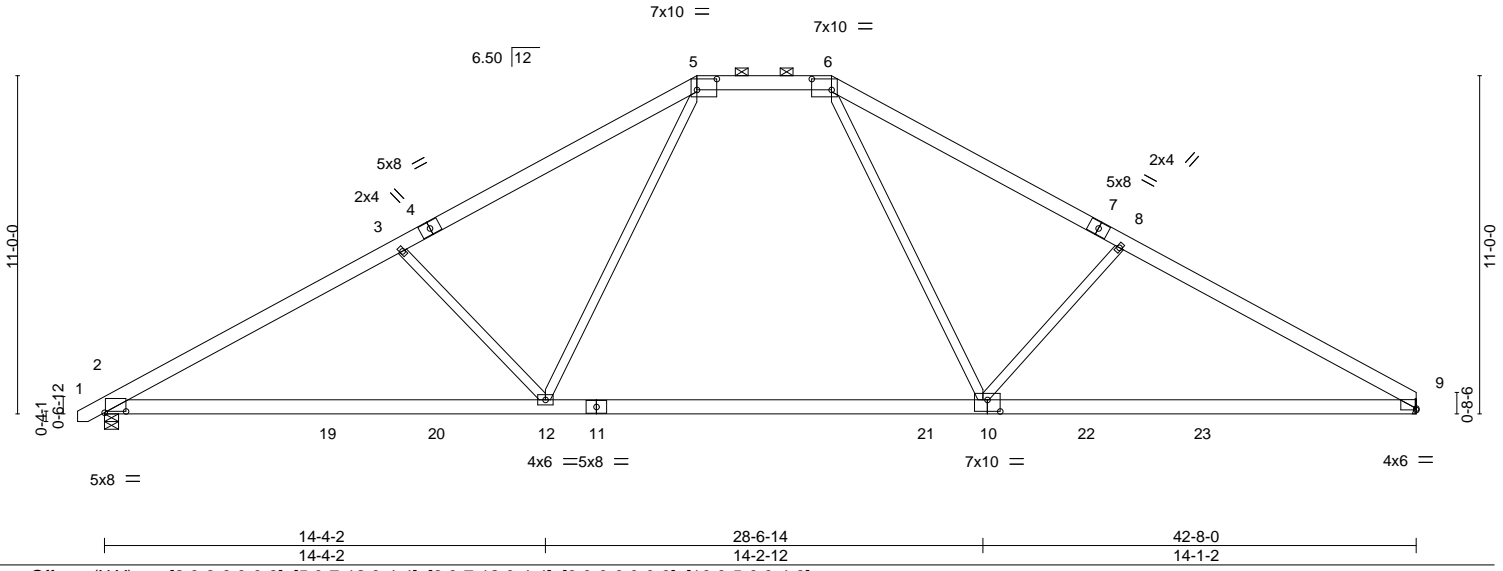


Plate Offsets (X,Y)--	[2:0-8-6,0-0-8], [5:0-7-12,0-4-4], [6:0-7-12,0-4-4], [9:0-0-0,0-0-9], [10:0-5-0,0-4-8]
-----------------------	--

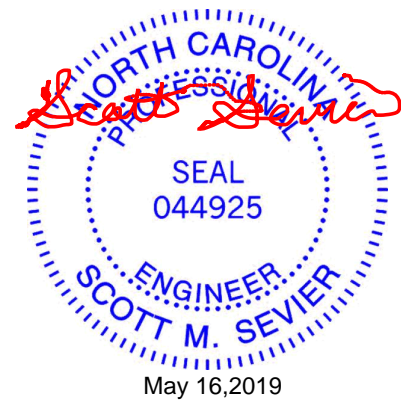
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.59	Vert(LL)	-0.44	10-12	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.80	Vert(CT)	-0.65	10-12	>785		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.70	Horz(CT)	0.08	9	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.28	12-15	>999		
								Weight: 268 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1	2-0-0 oc purlins (5-1-14 max.): 5-6.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.

**REACTIONS.** (lb/size) 2=1749/0-5-8, 9=1706/Mechanical  
 Max Horz 2=278(LC 9)  
 Max Uplift 2=450(LC 12), 9=423(LC 13)  
 Max Grav 2=1797(LC 2), 9=1766(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3049/1014, 3-5=-2734/951, 5-6=-1857/840, 6-8=-2714/955, 8-9=-3019/992  
 BOT CHORD 2-12=-752/2735, 10-12=-332/1845, 9-10=-723/2572  
 WEBS 3-12=-749/576, 5-12=-264/1138, 6-10=-273/1100, 8-10=-691/561

- NOTES-** (10)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 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) except (it=lb) 2=450, 9=423.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

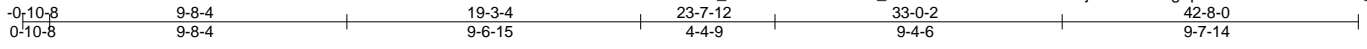


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107370
681099_Master_130	A05	PIGGYBACK BASE	10	1		

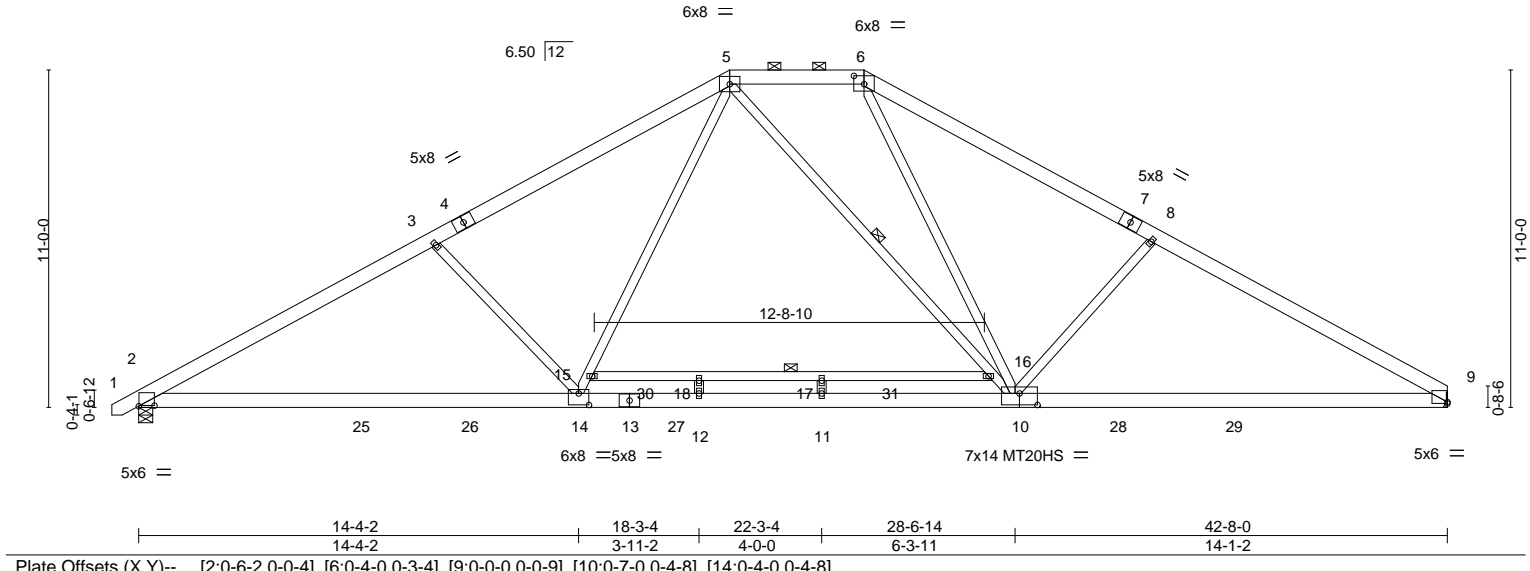
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:54 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-?z5LYQYOYAzjZR9D9DkdkgTpBSSG4bBsVBav3bzG\_qV



Scale = 1:75.1



LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP	
TCLL 20.0	Plate Grip DOL	1.15	TC 0.51	Vert(LL)	-0.50	11-12	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.97	Vert(CT)	-0.90	11-12	>570	240	MT20HS	187/143
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.80	Horz(CT)	0.08	9	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.15	14-21	>999	240		
									Weight: 309 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP DSS *Except*	2-0-0 oc purlins (4-11-15 max.): 5-6.
9-10: 2x6 SP No.1	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3 *Except*	WEBS 1 Row at midpt 5-10, 15-16
5-10,15-16: 2x4 SP No.2	

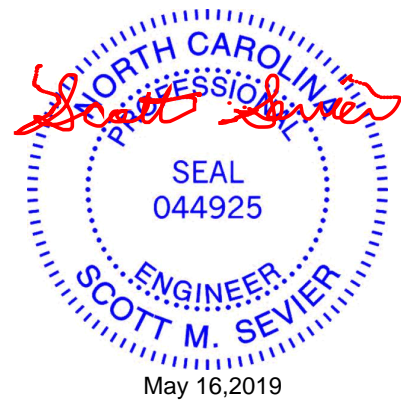
**REACTIONS.** (lb/size) 2=1856/0-5-8, 9=1800/Mechanical  
 Max Horz 2=278(LC 9)  
 Max Uplift 2=-343(LC 12), 9=-330(LC 13)  
 Max Grav 2=1868(LC 2), 9=1814(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3209/771, 3-5=-2898/705, 5-6=-1987/700, 6-8=-2815/748, 8-9=-3119/787  
 BOT CHORD 2-14=-542/2864, 12-14=-171/2004, 11-12=-171/2004, 10-11=-171/2004, 9-10=-548/2659  
 WEBS 3-14=-729/537, 14-15=-109/1191, 5-15=-100/1242, 5-16=-309/243, 10-16=-365/219,  
 6-10=-112/1113, 8-10=-682/524

- NOTES-** (13)
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) 200.0lb AC unit load placed on the bottom chord, 20-0-0 from left end, supported at two points, 5-0-0 apart.
  - 4) Provide adequate drainage to prevent water ponding.
  - 5) All plates are MT20 plates unless otherwise indicated.
  - 6) All plates are 2x4 MT20 unless otherwise indicated.
  - 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 8) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 9) Refer to girder(s) for truss to truss connections.
  - 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=343, 9=330.
  - 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.
  - 13) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

**LOAD CASE(S)** Standard

Continued on page 2



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	
681099_Master_130	A05	PIGGYBACK BASE	10	1		I37107370
						Job Reference (optional)

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:54 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-?z5LYQYOYAzIjZRD9DkdkgTpBSSG4bBsVBav3bzG\_qV

**LOAD CASE(S)** Standard

- 1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (plf)
  - Vert: 1-5=-60, 5-6=-60, 6-9=-60, 19-22=-20
- Concentrated Loads (lb)
  - Vert: 11=-100 27=-100

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



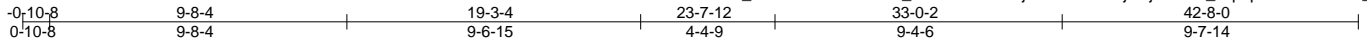
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107371
681099_Master_130	A06	PIGGYBACK BASE	5	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:55 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-TAejmmY0JU5cKj0QjxFSht0\_xspvp2P?krJSb1zG\_qU



Scale = 1:75.1

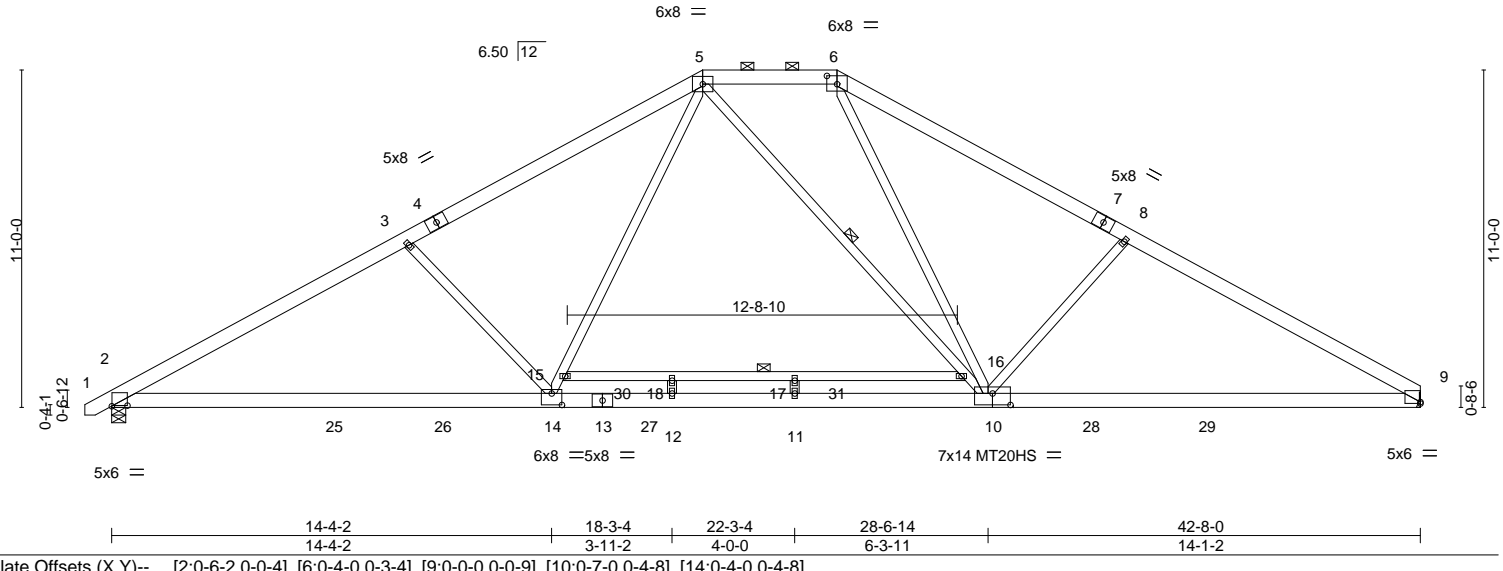


Plate Offsets (X,Y)--	[2:0-6-2,0-0-4], [6:0-4-0,0-3-4], [9:0-0-0,0-0-9], [10:0-7-0,0-4-8], [14:0-4-0,0-4-8]
-----------------------	---

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.51	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.94	Vert(LL) -0.46 11-12 >999 360	MT20HS	187/143
BCLL 0.0 *	Lumber DOL 1.15	WB 0.80	Vert(CT) -0.86 11-12 >598 240		
BCDL 10.0	Rep Stress Incr NO	Matrix-AS	Horz(CT) 0.08 9 n/a n/a		
	Code IRC2015/TPI2014		Wind(LL) 0.15 14-21 >999 240	Weight: 309 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP DSS *Except*	2-0-0 oc purlins (4-11-15 max.): 5-6.
9-10: 2x6 SP No.1	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3 *Except*	WEBS 1 Row at midpt 5-10, 15-16
5-10,15-16: 2x4 SP No.2	

**REACTIONS.** (lb/size) 2=1856/0-5-8, 9=1800/Mechanical  
 Max Horz 2=278(LC 9)  
 Max Uplift 2=-343(LC 12), 9=-330(LC 13)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3178/771, 3-5=-2867/705, 5-6=-1987/700, 6-8=-2779/748, 8-9=-3084/787  
 BOT CHORD 2-14=-542/2837, 12-14=-171/1978, 11-12=-171/1978, 10-11=-171/1978, 9-10=-548/2629  
 WEBS 3-14=-729/537, 14-15=-109/1181, 5-15=-100/1228, 5-16=-309/243, 10-16=-365/219,  
 6-10=-112/1089, 8-10=-682/524

- NOTES-** (13)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 200.0lb AC unit load placed on the bottom chord, 20-0-0 from left end, supported at two points, 5-0-0 apart.
  - Provide adequate drainage to prevent water ponding.
  - All plates are MT20 plates unless otherwise indicated.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 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) except (jt=lb) 2=343, 9=330.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

**LOAD CASE(S)** Standard



May 16, 2019

Continued on page 2

<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.</b></p> <p>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 <b>ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information</b> available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.</p>	<p>818 Soundside Road Edenton, NC 27932</p>
---	---

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	
681099_Master_130	A06	PIGGYBACK BASE	5	1		I37107371
						Job Reference (optional)

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:55 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-TAejmmY0JU5cKj0QjxFsHt0\_xspvp2P?krJSb1zG\_qU

**LOAD CASE(S)** Standard

- 1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (plf)
  - Vert: 1-5=-60, 5-6=-60, 6-9=-60, 19-22=-20
- Concentrated Loads (lb)
  - Vert: 11=-100 27=-100

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107372
681099_Master_130	A07	PIGGYBACK BASE	15	1		

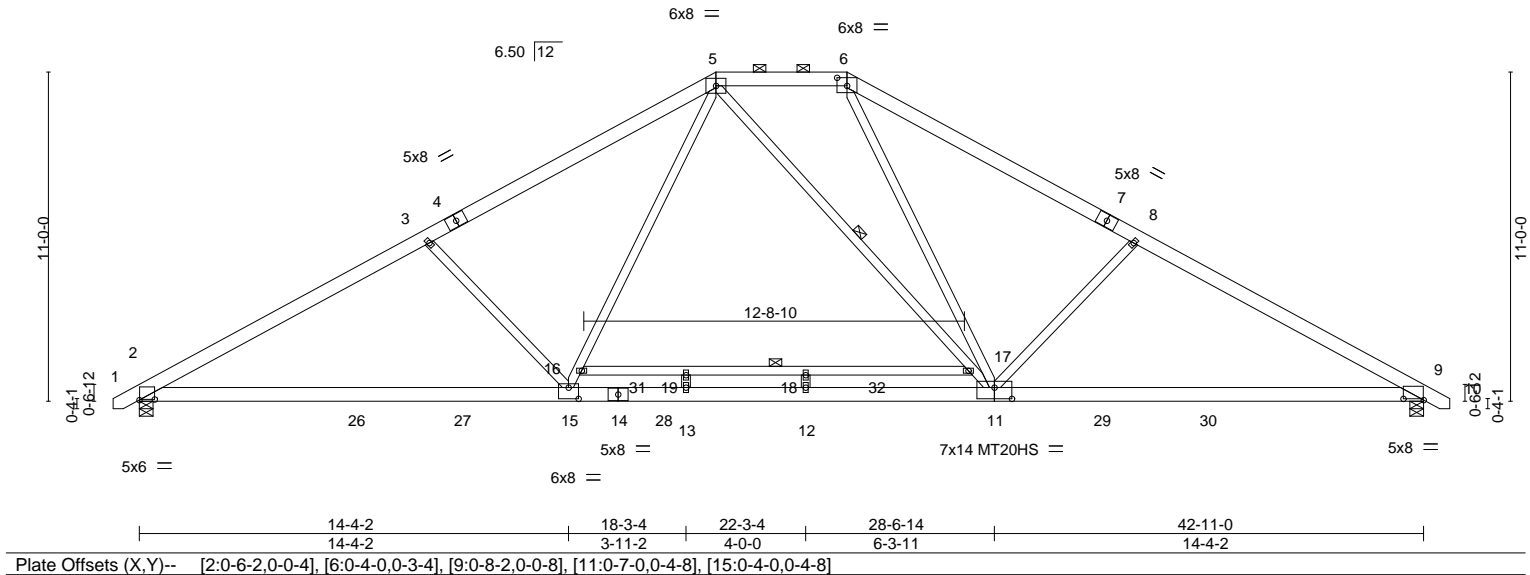
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:56 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-xMC5z6Ze4nDTytbcGem5p5Z9fGDwYVM9zV307TzG\_qT

0-10-8	9-8-4	19-3-4	23-7-12	33-2-12	42-11-0	43-9-8
0-10-8	9-8-4	9-6-15	4-4-9	9-6-15	9-8-4	0-10-8

Scale = 1:77.0



<b>LOADING</b> (psf)	<b>SPACING</b>	2-0-0	<b>CSI</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.52	Vert(LL)	-0.48 12-13	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.64	Vert(CT)	-0.85 12-13	>604	240	MT20HS	187/143
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.82	Horz(CT)	0.08 9	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.16 15-22	>999	240		Weight: 313 lb FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP DSS	2-0-0 oc purlins (4-11-6 max.): 5-6.
WEBS 2x4 SP No.3 *Except*	BOT CHORD Rigid ceiling directly applied.
5-11,16-17: 2x4 SP No.2	WEBS 1 Row at midpt 5-11, 16-17

**REACTIONS.** (lb/size) 2=1866/0-5-8, 9=1852/0-5-8  
 Max Horz 2=-279(LC 10)  
 Max Uplift 2=-344(LC 12), 9=-358(LC 13)  
 Max Grav 2=1876(LC 2), 9=1852(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3222/776, 3-5=-2911/711, 5-6=-2025/706, 6-8=-2854/746, 8-9=-3165/811  
 BOT CHORD 2-15=-523/2882, 13-15=-154/2013, 12-13=-154/2013, 11-12=-154/2013, 9-11=-553/2735  
 WEBS 3-15=-730/536, 15-16=-116/1185, 5-16=-103/1228, 5-17=-291/266, 11-17=-328/236,  
 6-11=-103/1135, 8-11=-727/536

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 200.0lb AC unit load placed on the bottom chord, 20-0-0 from left end, supported at two points, 5-0-0 apart.
  - Provide adequate drainage to prevent water ponding.
  - All plates are MT20 plates unless otherwise indicated.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=344, 9=358.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

**LOAD CASE(S)** Standard  
 1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15



May 16, 2019

Continued on page 2

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**TRENCO**  
 ENGINEERING BY  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	I37107372
681099_Master_130	A07	PIGGYBACK BASE	15	1	Job Reference (optional)	

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:57 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-PYmTBSaGr5LKa0AoqLHKMI5KPfZ9HxclB9oZgvzG\_qS

**LOAD CASE(S)** Standard

Uniform Loads (plf)

Vert: 1-5=-60, 5-6=-60, 6-10=-60, 20-23=-20

Concentrated Loads (lb)

Vert: 12=-100 28=-100

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107373
681099_Master_130	A08	GABLE	4	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:38:58 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lIa6zQrSu-tkKrOobucPTBBak?O3oZuWeWu3pHOQeRQpY6CMzG\_qR

0-10-8	9-8-4	19-3-4	23-7-12	33-2-12	42-11-0	43-9-8
0-10-8	9-8-4	9-6-15	4-4-9	9-6-15	9-8-4	0-10-8

Scale = 1:77.7

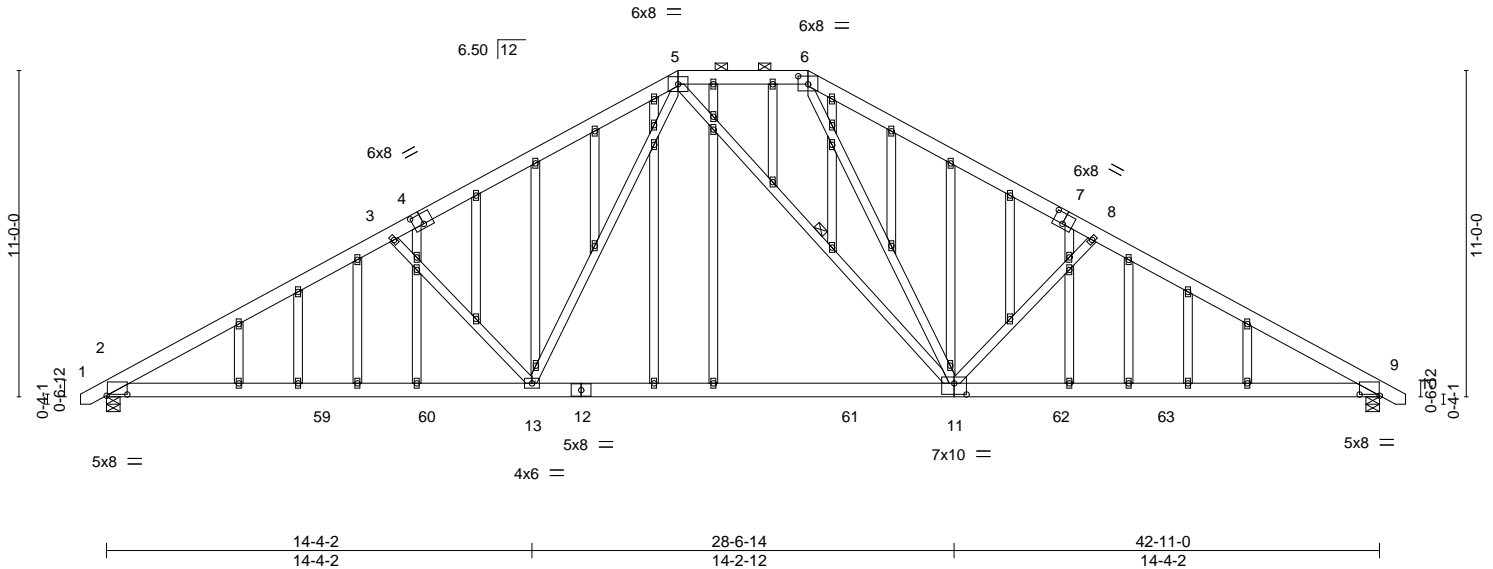


Plate Offsets (X,Y)--	[2:0-8-6,0-0-8], [4:0-4-0,0-4-4], [4:0-0-0,0-2-12], [6:0-4-0,0-3-4], [7:0-0-0,0-2-12], [7:0-4-0,0-4-4], [9:0-8-2,0-0-8], [11:0-5-0,0-4-8], [26:0-2-0,0-0-0], [44:0-2-0,0-0-0]
-----------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.47	Vert(LL)	-0.40 11-13	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.97	Vert(CT)	-0.61 11-13	>845	240		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.70	Horz(CT)	0.09 9	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.17 13-55	>999	240	Weight: 425 lb	FT = 20%

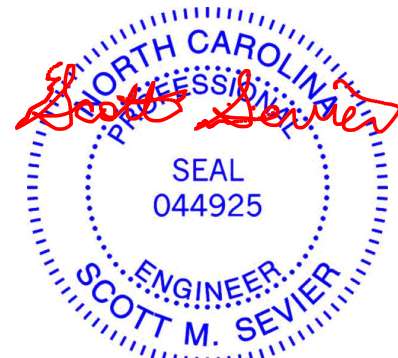
**LUMBER-**  
TOP CHORD 2x6 SP No.2  
BOT CHORD 2x6 SP No.1 \*Except\*  
11-12: 2x6 SP No.2  
WEBS 2x4 SP No.3 \*Except\*  
5-11: 2x4 SP No.2  
OTHERS 2x4 SP No.3

**BRACING-**  
TOP CHORD Structural wood sheathing directly applied, except  
2-0-0 oc purlins (5-1-11 max.): 5-6.  
BOT CHORD Rigid ceiling directly applied.  
WEBS 1 Row at midpt 5-11

**REACTIONS.** (lb/size) 2=1759/0-5-8, 9=1759/0-5-8  
Max Horz 2=-279(LC 10)  
Max Uplift 2=-451(LC 12), 9=-451(LC 13)  
Max Grav 2=1785(LC 2), 9=1773(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
TOP CHORD 2-3=-3022/1020, 3-5=-2708/957, 5-6=-1883/847, 6-8=-2678/958, 8-9=-2992/1020  
BOT CHORD 2-13=-733/2711, 11-13=-314/1830, 9-11=-734/2587  
WEBS 3-13=-747/526, 5-13=-248/1108, 5-11=-271/285, 6-11=-211/998, 8-11=-742/527

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=451, 9=451.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107374
681099_Master_130	A09	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:00 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-q7ScpUc980jvRUuNVUq1zxjyBijqUSuku71DGEzG\_qp

-0-10-8	16-10-2	26-0-14	42-11-0	43-9-8
0-10-8	16-10-2	9-2-12	16-10-2	0-10-8

Scale = 1:77.8

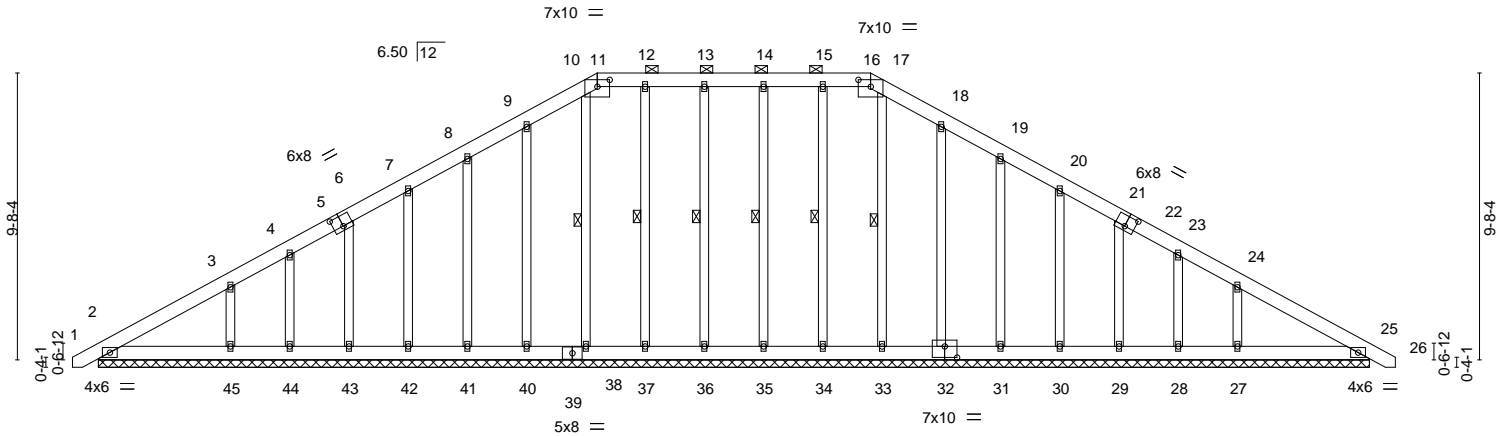


Plate Offsets (X,Y)--	[5:0-0-0,0-2-12], [5:0-4-0,0-4-4], [6:0-2-0,0-0-0], [10:0-1-12,0-0-15], [11:0-5-0,0-2-13], [11:0-0-0,0-2-12], [16:0-0-0,0-2-12], [16:0-5-0,0-2-13], [17:0-1-12,0-0-15], [21:0-2-0,0-0-0], [22:0-0-0,0-2-12], [22:0-4-0,0-4-4], [32:0-5-0,0-4-8]
-----------------------	---

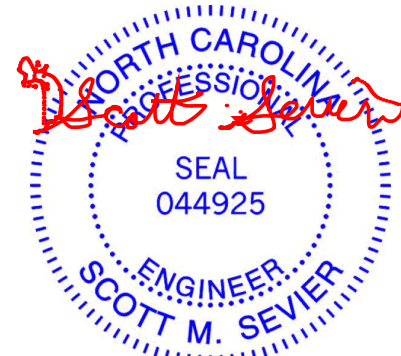
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP	
TCLL 20.0	Plate Grip DOL	1.15	TC 0.10	Vert(LL)	0.00	26	n/r	120	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.06	Vert(CT)	0.00	26	n/r	120		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.17	Horz(CT)	0.01	25	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S							
								Weight: 380 lb	FT = 20%	

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except 2-0-0 oc purlins (6-0-0 max.): 11-16.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 13-36, 12-37, 10-38, 14-35, 15-34, 17-33

**REACTIONS.** All bearings 42-11-0.  
 (lb) - Max Horz 2=-245(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 36, 37, 38, 40, 41, 42, 43, 44, 35, 34, 32, 31, 30, 29, 28 except 45=-194(LC 12), 27=-193(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 36, 37, 38, 40, 41, 42, 43, 44, 35, 34, 33, 32, 31, 30, 29, 28, 25 except 45=356(LC 19), 27=355(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-262/192, 8-9=-210/267, 9-10=-261/304, 10-11=-245/289, 11-12=-251/301, 12-13=-251/301, 13-14=-251/301, 14-15=-251/301, 15-16=-251/301, 16-17=-245/289, 17-18=-261/304  
 WEBS 3-45=-309/225, 24-27=-309/224

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 36, 37, 38, 40, 41, 42, 43, 44, 35, 34, 32, 31, 30, 29, 28 except (jt=lb) 45=194, 27=193.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107375
681099_Master_130	A10	HIP	2	1		

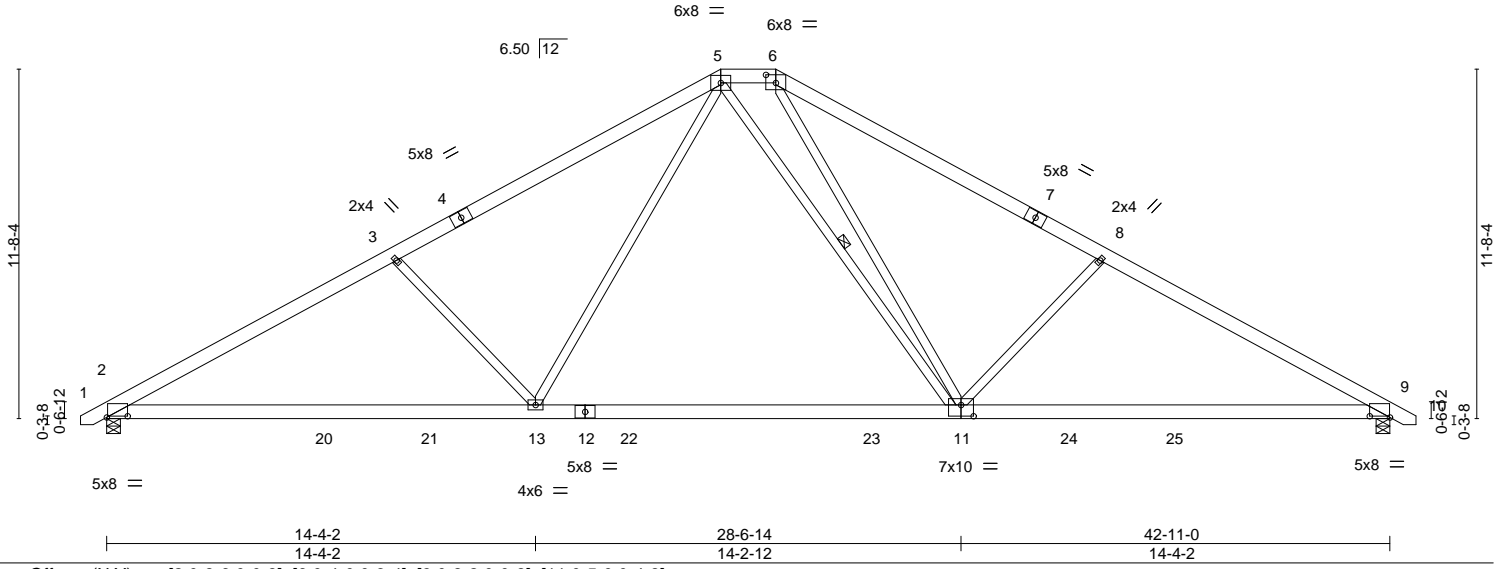
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:01 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-IJ0\_OpdnvKrm2eTZ3BMGW8G?8Hr\_Dlhu6nmphzG\_qO

0-10-8	9-8-4	20-6-7	22-4-9	33-2-12	42-11-0	43-9-8
0-10-8	9-8-4	10-10-3	1-10-1	10-10-3	9-8-4	0-10-8

Scale = 1:77.1



LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.53	Vert(LL)	-0.41 11-13	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.97	Vert(CT)	-0.62 11-13	>826	240		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.81	Horz(CT)	0.09 9	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.16 13-16	>999	240	Weight: 296 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1 *Except* 11-12: 2x6 SP No.2	2-0-0 oc purlins (4-9-3 max.): 5-6.
WEBS 2x4 SP No.2 *Except* 3-13,8-11: 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.
	WEBS 1 Row at midpt 5-11

**REACTIONS.** (lb/size) 2=1756/0-5-8, 9=1756/0-5-8  
 Max Horz 2=-296(LC 10)  
 Max Uplift 2=-461(LC 12), 9=-461(LC 13)  
 Max Grav 2=1787(LC 19), 9=1782(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3026/1020, 3-5=-2704/957, 5-6=-1897/842, 6-8=-2689/957, 8-9=-3009/1020  
 BOT CHORD 2-13=-782/2788, 11-13=-270/1784, 9-11=-739/2604  
 WEBS 3-13=-790/560, 5-11=-334/416, 5-13=-283/1162, 6-11=-260/1069, 8-11=-778/560

- NOTES-** (9)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=461, 9=461.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932

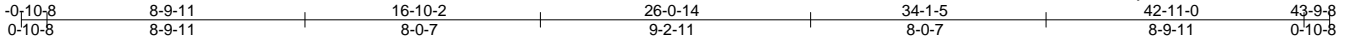


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107376
681099_Master_130	A11	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:03 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-Ei7kRVf1Qx6UlxdyBcOlbZLM34WrhivAa4FtZzG\_qM



Scale = 1:78.7

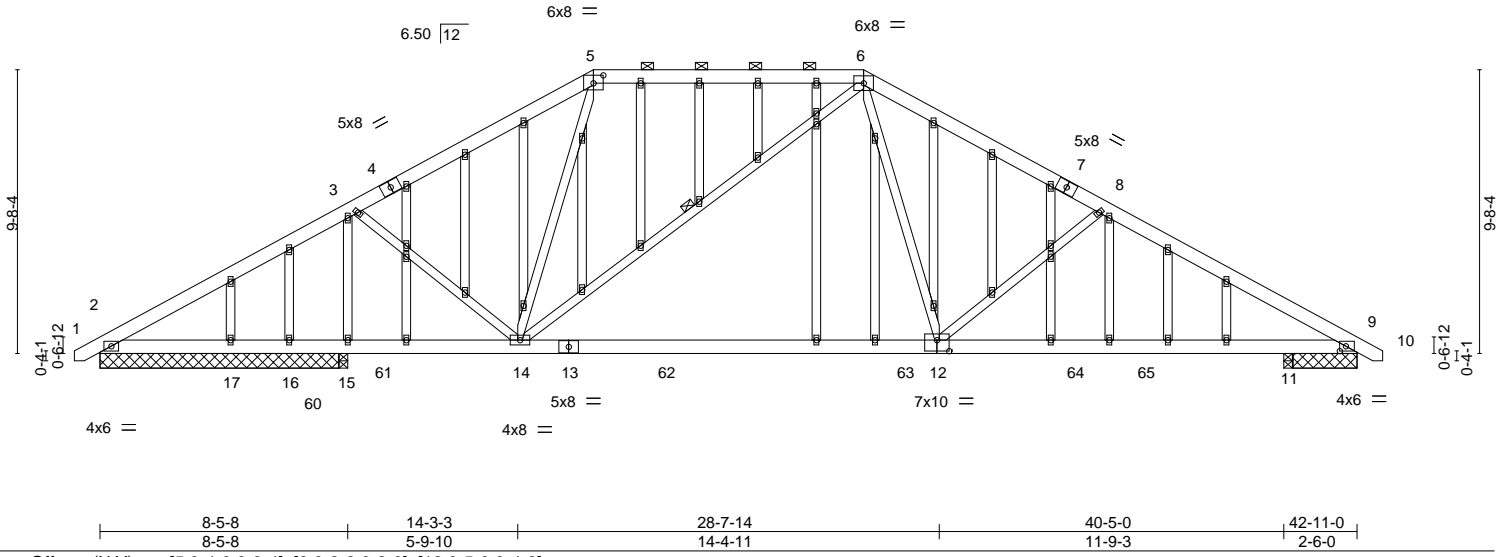


Plate Offsets (X,Y)--	[5:0-4-0,0-3-4], [9:0-2-8,0-2-0], [12:0-5-0,0-4-8]
-----------------------	--

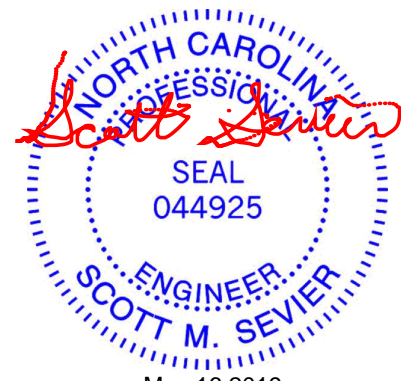
LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.50	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 1.00	Vert(LL) -0.42 12-14 >920 360		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.60	Vert(CT) -0.75 12-14 >516 240		
BCDL 10.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.09 9 n/a n/a		
	Code IRC2015/TPI2014		Wind(LL) 0.15 12-14 >999 240	Weight: 416 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.2	2-0-0 oc purlins (4-8-2 max.): 5-6.
WEBS 2x4 SP No.3 *Except*	BOT CHORD Rigid ceiling directly applied.
6-14: 2x4 SP No.2	WEBS 1 Row at midpt 6-14
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 8-1-12 except (jt=length) 9=2-2-4, 15=0-3-8, 11=0-3-8.  
 (lb) - Max Horz 2=245(LC 11)  
 Max Uplift All uplift 100 lb or less at joint(s) 15, 11 except 2=404(LC 12), 9=387(LC 13), 16=250(LC 1), 17=118(LC 12)  
 Max Grav All reactions 250 lb or less at joint(s) 16 except 2=1471(LC 1), 9=1286(LC 1), 17=304(LC 1), 15=252(LC 1), 11=531(LC 3), 2=1471(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2656/1026, 3-5=-2311/918, 5-6=-1779/868, 6-8=-2417/918, 8-9=-2735/1023  
 BOT CHORD 2-17=-745/2235, 16-17=-745/2235, 15-16=-745/2235, 14-15=-745/2235, 12-14=-403/1846,  
 11-12=-741/2311, 9-11=-741/2311  
 WEBS 3-14=-590/467, 5-14=-93/665, 6-14=-255/175, 6-12=-126/814, 8-12=-566/461

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 15, 11 except (jt=lb) 2=404, 9=387, 16=250, 17=118, 2=404.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**TRENCO** ENGINEERING BY A MiTek Affiliate  
 818 Soundside Road Edenton, NC 27932

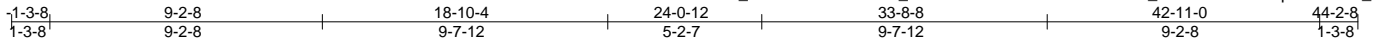


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107377
681099_Master_130	A20	PIGGYBACK BASE	22	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:04 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lIa6zQrSu-uh7frffBFELv5C8kKv\_8nuV9UvdQ8DKpk?RP?zG\_qL



Scale = 1:77.9

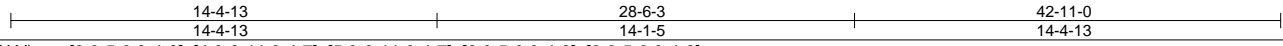
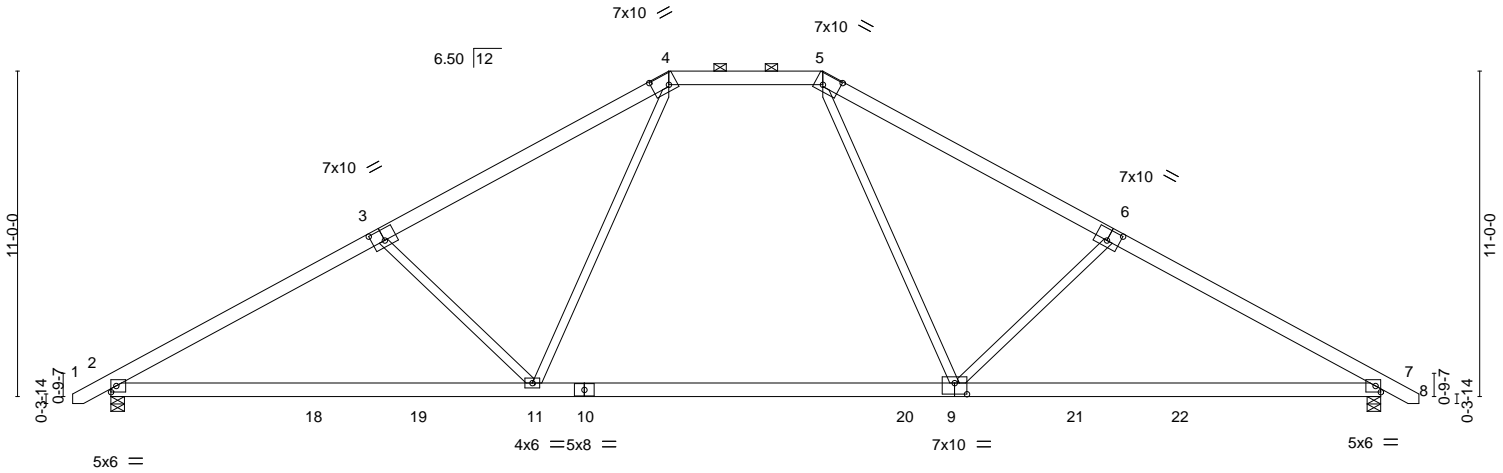


Plate Offsets (X,Y)--	[3:0-5-0,0-4-8], [4:0-6-11,0-4-7], [5:0-6-11,0-4-7], [6:0-5-0,0-4-8], [9:0-5-0,0-4-8]
-----------------------	---

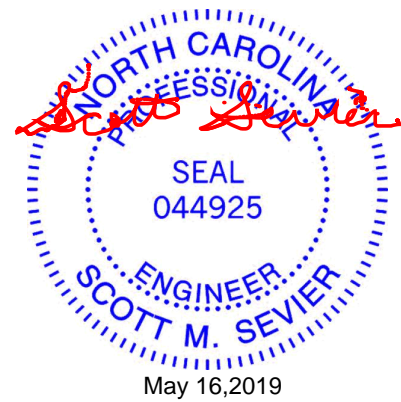
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.61	Vert(LL)	-0.44	9-11	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.78	Vert(CT)	-0.65	9-11	>796		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.70	Horz(CT)	0.08	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.28	11-14	>999	Weight: 274 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1	2-0-0 oc purlins (5-2-3 max.): 4-5.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.

**REACTIONS.** (lb/size) 2=1783/0-5-8, 7=1783/0-5-8  
 Max Horz 2=-279(LC 10)  
 Max Uplift 2=-459(LC 12), 7=-459(LC 13)  
 Max Grav 2=1826(LC 2), 7=1825(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2987/999, 3-4=-2654/927, 4-5=-1855/842, 5-6=-2645/923, 6-7=-2983/1000  
 BOT CHORD 2-11=-714/2632, 9-11=-313/1855, 7-9=-708/2534  
 WEBS 3-11=-688/567, 4-11=-225/1022, 5-9=-221/1017, 6-9=-692/568

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=459, 7=459.
  - 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.

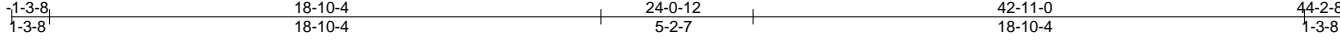


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107378
681099_Master_130	A21	GABLE	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:06 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-eHpt4XhwjsU29PMXskxSDBzz?InruAkdG2UYUuzG\_qJ



Scale = 1:78.8

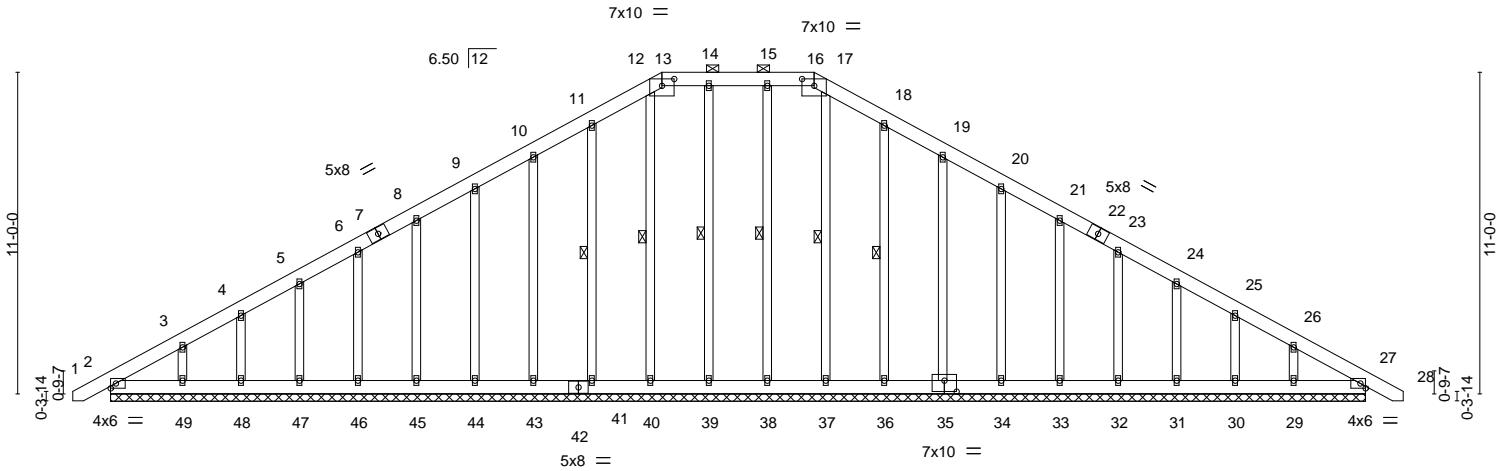


Plate Offsets (X,Y)--	[12:0-1-12,0-0-15], [13:0-5-0,0-2-13], [13:0-0-0,0-2-12], [16:0-5-0,0-2-13], [16:0-0-0,0-2-12], [17:0-1-12,0-0-15], [35:0-5-0,0-4-8]
-----------------------	--

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.08	Vert(LL)	-0.00	27	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.03	Vert(CT)	-0.00	27	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.18	Horz(CT)	0.01	27	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 399 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except 2-0-0 oc purlins (6-0-0 max.): 13-16.
BOT CHORD 2x6 SP No.1	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 14-39, 12-40, 11-41, 15-38, 17-37, 18-36

**REACTIONS.** All bearings 42-11-0.  
 (lb) - Max Horz 2=-279(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 27, 39, 40, 41, 43, 44, 45, 46, 47, 48, 38, 36, 35, 34, 33, 32, 31, 30 except 49=-136(LC 12), 29=-127(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 27, 39, 40, 41, 43, 44, 45, 46, 47, 48, 49, 38, 37, 36, 35, 34, 33, 32, 31, 30, 29

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-337/211, 9-10=-193/265, 10-11=-247/303, 11-12=-296/345, 12-13=-276/325, 13-14=-283/337, 14-15=-283/337, 15-16=-283/337, 16-17=-276/325, 17-18=-297/345, 18-19=-246/287

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 27, 39, 40, 41, 43, 44, 45, 46, 47, 48, 38, 36, 35, 34, 33, 32, 31, 30 except (jt=lb) 49=136, 29=127.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107379
681099_Master_130	A22	PIGGYBACK BASE	6	1		

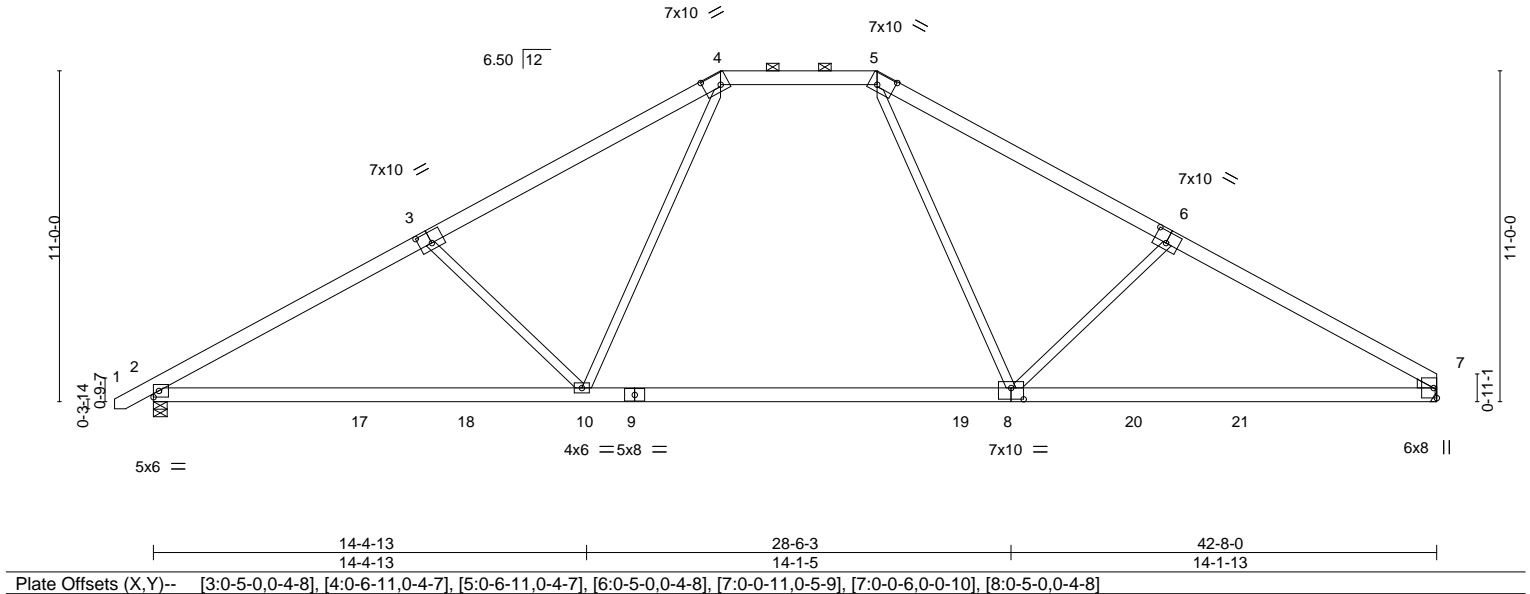
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:07 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-6TNFHtiYUAcvmZwjQSShmPW?ghxHdVymViD50KzG\_ql

1-3-8	9-2-8	18-10-4	24-0-12	33-8-8	42-8-0
1-3-8	9-2-8	9-7-12	5-2-7	9-7-12	8-11-8

Scale = 1:76.6



LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.66	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.78	Vert(LL) -0.44 8-10 >999 360		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.70	Vert(CT) -0.66 8-10 >773 240		
BCDL 10.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.09 7 n/a n/a		
	Code IRC2015/TPI2014		Wind(LL) 0.29 10-13 >999 240	Weight: 270 lb	FT = 20%

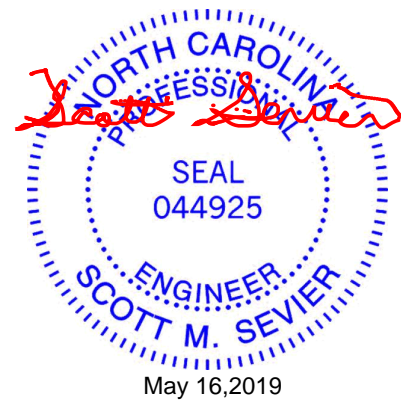
**LUMBER-**  
 TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x6 SP No.1  
 WEBS 2x4 SP No.3  
 WEDGE  
 Right: 2x4 SP No.3

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

**REACTIONS.** (lb/size) 2=1774/0-5-8, 7=1706/Mechanical  
 Max Horz 2=278(LC 9)  
 Max Uplift 2=-458(LC 12), 7=-418(LC 13)  
 Max Grav 2=1817(LC 2), 7=1762(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2969/994, 3-4=-2635/922, 4-5=-1834/838, 5-6=-2595/910, 6-7=-2908/981  
 BOT CHORD 2-10=-736/2607, 8-10=-340/1834, 7-8=-717/2466  
 WEBS 3-10=-692/568, 4-10=-225/1027, 5-8=-210/970, 6-8=-647/555

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) Provide adequate drainage to prevent water ponding.
  - 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 5) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 6) Refer to girder(s) for truss to truss connections.
  - 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=458, 7=418.
  - 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.
  - 9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

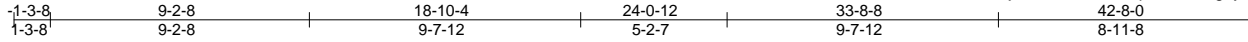


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107380
681099_Master_130	A23	PIGGYBACK BASE	9	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:09 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-3sV0iZjoOnd0t46XtV9rbLuVid5Pg3y0iC5DzG\_qG



7x10 =

Scale = 1:81.9

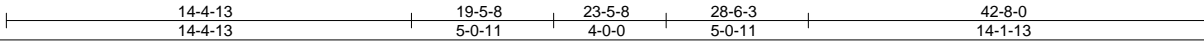
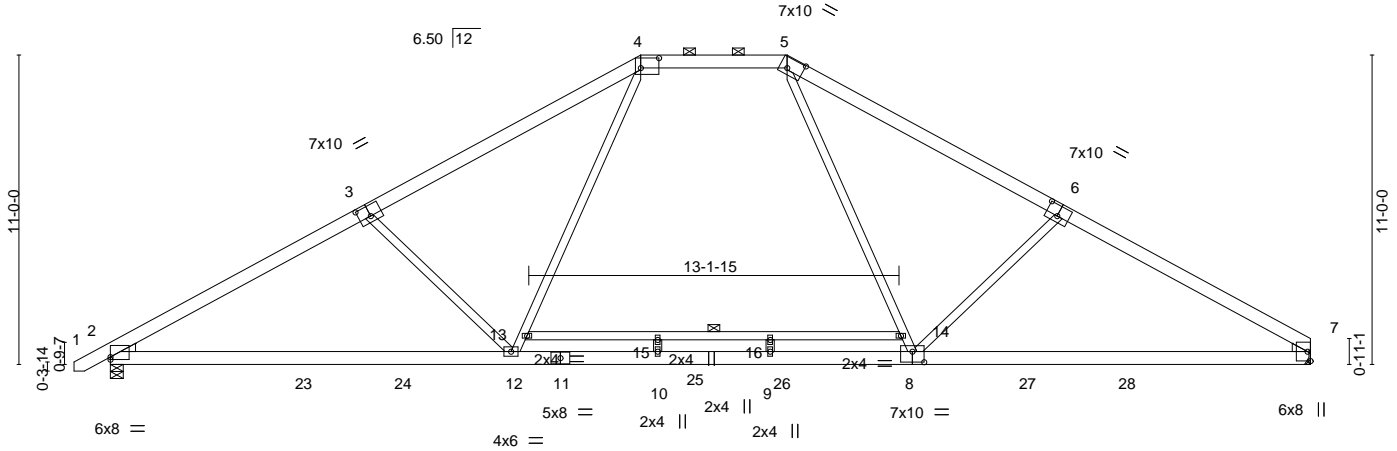


Plate Offsets (X, Y)--	[2:0-0-0,0-1-1], [3:0-5-0,0-4-8], [4:0-7-12,0-4-4], [5:0-6-11,0-4-7], [6:0-5-0,0-4-8], [7:0-0-11,0-5-9], [7:0-0-6,0-0-10], [8:0-5-0,0-4-8]
------------------------	--

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.67	Vert(LL)	-0.32	12-19	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.40	Vert(CT)	-0.54	9-10	>950		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.68	Horz(CT)	0.08	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.28	12-19	>999		
								Weight: 292 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP DSS	2-0-0 oc purlins (4-11-10 max.): 4-5.
WEBS 2x4 SP No.3 *Except*	BOT CHORD Rigid ceiling directly applied.
13-14: 2x4 SP No.2	WEBS 1 Row at midpt 13-14

WEDGE  
Left: 2x4 SP No.3, Right: 2x4 SP No.3

**REACTIONS.** (lb/size) 2=1874/0-5-8, 7=1806/Mechanical  
Max Horz 2=278(LC 9)  
Max Uplift 2=-358(LC 12), 7=-318(LC 13)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
TOP CHORD 2-3=-3053/776, 3-4=-2654/699, 4-5=-1983/686, 5-6=-2613/691, 6-7=-2989/768  
BOT CHORD 2-12=-549/2575, 10-12=-185/1884, 9-10=-185/1884, 8-9=-185/1884, 7-8=-537/2517  
WEBS 3-12=-677/582, 12-13=-120/944, 4-13=-106/970, 5-14=-98/904, 8-14=-105/877,  
6-8=-629/574

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 200.0lb AC unit load placed on the bottom chord, 21-4-0 from left end, supported at two points, 5-0-0 apart.
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 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) except (jt=lb) 2=358, 7=318.
  - 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.



May 16, 2019

<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.</b></p> <p>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 <b>ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information</b> available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.</p>	<p>ENGINEERING BY</p> <p><b>TRENCO</b></p> <p>A MiTek Affiliate</p> <p>818 Soundside Road Edenton, NC 27932</p>
---	---

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107381
681099_Master_130	A24	PIGGYBACK BASE	9	1		

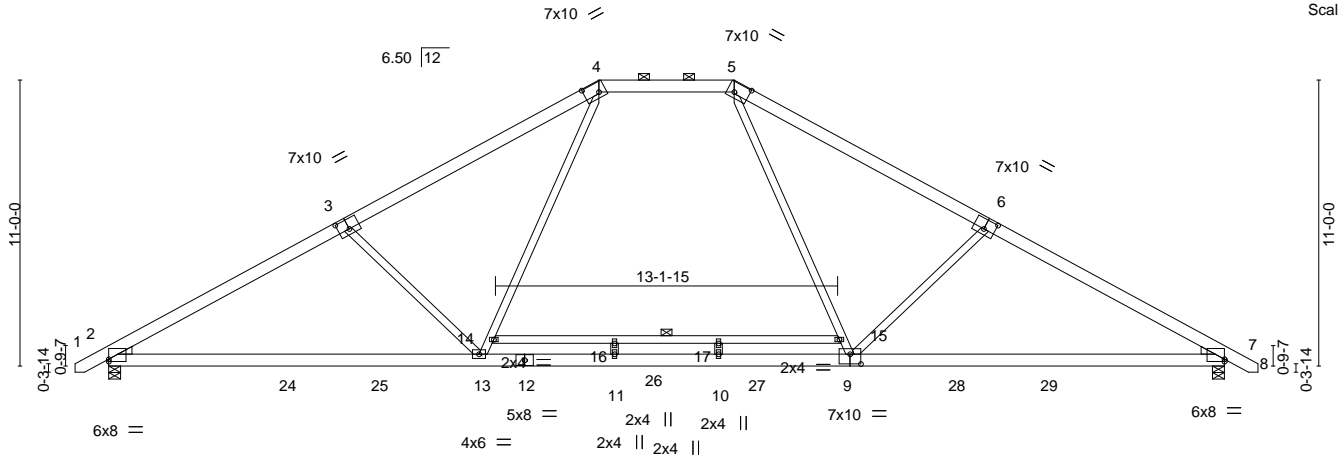
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:10 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-X22OvukQn5\_Ud0f15a0ON18Wuv2qqsyCBgSldfzG\_qF

1-3-8	9-2-8	18-10-4	24-0-12	33-8-8	42-11-0	44-2-8
1-3-8	9-2-8	9-7-12	5-2-7	9-7-12	9-2-8	1-3-8

Scale = 1:88.6



14-4-13	19-5-8	23-5-8	28-6-3	42-11-0
14-4-13	5-0-11	4-0-0	5-0-11	14-4-13

Plate Offsets (X,Y)-- [2:0-0-0,0-1-1], [3:0-5-0,0-4-8], [4:0-6-11,0-4-7], [5:0-6-11,0-4-7], [6:0-5-0,0-4-8], [7:Edge,0-1-1], [9:0-5-0,0-4-8]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.66	Vert(LL)	-0.32	9-23	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.41	Vert(CT)	-0.52	10-11	>981		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.68	Horz(CT)	0.07	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.28	13-20	>999	Weight: 297 lb	FT = 20%

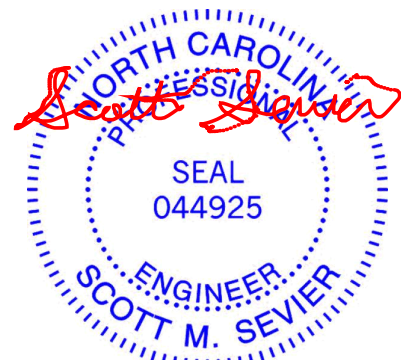
LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP DSS	2-0-0 oc purlins (4-11-12 max.): 4-5.
WEBS 2x4 SP No.3 *Except*	BOT CHORD Rigid ceiling directly applied.
14-15: 2x4 SP No.2	WEBS 1 Row at midpt 14-15
WEDGE	
Left: 2x4 SP No.3, Right: 2x4 SP No.3	

**REACTIONS.** (lb/size) 2=1884/0-5-8, 7=1883/0-5-8  
 Max Horz 2=-279(LC 10)  
 Max Uplift 2=-359(LC 12), 7=-360(LC 13)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-3071/780, 3-4=-2673/703, 4-5=-2003/689, 5-6=-2664/702, 6-7=-3067/783  
 BOT CHORD 2-13=-524/2591, 11-13=-157/1906, 10-11=-157/1906, 9-10=-157/1906, 7-9=-524/2587  
 WEBS 3-13=-673/582, 13-14=-120/937, 4-14=-106/965, 5-15=-105/957, 9-15=-112/930,  
 6-9=-676/584

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- 200.0lb AC unit load placed on the bottom chord, 21-4-0 from left end, supported at two points, 5-0-0 apart.
- 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.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=359, 7=360.
- 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.



May 16, 2019

<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.</b></p> <p>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 <b>ANSI/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information</b> available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.</p>	<p>ENGINEERING BY</p> <p><b>TRENCO</b></p> <p>A MiTek Affiliate</p> <p>818 Soundside Road Edenton, NC 27932</p>
--	---



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107382
681099_Master_130	A25	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:12 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lIa6zQrSu-TRABKamgJIECtKphC?2sTSD?i95luxVe\_xsiYzG\_qD

1-3-8	16-10-4	26-0-12	42-11-0	44-2-8
1-3-8	16-10-4	9-2-7	16-10-4	1-3-8

Scale = 1:76.2

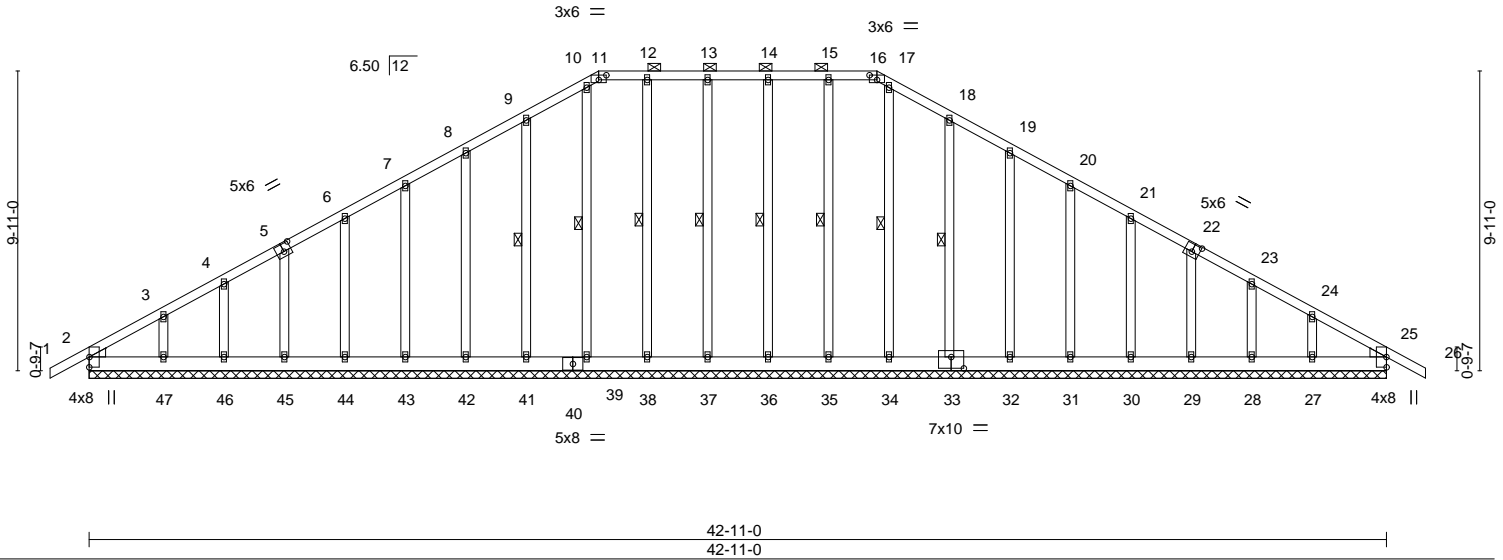


Plate Offsets (X, Y)--	[2:0-0-0,0-0-1], [2:0-0-1,0-4-6], [2:Edge,0-0-1], [5:0-3-0,0-3-0], [11:0-3-0,0-1-14], [16:0-3-0,0-1-14], [22:0-3-0,0-3-0], [25:0-0-1,0-4-6], [25:0-0-0,0-0-1], [25:Edge,0-0-1], [33:0-5-0,0-4-8]
------------------------	--

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP	
TCLL 20.0	Plate Grip DOL	1.15	TC 0.11	Vert(LL)	-0.00	26	n/r	120	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.04	Vert(CT)	-0.00	26	n/r	120		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.14	Horz(CT)	0.01	25	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S							
								Weight: 356 lb	FT = 20%	

**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x6 SP No.2  
 OTHERS 2x4 SP No.3  
 WEDGE  
 Left: 2x4 SP No.2, Right: 2x4 SP 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.): 11-16.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.  
 WEBS 1 Row at midpt 13-37, 12-38, 10-39, 9-41, 14-36, 15-35, 17-34, 18-33

**REACTIONS.** All bearings 42-11-0.  
 (lb) - Max Horz 2=-253(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 37, 38, 39, 41, 42, 43, 44, 45, 46, 36, 35, 32, 31, 30, 29, 28, 25 except 47=-145(LC 12), 33=-103(LC 13), 27=-136(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 37, 38, 39, 41, 42, 43, 44, 45, 46, 47, 36, 35, 34, 33, 32, 31, 30, 29, 28, 27, 25

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-326/182, 9-10=-235/274, 10-11=-220/259, 11-12=-224/270, 12-13=-224/270, 13-14=-224/270, 14-15=-224/270, 15-16=-224/270, 16-17=-220/260, 17-18=-235/274, 24-25=-252/180  
 BOT CHORD 2-47=-173/260, 46-47=-173/260, 45-46=-173/260, 44-45=-176/262, 43-44=-176/262, 42-43=-176/262, 41-42=-176/262, 39-41=-176/262, 38-39=-176/262, 37-38=-176/262, 36-37=-176/262, 35-36=-176/262, 34-35=-176/262, 33-34=-176/262, 32-33=-177/263, 31-32=-177/263, 30-31=-177/263, 29-30=-177/263, 28-29=-174/260, 27-28=-174/260, 25-27=-174/260

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 37, 38, 39, 41, 42, 43, 44, 45, 46, 36, 35, 32, 31, 30, 29, 28, 25 except (t=lb) 47=145, 33=103, 27=136.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

ENGINEERING BY  
**TRENCO**  
 A MiTek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	I37107382
681099_Master_130	A25	GABLE	1	1	Job Reference (optional)	

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:12 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-TRA8KamgJiECtKphC?2sTSD??iq5luxVe\_xsiYzG\_qD

**NOTES-**

11) Graphical purlin 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. 10/03/2015 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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107383
681099_Master_130	A26	HIP	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:13 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-xdkWYwmJ40M3VUOtmiZ5?gm366xO1DuftegPE\_zG\_qC

-1-3-8	10-5-1	20-6-9	22-4-7	32-5-15	42-11-0	44-2-8
1-3-8	10-5-1	10-1-9	1-9-14	10-1-9	10-5-1	1-3-8

Scale = 1:78.6

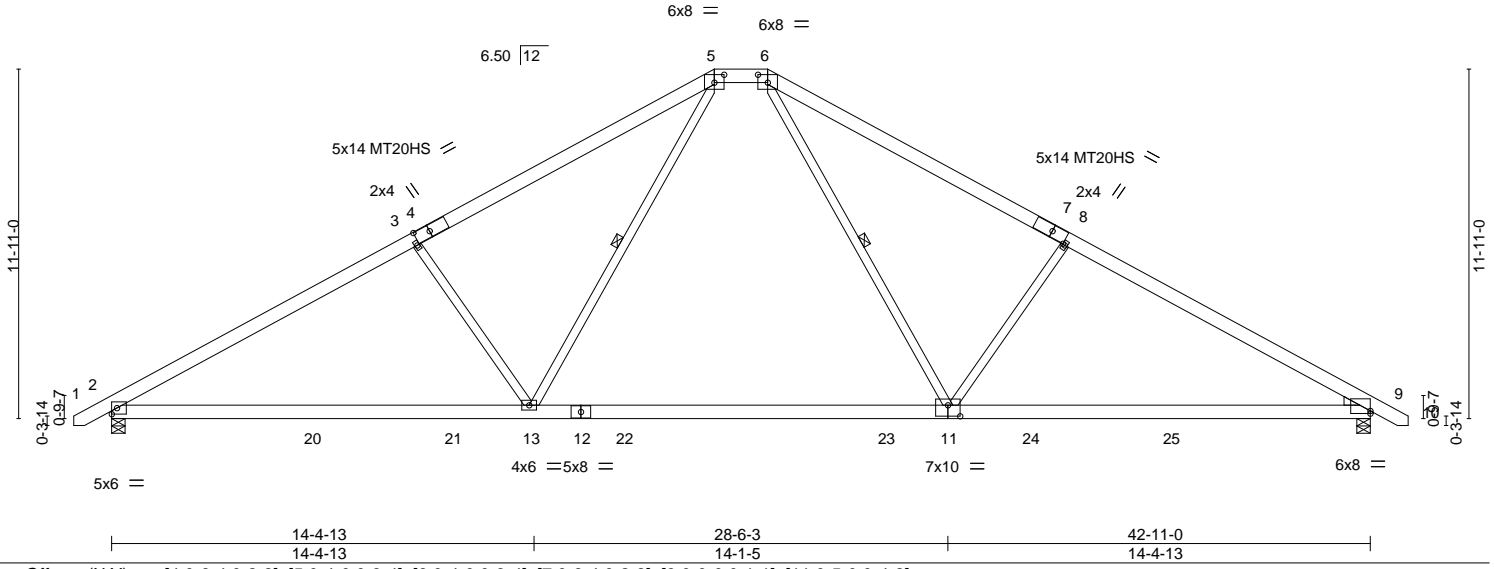


Plate Offsets (X, Y)--	[4:0-6-4,0-2-8], [5:0-4-0,0-3-4], [6:0-4-0,0-3-4], [7:0-6-4,0-2-8], [9:0-0-0,0-1-1], [11:0-5-0,0-4-8]
------------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.53	Vert(LL)	-0.41 11-13	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.99	Vert(CT)	-0.63 11-13	>817	240	MT20HS	187/143
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.67	Horz(CT)	0.08 9	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.15 13-16	>999	240		Weight: 279 lb FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1 *Except* 11-12: 2x6 SP No.2	2-0-0 oc purlins (5-0-1 max.): 5-6.
WEBS 2x4 SP No.3 *Except* 5-13,6-11: 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied.
	WEBS 1 Row at midpt 5-13, 6-11

WEDGE  
Right: 2x4 SP No.3

**REACTIONS.** (lb/size) 2=1783/0-5-8, 9=1783/0-5-8  
 Max Horz 2=-302(LC 10)  
 Max Uplift 2=-475(LC 12), 9=-475(LC 13)  
 Max Grav 2=1857(LC 19), 9=1857(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2991/959, 3-5=-2706/969, 5-6=-1832/823, 6-8=-2694/964, 8-9=-2986/961  
 BOT CHORD 2-13=-716/2704, 11-13=-248/1788, 9-11=-658/2529  
 WEBS 3-13=-720/566, 5-13=-339/1196, 6-11=-332/1189, 8-11=-722/567

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=475, 9=475.
  - 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.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

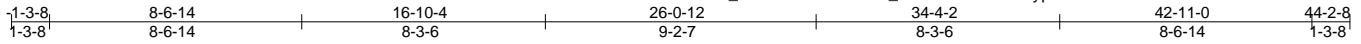
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107384
681099_Master_130	A27	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:16 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-MCQfAypBMxkeMx6SRr7odlObIK?xEZP5Zcv3rJzG\_q9



Scale = 1:78.3

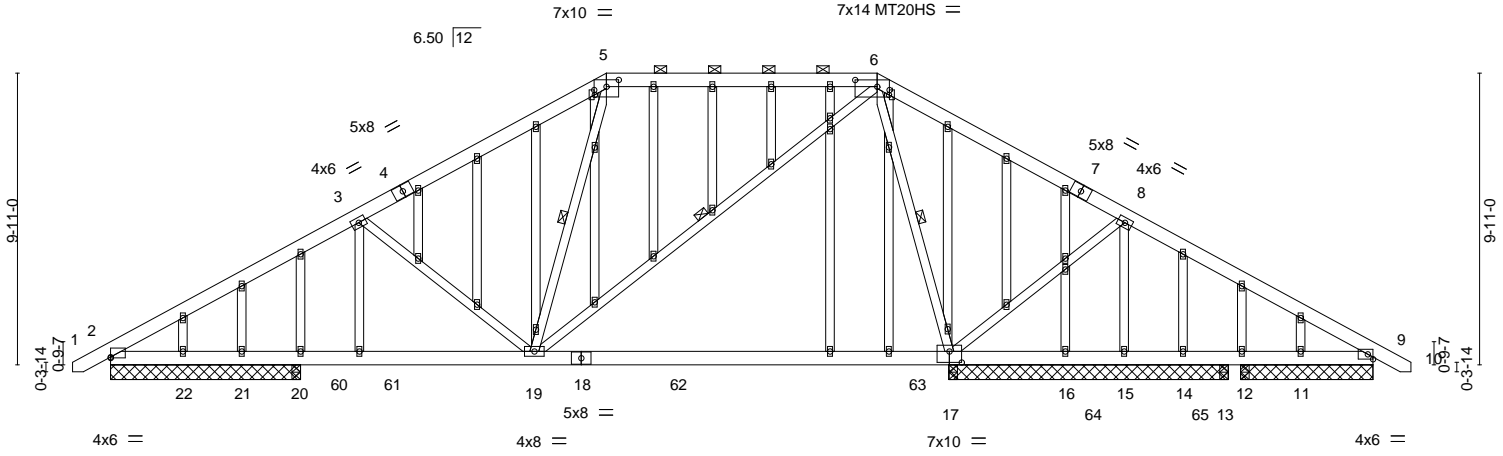


Plate Offsets (X, Y)--	2-0-0-0,0-0-5	[5:0-0-7,0-0-4]	[5:0-5-0,0-2-13]	[5:0-0-0,0-2-12]	[6:0-9-0,0-2-12]	[6:0-0-7,0-0-2]	[17:0-5-0,0-4-8]	[27:0-2-0,0-0-4]	[43:0-2-0,0-0-4]
------------------------	---------------	-----------------	------------------	------------------	------------------	-----------------	------------------	------------------	------------------

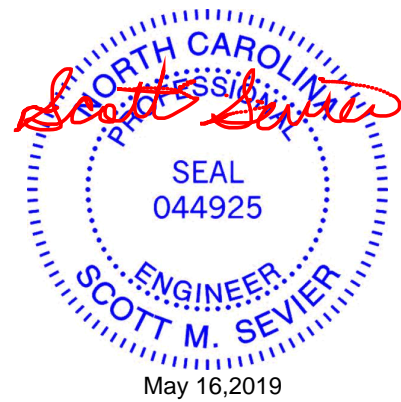
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.47	Vert(LL)	-0.31 17-19	>846	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.81	Vert(CT)	-0.53 17-19	>501	240	MT20HS	187/143
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.68	Horz(CT)	0.02 57	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.05 17-19	>999	240		Weight: 429 lb FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.2	2-0-0 oc purlins (6-0-0 max.): 5-6.
WEBS 2x4 SP No.3 *Except*	BOT CHORD Rigid ceiling directly applied.
6-19: 2x4 SP No.2	WEBS 1 Row at midpt 5-19, 6-19, 6-17
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 9-6-0 except (jt=length) 2=6-5-8, 9=4-6-0, 21=6-5-8, 22=6-5-8, 11=4-6-0, 20=0-3-8, 20=0-3-8, 13=0-3-8, 12=0-3-8, 12=0-3-8, 2=6-5-8, 9=4-6-0.  
 (lb) - Max Horz 2=-251(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 21, 14, 13, 12, 12 except 2=-319(LC 12), 17=-343(LC 13), 9=-181(LC 13), 22=-109(LC 12), 16=-371(LC 18), 11=-133(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 21, 22, 14, 11, 20, 20, 13, 12 except 2=996(LC 23), 17=1960(LC 2), 17=1823(LC 1), 9=367(LC 24), 15=333(LC 18), 2=984(LC 1), 9=326(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-1519/643, 3-5=-1111/529, 5-6=-939/579, 6-8=0/342, 8-9=-410/268  
 BOT CHORD 2-22=-509/1264, 21-22=-509/1264, 20-21=-509/1264, 19-20=-509/1264, 17-19=-126/255, 16-17=-74/267, 15-16=-74/267, 14-15=-74/267, 13-14=-74/267, 12-13=-74/267, 11-12=-74/267, 9-11=-74/267  
 WEBS 3-19=-608/475, 6-19=-330/947, 6-17=-1255/521, 8-17=-631/482

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are MT20 plates unless otherwise indicated.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 21, 14, 13, 12 except (jt=lb) 2=319, 17=343, 9=181, 22=109, 16=371, 11=133, 2=319, 9=181.
  - This truss design requires that a minimum of 7/16" structural wood sheathing be applied directly to the top chord and 1/2" gypsum sheathing be applied directly to the bottom chord.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	I37107384
681099_Master_130	A27	GABLE	1	1		
Job Reference (optional)						

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:16 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-MCQfAypBMxkeMx6SRr7odlObIK?xEZP5Zcv3rJzG\_q9

**NOTES-**

12) Graphical purlin 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. 10/03/2015 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/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107385
681099_Master_130	A28	GABLE L GABLE L GABL I MMON I I MON	2	1		

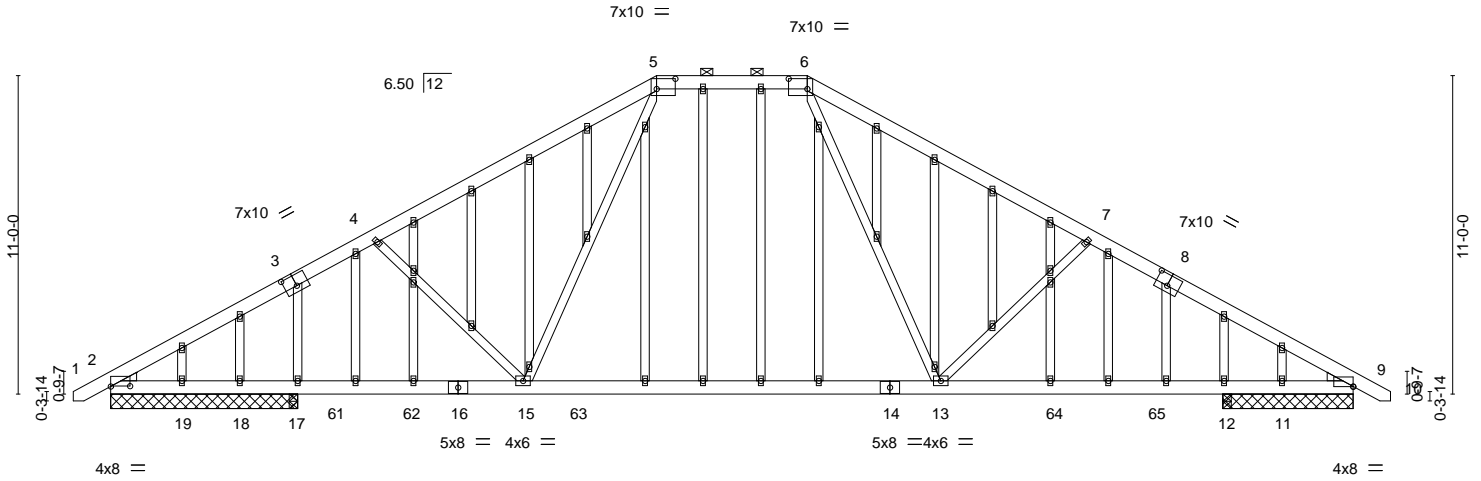
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:18 2019 Page 1

ID:6U\_sNXmsGM6hZKeeE\_lIa6zQrSu-lbXPbdqRuY\_LbFGrZG9GijTt97hWITGO1wOAVCzG\_q7

1-3-8	9-2-8	18-10-4	24-0-12	33-8-8	42-11-0	44-2-8
1-3-8	9-2-8	9-7-12	5-2-7	9-7-12	9-2-8	1-3-8

Scale = 1:79.6



	6-2-0	14-4-13	28-6-3	38-5-0	42-11-0
	6-2-0	8-2-13	14-1-5	9-10-13	4-6-0
Plate Offsets (X, Y)--	[2:0-8-0,0-0-3], [3:0-5-0,0-4-8], [5:0-7-12,0-4-4], [6:0-7-12,0-4-4], [8:0-5-0,0-4-8], [9:0-0-0,0-0-1]				

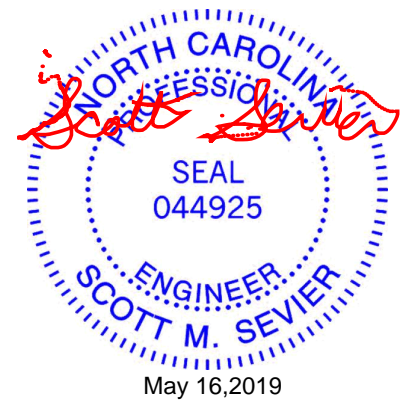
LOADING (psf)	SPACING-	CSL	DEFL.	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.64	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.80	Vert(LL) -0.47 13-15 >815 360		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.66	Vert(CT) -0.79 13-15 >487 240		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-AS	Horz(CT) 0.09 9 n/a n/a		
			Wind(LL) 0.26 13-15 >999 240	Weight: 432 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.1 *Except* 2-16: 2x6 SP No.2	2-0-0 oc purlins (5-3-4 max.): 5-6.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.
OTHERS 2x4 SP No.3	
WEDGE	
Left: 2x4 SP No.3, Right: 2x4 SP No.3	

**REACTIONS.** All bearings 6-5-8 except (jt=length) 9=4-6-0, 11=4-6-0, 17=0-3-8, 17=0-3-8, 12=0-3-8, 12=0-3-8, 9=4-6-0.  
 (lb) - Max Horz 2=-279(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 12 except 2=-399(LC 12), 9=-436(LC 13), 18=-256(LC 23), 19=-162(LC 12), 11=-281(LC 26), 17=-154(LC 12)  
 Max Grav All reactions 250 lb or less at joint(s) 18, 19, 11, 17 except 2=1713(LC 2), 9=1750(LC 2), 17=383(LC 23), 12=404(LC 26), 12=262(LC 1), 2=1664(LC 1), 9=1699(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-4=-2827/1034, 4-5=-2499/953, 5-6=-1761/862, 6-7=-2516/953, 7-9=-2847/1035  
 BOT CHORD 2-19=-742/2434, 18-19=-742/2434, 17-18=-742/2434, 15-17=-742/2434, 13-15=-333/1761, 12-13=-744/2405, 11-12=-744/2405, 9-11=-744/2405  
 WEBS 4-15=-648/549, 5-15=-182/862, 6-13=-185/907, 7-13=-654/550

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 4) Provide adequate drainage to prevent water ponding.
  - 5) All plates are 2x4 MT20 unless otherwise indicated.
  - 6) Gable studs spaced at 2-0-0 oc.
  - 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 8) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 12 except (jt=lb) 2=399, 9=436, 18=256, 19=162, 11=281, 17=154, 2=399, 9=436.
  - 10) 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.
  - 11) Graphical purlin 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. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932



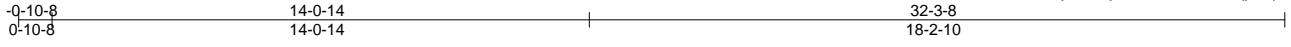


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107387
681099_Master_130	B02	GABLE	6	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:21 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-iADYDfsKBTNwSj?PEOjzKM5UeLsUvxVqucqWWzG\_q4



Scale = 1:60.4

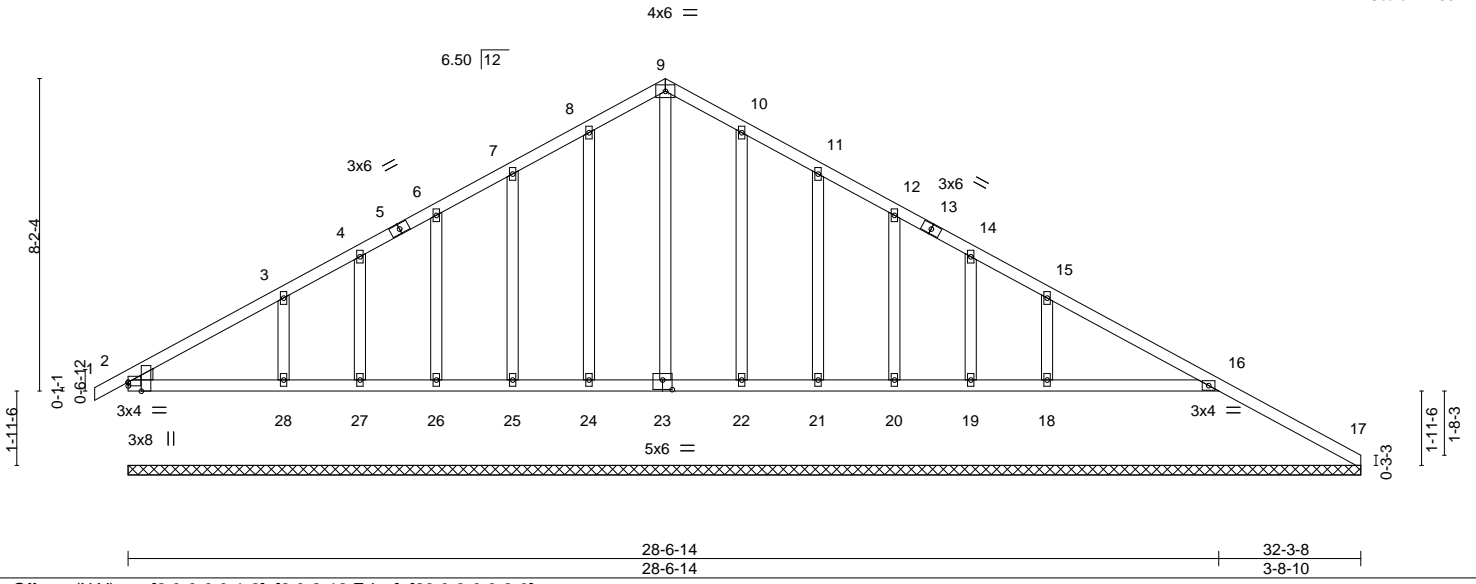


Plate Offsets (X,Y)--	[2:0-0-0,0-1-2], [2:0-2-12,Edge], [23:0-3-0,0-3-0]
-----------------------	--

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.30	Vert(LL) -0.00 1 n/r 120	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.15	Vert(CT) 0.01 1 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.24	Horz(CT) 0.01 17 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S		Weight: 176 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	
WEDGE	
Left: 2x4 SP No.3	

**REACTIONS.** All bearings 32-3-8.  
 (lb) - Max Horz 2=-275(LC 13)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 17, 16, 24, 25, 26, 27, 22, 21, 20, 19 except 28=-190(LC 12), 18=-160(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 17, 23, 24, 25, 26, 27, 22, 21, 20, 19 except 16=383(LC 1), 28=328(LC 19), 18=300(LC 24)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 7-8=-211/265, 8-9=-260/298, 9-10=-259/296  
 WEBS 3-28=-294/220, 15-18=-265/207

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 17, 16, 24, 25, 26, 27, 22, 21, 20, 19 except (jt=lb) 28=190, 18=160.
  - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2, 16, 23, 24, 25, 26, 27, 28, 22, 21, 20, 19, 18.
  - Gap between inside of top chord bearing and first diagonal or vertical web shall not exceed 0.500in.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107388
681099_Master_130	B03	GABLE	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:22 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-AMnwQ?tyynVn4saco5ECtZefOkCkeRZzxYMO2zzG\_q3



Scale = 1:54.0

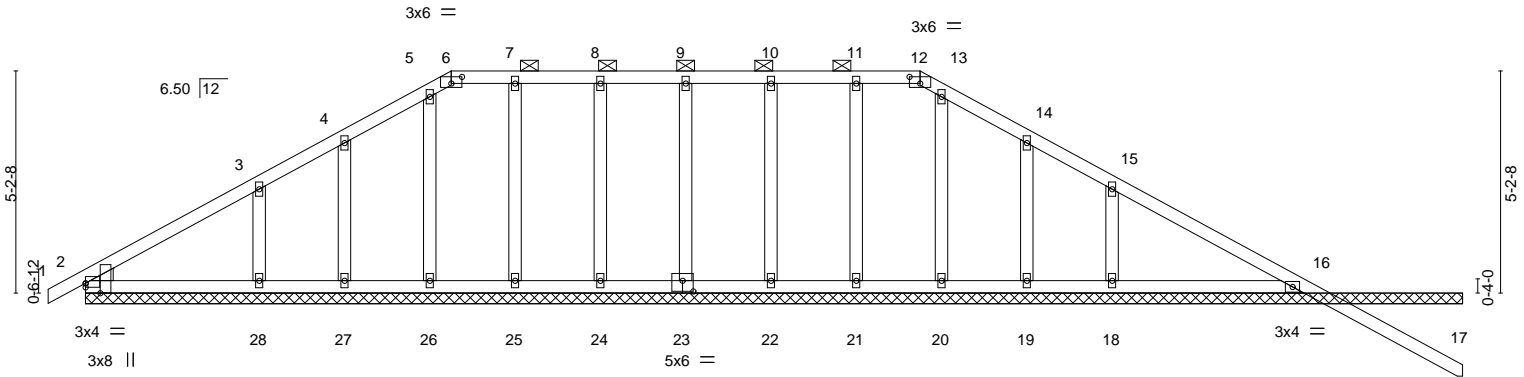


Plate Offsets (X,Y)--	[2:0-2-12,Edge], [2:0-0-0,0-1-2], [6:0-3-0,0-1-14], [12:0-3-0,0-1-14], [23:0-3-0,0-3-0]
-----------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.30	Vert(LL)	-0.00	1	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.14	Vert(CT)	0.01	1	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.06	Horz(CT)	0.01	17	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 161 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except
BOT CHORD 2x4 SP No.2	2-0-0 oc purlins (6-0-0 max.): 6-12.
OTHERS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEDGE	
Left: 2x4 SP No.3	

**REACTIONS.** All bearings 32-3-8.  
 (lb) - Max Horz 2=-208(LC 13)  
 Max Uplift All uplift 100 lb or less at joint(s) 17, 2, 23, 24, 25, 26, 27, 22, 21, 19 except 28=-184(LC 12), 18=-157(LC 13), 16=-102(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 17, 2, 23, 24, 25, 26, 27, 22, 21, 20, 19 except 28=326(LC 19), 18=299(LC 24), 16=383(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
**WEBS** 3-28=-290/214, 15-18=-262/204

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 17, 2, 23, 24, 25, 26, 27, 22, 21, 19 except (jt=lb) 28=184, 18=157, 16=102.
  - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 17.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

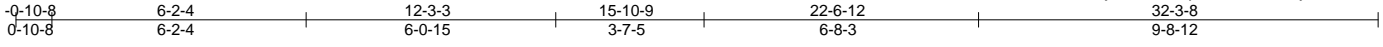
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107389
681099_Master_130	B04	Hip	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:23 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-eYLleLuaj4deh09oMplRPnAki8N?NjV7AC5xaPzG\_q2



Scale = 1:56.1

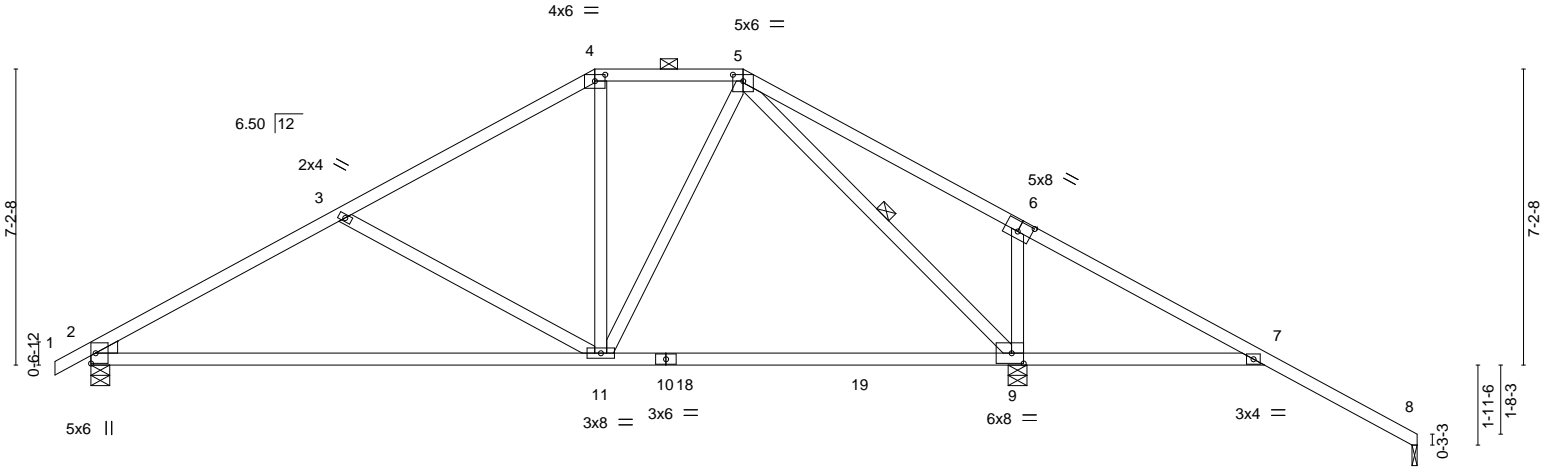


Plate Offsets (X,Y)--	[2:0-0-12,0-5-10], [2:0-0-6,0-0-11], [4:0-3-0,0-1-14], [5:0-3-0,0-1-14], [6:0-4-0,0-3-0], [9:0-3-8,0-3-0]
-----------------------	---

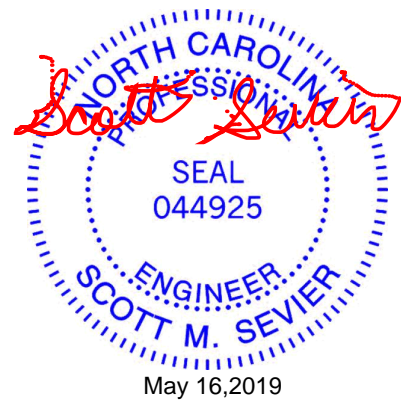
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.65	Vert(LL)	-0.36	9-11	>757	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.85	Vert(CT)	-0.68	11-14	>400		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.72	Horz(CT)	0.06	8	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.07	11-14	>999	Weight: 149 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x4 SP No.2 *Except* 2-10: 2x4 SP No.1	2-0-0 oc purlins (6-0-0 max.): 4-5.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.
WEDGE	WEBS 1 Row at midpt 5-9
Left: 2x4 SP No.3	

**REACTIONS.** (lb/size) 2=842/0-5-8, 9=1669/0-5-8, 8=130/0-1-8  
 Max Horz 2=-255(LC 13)  
 Max Uplift 2=-264(LC 12), 9=-414(LC 13), 8=-56(LC 13)  
 Max Grav 2=859(LC 23), 9=1669(LC 1), 8=133(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-1159/458, 3-4=-781/317, 4-5=-661/341, 5-6=-40/838, 6-7=-247/839  
 BOT CHORD 2-11=-330/1036, 9-11=-105/499, 7-9=-775/385  
 WEBS 3-11=-559/358, 5-11=-95/500, 5-9=-1472/341, 6-9=-519/384

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - 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 at joint(s) 8.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8 except (jt=lb) 2=264, 9=414.
  - 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.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107390
681099_Master_130	C01	GABLE	4	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:24 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-7lvgrhVUOIVJAK\_vWggy\_j?ZYu?6HoGPsrU7rzG\_q1



5x6 ||

Scale = 1:74.4

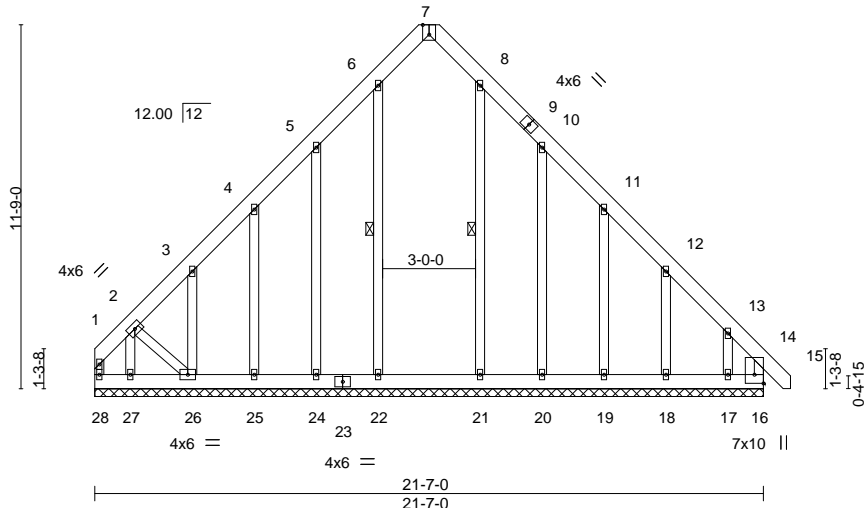


Plate Offsets (X, Y)-- [7:0-3-12,Edge], [14:0-1-12,0-1-12], [16:Edge,0-3-8], [16:0-0-0,0-1-12]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.26	Vert(LL)	0.00	14	n/r	120	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.16	Vert(CT)	0.00	14	n/r	120		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.27	Horz(CT)	0.01	16	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S							

Weight: 211 lb FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.2 *Except* 2-26: 2x4 SP No.3	WEBS 1 Row at midpt 6-22, 8-21
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 21-7-0.  
 (lb) - Max Horz 28=-412(LC 8)  
 Max Uplift All uplift 100 lb or less at joint(s) 22, 27 except 28=-118(LC 10), 16=-233(LC 11), 24=-201(LC 12), 25=-170(LC 12), 26=-390(LC 12), 20=-213(LC 13), 19=-166(LC 13), 18=-137(LC 13), 17=-489(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 28, 24, 25, 21, 20, 19, 18 except 16=626(LC 13), 22=302(LC 20), 26=284(LC 20), 27=255(LC 12), 17=282(LC 11)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-390/247, 3-4=-263/205, 12-13=-350/237, 13-14=-564/400, 14-16=-419/319  
 BOT CHORD 27-28=-326/354, 26-27=-328/355, 25-26=-288/370, 24-25=-289/370, 22-24=-289/370, 21-22=-289/370, 20-21=-289/370, 19-20=-289/370, 18-19=-288/369, 17-18=-287/368, 16-17=-285/366  
 WEBS 2-27=-287/142, 13-17=-274/293, 2-26=-271/389

- NOTES-** (12)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 22, 27 except (jt=lb) 28=118, 16=233, 24=201, 25=170, 26=390, 20=213, 19=166, 18=137, 17=489.
  - Attic room checked for L/360 deflection.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107391
681099_Master_130	C02	ROOF TRUSS	13	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:25 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-bxS331wqFitMxKJBTEncUCF9Jy4SrdFQeWa2flzG\_q0



5x6 ||

Scale = 1:75.3

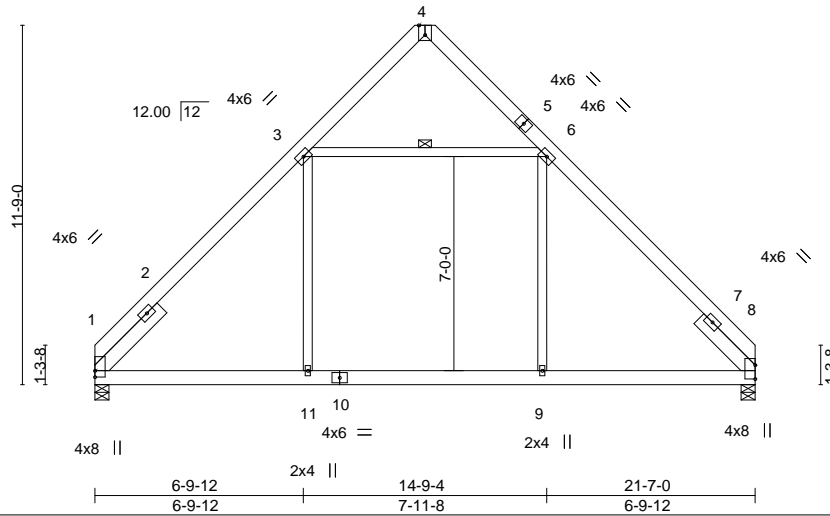


Plate Offsets (X,Y)-- [4:0-3-12,Edge]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.33	Vert(LL)	0.24	11-14	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.78	Vert(CT)	-0.19	9-11	>999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.71	Horz(CT)	0.07	8	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.11	9-11	811	Weight: 168 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x6 SP No.2  
 WEBS 2x4 SP No.3  
 SLIDER Left 2x6 SP No.2 3-0-0, Right 2x6 SP No.2 2-6-0

**BRACING-**

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

**REACTIONS.**

(lb/size) 1=1017/0-5-8, 8=1017/0-5-8  
 Max Horz 1=-355(LC 8)  
 Max Uplift 1=-66(LC 13), 8=-66(LC 12)  
 Max Grav 1=1163(LC 21), 8=1163(LC 20)

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

TOP CHORD 1-3=-1448/188, 3-4=-270/96, 4-6=-272/96, 6-8=-1457/187  
 BOT CHORD 1-11=-28/995, 9-11=-24/1003, 8-9=-24/991  
 WEBS 6-9=-14/595, 3-6=-901/370, 3-11=-14/601

**NOTES-** (9)

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Ceiling dead load (5.0 psf) on member(s). 3-6; Wall dead load (5.0psf) on member(s).6-9, 3-11
- Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 9-11
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 8.
- Attic room checked for L/360 deflection.
- This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107392
681099_Master_130	C03	ROOF TRUSS	15	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:26 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-370RGNwS0??DYUIN1xI81PoKzMRha4KZsAKbBkzG\_q?



5x6 ||

Scale = 1:73.9

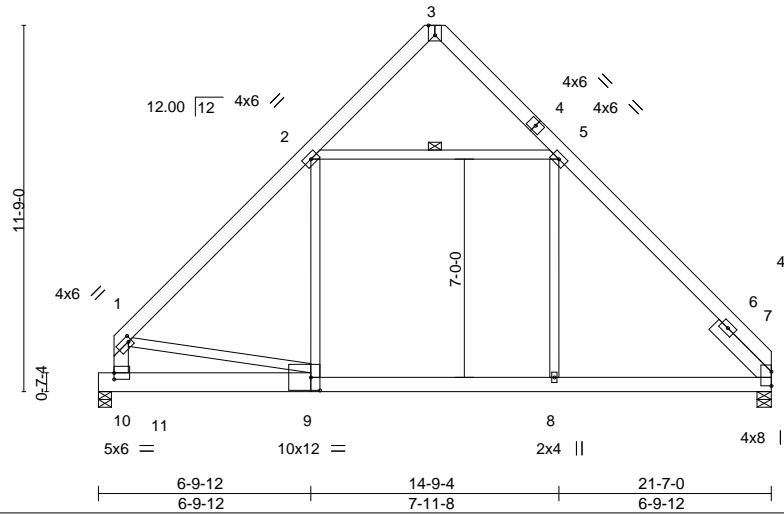


Plate Offsets (X,Y)--	[1:0-1-4,0-2-0], [3:0-3-12,Edge], [9:0-3-8,0-5-0], [10:0-0-0,0-2-8]
-----------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.33	Vert(LL)	0.18	8-14	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.72	Vert(CT)	-0.17	8-9	>999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.72	Horz(CT)	0.06	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.11	8-9	861	Weight: 176 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 5-6-12 oc purlins, except end verticals.
BOT CHORD 2x6 SP No.2 *Except* 9-11: 2x8 SP DSS	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.3 *Except* 1-10: 2x6 SP No.2	WEBS 1 Row at midpt 2-5
SLIDER Right 2x6 SP No.2 2-6-0	

<b>REACTIONS.</b> (lb/size)	11=981/0-5-0, 7=1007/0-5-8
Max Horz	11=-391(LC 10)
Max Uplift	11=-55(LC 13), 7=-62(LC 12)
Max Grav	11=1148(LC 21), 7=1154(LC 20)

<b>FORCES.</b> (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1463/189, 3-5=-263/105, 5-7=-1441/173, 1-10=-1261/170
BOT CHORD 10-11=-371/391, 9-10=-432/652, 8-9=-2/990, 7-8=-3/978
WEBS 5-8=-18/593, 2-5=-892/356, 2-9=-20/559, 1-9=-157/846

- NOTES-** (9)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Ceiling dead load (5.0 psf) on member(s). 2-5; Wall dead load (5.0psf) on member(s). 5-8, 2-9
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 8-9
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 7.
  - Attic room checked for L/360 deflection.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.</b></p> <p>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 <b>ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information</b> available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.</p>	<p>ENGINEERING BY</p> <p><b>TRENCO</b></p> <p>A MiTek Affiliate</p> <p>818 Soundside Road Edenton, NC 27932</p>
---	---

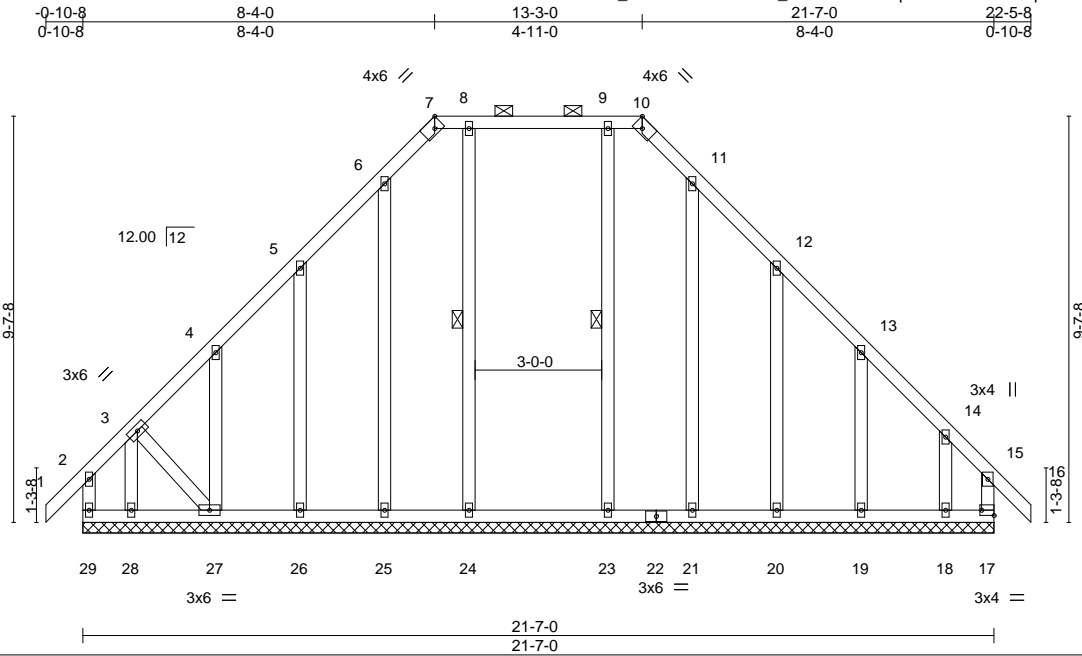


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107393
681099_Master_130	C04	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:27 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lIa6zQrSu-XKapUix5nJ74AeSZbfpNadLXmIv3Jfdj5p39jAzG\_q



Scale = 1:54.6

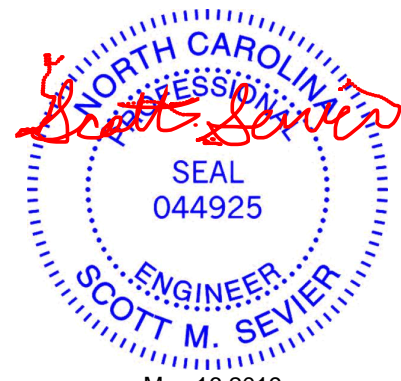
Plate Offsets (X,Y)--	[7:0-2-8,Edge], [10:0-2-8,Edge], [17:Edge,0-1-8]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/def L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.20	Vert(LL) -0.00 16 n/r 120	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.20	Vert(CT) -0.00 16 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.20	Horz(CT) 0.01 17 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S			
				Weight: 170 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 7-10.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 2x4 SP No.2 *Except*	WEBS 1 Row at midpt 8-24, 9-23
3-27: 2x4 SP No.3	
OTHERS 2x4 SP No.3	

<b>REACTIONS.</b>	All bearings 21-7-0.
(lb) - Max Horz	29=-362(LC 10)
Max Uplift	All uplift 100 lb or less at joint(s) 29, 24, 25, 23, 21 except 17=-131(LC 11), 26=-189(LC 12), 27=-378(LC 12), 28=-180(LC 10), 20=-199(LC 13), 19=-135(LC 13), 18=-380(LC 13)
Max Grav	All reactions 250 lb or less at joint(s) 29, 25, 26, 21, 20, 19 except 17=347(LC 13), 24=310(LC 22), 27=338(LC 10), 28=308(LC 11), 23=297(LC 22), 18=250(LC 11)

<b>FORCES.</b>	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	3-4=-257/250, 5-6=-221/289, 6-7=-248/286, 7-8=-225/273, 8-9=-225/273, 9-10=-225/273, 10-11=-248/286, 11-12=-221/258, 14-15=-304/258
BOT CHORD	28-29=-302/295, 27-28=-302/295
WEBS	3-28=-318/246, 14-18=-261/262, 3-27=-264/320

- NOTES-** (13)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 29, 24, 25, 23, 21 except (jt=lb) 17=131, 26=189, 27=378, 28=180, 20=199, 19=135, 18=380.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

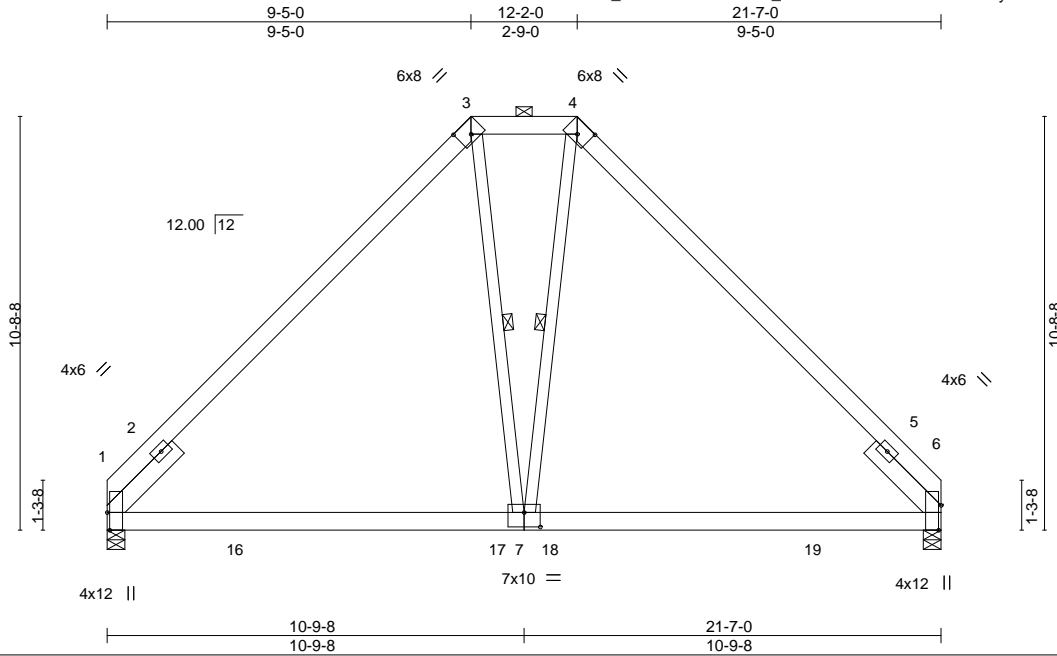
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107394
681099_Master_130	C05	HIP	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:29 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-TiiZuOzLJwNoPxyci4sr2Qp9ZUlnao?Y7YFn3zG\_py



Scale = 1:59.6

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

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.46	Vert(LL)	-0.10	7-10	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.63	Vert(CT)	-0.16	7-10	>999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.16	Horz(CT)	0.06	6	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.14	7-10	>999		
								Weight: 162 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except
BOT CHORD 2x6 SP No.2	2-0-0 oc purlins (6-0-0 max.): 3-4.
WEBS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied.
SLIDER Left 2x6 SP No.2 2-6-0, Right 2x6 SP No.2 2-6-0	WEBS 1 Row at midpt 3-7, 4-7

**REACTIONS.** (lb/size) 1=863/0-5-8, 6=863/0-5-8  
 Max Horz 1=-317(LC 8)  
 Max Uplift 1=-172(LC 12), 6=-172(LC 13)  
 Max Grav 1=959(LC 2), 6=959(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-3=-945/350, 3-4=-723/446, 4-6=-945/350  
 BOT CHORD 1-7=-131/683, 6-7=-55/627  
 WEBS 3-7=-224/493, 4-7=-224/493

- NOTES-** (9)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (it=lb) 1=172, 6=172.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

Job 681099_Master_130	Truss C06	Truss Type ROOF TRUSS	Qty 1	Ply 1	H&H/Jackson/ Job Reference (optional)	137107395
--------------------------	--------------	--------------------------	----------	----------	--	-----------

Builders FirstSource, Sumter, SC - 29153,

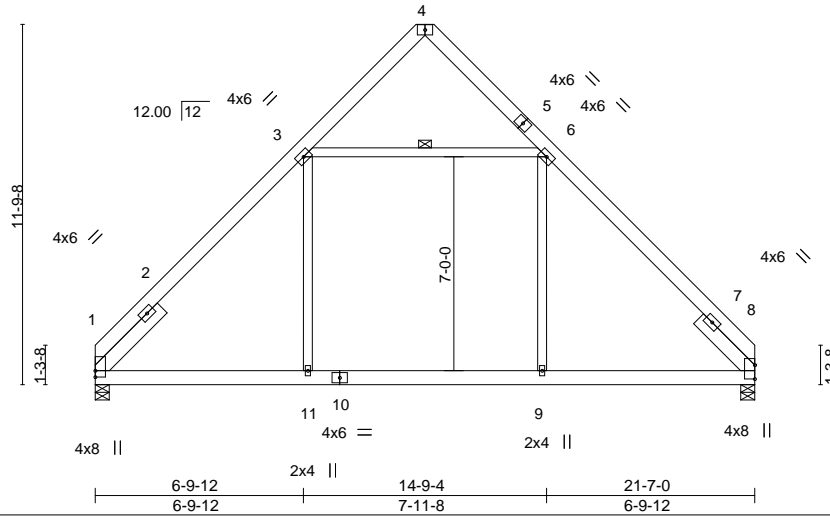
8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:30 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lIa6zQrSu-xuGy6kzz3EVe15B8GnN4BFz02zndWuU9nnpJVzG\_px



4x6 =

Scale = 1:75.4



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.33	Vert(LL)	0.24 11-14	>999	240	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.78	Vert(CT)	-0.19 9-11	>999	240		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.71	Horz(CT)	0.07 8	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.11 9-11	811	360		
								Weight: 168 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x6 SP No.2  
 WEBS 2x4 SP No.3  
 SLIDER Left 2x6 SP No.2 3-0-0, Right 2x6 SP No.2 2-6-0

**BRACING-**

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

**REACTIONS.**

(lb/size) 1=1017/0-5-8, 8=1017/0-5-8  
 Max Horz 1=-355(LC 8)  
 Max Uplift 1=-66(LC 13), 8=-66(LC 12)  
 Max Grav 1=1163(LC 21), 8=1163(LC 20)

**FORCES.**

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-3=-1449/188, 3-4=-270/96, 4-6=-272/96, 6-8=-1458/188  
 BOT CHORD 1-11=-28/995, 9-11=-24/1003, 8-9=-25/991  
 WEBS 6-9=-14/595, 3-6=-902/371, 3-11=-14/601

**NOTES-** (9)

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Ceiling dead load (5.0 psf) on member(s). 3-6; Wall dead load (5.0psf) on member(s). 6-9, 3-11
- Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 9-11
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 8.
- Attic room checked for L/360 deflection.
- This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



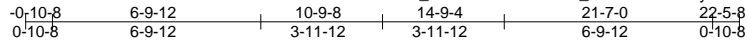
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107396
681099_Master_130	C07	ROOF TRUSS	5	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:30 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-xuGy6kzz3EVe15B8GnN4BFz0?zncWuV9nnpJVzG\_px



5x6 ||

Scale = 1:75.3

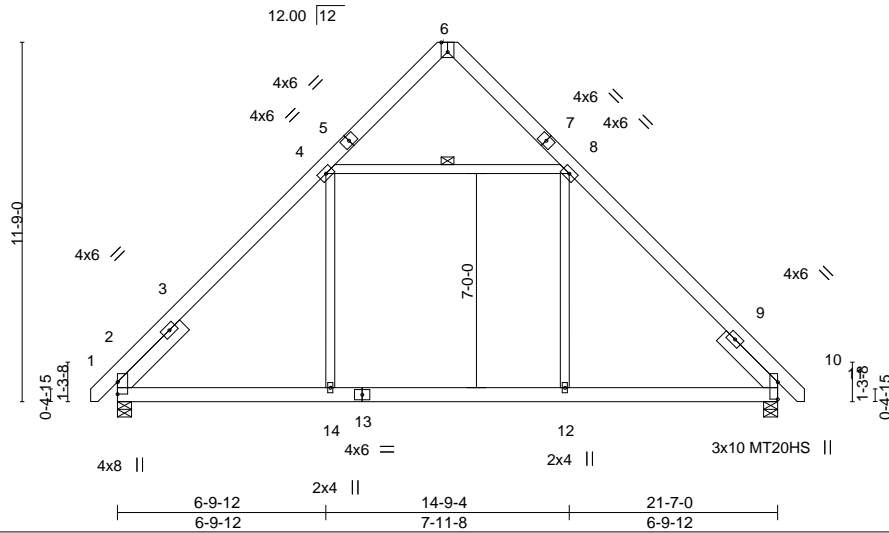


Plate Offsets (X,Y)-- [6:0-3-12,Edge], [10:Edge,0-0-0]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.33	Vert(LL)	0.24	14-17	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.78	Vert(CT)	-0.19	12-14	>999	MT20HS	187/143
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.71	Horz(CT)	0.07	10	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.11	12-14	811		
								Weight: 173 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x6 SP No.2  
 WEBS 2x4 SP No.3  
 SLIDER Left 2x6 SP No.2 3-0-0, Right 2x6 SP No.2 2-6-0

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

**REACTIONS.** (lb/size) 2=1062/0-5-8, 10=1062/0-5-8  
 Max Horz 2=380(LC 11)  
 Max Uplift 2=-78(LC 12), 10=-78(LC 13)  
 Max Grav 2=1193(LC 20), 10=1193(LC 21)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-4=-1446/189, 4-6=-272/96, 6-8=-273/96, 8-10=-1455/188  
 BOT CHORD 2-14=-12/1005, 12-14=-7/1013, 10-12=-8/1001  
 WEBS 8-12=-14/594, 4-8=-900/371, 4-14=-14/600

- NOTES-** (10)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDFL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Ceiling dead load (5.0 psf) on member(s). 4-8; Wall dead load (5.0psf) on member(s). 8-12, 4-14
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 12-14
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 10.
  - Attic room checked for L/360 deflection.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



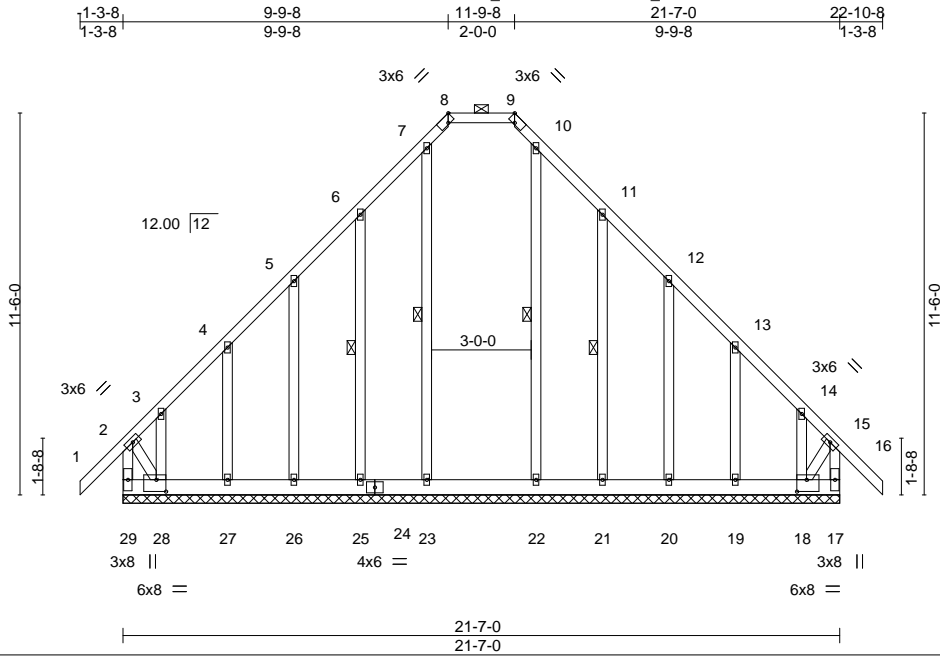
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107397
681099_Master_130	C21	GABLE	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:32 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-uHNiXQ?DbriMGPLXNCPYGg2O1mfP\_w?SF5nwOOzG\_pv



Scale = 1:69.4

Plate Offsets (X,Y)--	[8:0-2-8,Edge], [9:0-2-8,Edge], [18:0-3-8,0-4-4], [28:0-3-8,0-4-4]
-----------------------	--

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.23	Vert(LL)	-0.01	16	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.06	Vert(CT)	-0.01	16	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.19	Horz(CT)	0.01	17	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 199 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 8-9.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
WEBS 2x4 SP No.3	6-0-0 oc bracing: 28-29,17-18.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 7-23, 6-25, 10-22, 11-21

**REACTIONS.** All bearings 21-7-0.  
 (lb) - Max Horz 29=-441(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 23 except 29=-425(LC 10), 17=-367(LC 11), 25=-205(LC 12), 26=-151(LC 12), 27=-173(LC 12), 28=-639(LC 12), 21=-208(LC 13), 20=-150(LC 13), 19=-173(LC 13), 18=-624(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 25, 26, 27, 21, 20, 19 except 29=810(LC 12), 17=785(LC 13), 23=262(LC 22), 28=422(LC 10), 22=252(LC 21), 18=387(LC 11)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-465/357, 3-4=-392/259, 13-14=-377/254, 14-15=-450/372, 2-29=-777/518, 15-17=-753/542  
 BOT CHORD 28-29=-413/389, 27-28=-344/414, 26-27=-344/414, 25-26=-344/414, 23-25=-344/414, 22-23=-344/414, 21-22=-344/414, 20-21=-344/414, 19-20=-344/414, 18-19=-344/414  
 WEBS 2-28=-492/654, 15-18=-476/638

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 23 except (jt=lb) 29=425, 17=367, 25=205, 26=151, 27=173, 28=639, 21=208, 20=150, 19=173, 18=624.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**TRENCO** ENGINEERING BY  
 A MiTek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

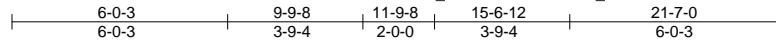


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107398
681099_Master_130	C22	Piggyback Base	7	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:33 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-MTx4km0sM9tDuZwjxvwnpubUnAsMjLlBTWTwqzG\_pu



Scale: 3/16"=1'

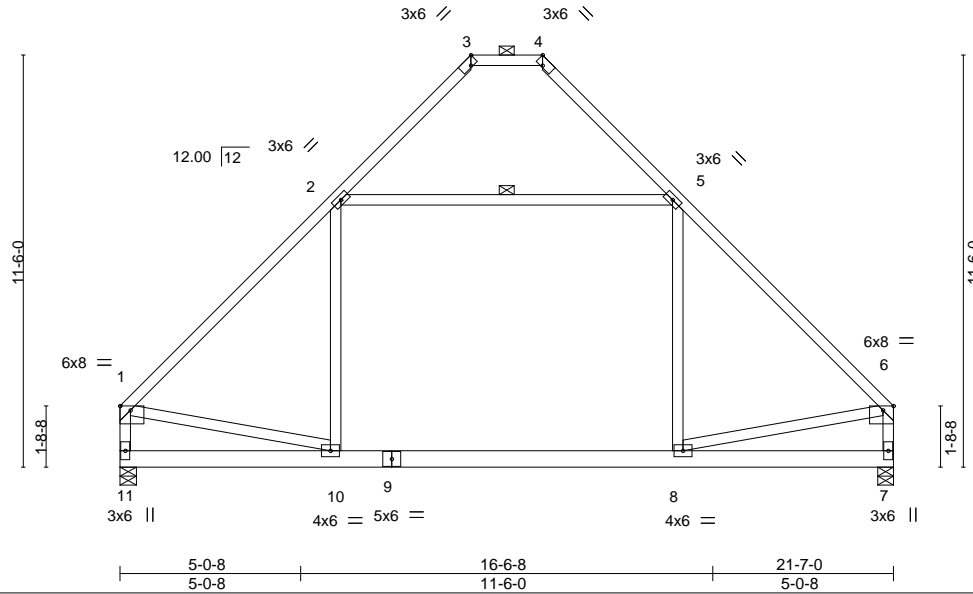


Plate Offsets (X,Y)-- [1:Edge,0-1-7], [3:0-2-8,Edge], [4:0-2-8,Edge], [6:0-3-8,Edge]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.49	Vert(LL)	0.31	10-11	>816	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.59	Vert(CT)	-0.32	10	>799		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.32	Horz(CT)	0.01	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS						
								Weight: 150 lb	FT = 20%

**LUMBER-**  
TOP CHORD 2x4 SP No.2  
BOT CHORD 2x6 SP No.2  
WEBS 2x4 SP No.3

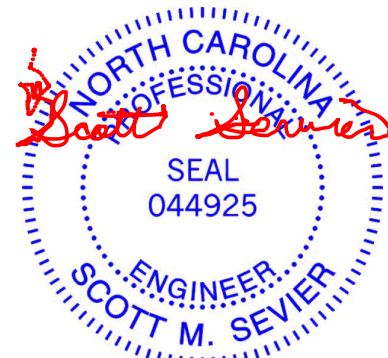
**BRACING-**  
TOP CHORD Structural wood sheathing directly applied or 5-2-14 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.  
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.  
WEBS 1 Row at midpt 2-5

**REACTIONS.** (lb/size) 11=852/0-5-8, 7=852/0-5-4  
Max Horz 11=-393(LC 10)  
Max Uplift 11=-171(LC 13), 7=-171(LC 12)  
Max Grav 11=888(LC 2), 7=888(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
TOP CHORD 1-2=-1053/310, 2-3=-296/131, 4-5=-296/131, 5-6=-1053/310, 1-11=-955/297, 6-7=-955/297  
BOT CHORD 10-11=-490/508, 8-10=-120/727  
WEBS 2-10=-78/339, 5-8=-78/339, 1-10=-204/763, 6-8=-209/766, 2-5=-682/401

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- 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.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (it=lb) 11=171, 7=171.
- Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

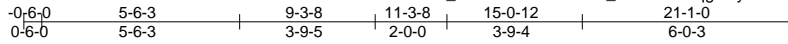


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107399
681099_Master_130	C23	Piggyback Base	9	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:34 2019 Page 1

ID:6U\_sNXmsGM6hZKeeE\_lIa6zQrSu-qgVsy61U7T74WiVvVdROM57fZa9NSockiPG0SGzG\_pt



Scale: 3/16"=1'

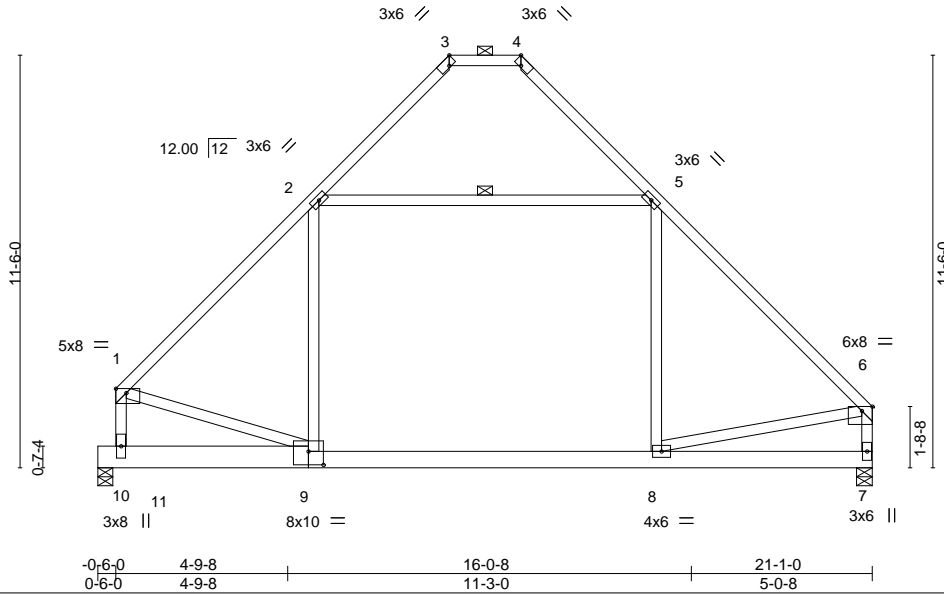


Plate Offsets (X,Y)--	[1:Edge,0-1-7], [3:0-2-8,Edge], [4:0-2-8,Edge], [6:0-3-8,Edge], [9:0-5-0,0-4-8]
-----------------------	---

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.48	Vert(LL)	0.26	7-8	>966	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.73	Vert(CT)	-0.28	8-9	>919		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.31	Horz(CT)	0.01	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS						
								Weight: 154 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 5-3-5 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD 2x8 SP DSS *Except* 7-9: 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 2x4 SP No.3	WEBS 1 Row at midpt 2-5

<b>REACTIONS.</b> (lb/size)	11=823/0-5-0, 7=849/0-5-4
Max Horz	11=-400(LC 8)
Max Uplift	11=-164(LC 13), 7=-168(LC 12)
Max Grav	11=868(LC 2), 7=887(LC 2)

<b>FORCES.</b> (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1064/322, 2-3=-297/130, 4-5=-300/137, 5-6=-1044/303, 1-10=-1040/304, 6-7=-947/292
BOT CHORD 10-11=-391/400, 9-10=-424/448, 8-9=-109/720
WEBS 2-9=-89/368, 5-8=-74/333, 1-9=-172/752, 6-8=-188/753, 2-5=-670/391

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCCL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCCL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 11=164, 7=168.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

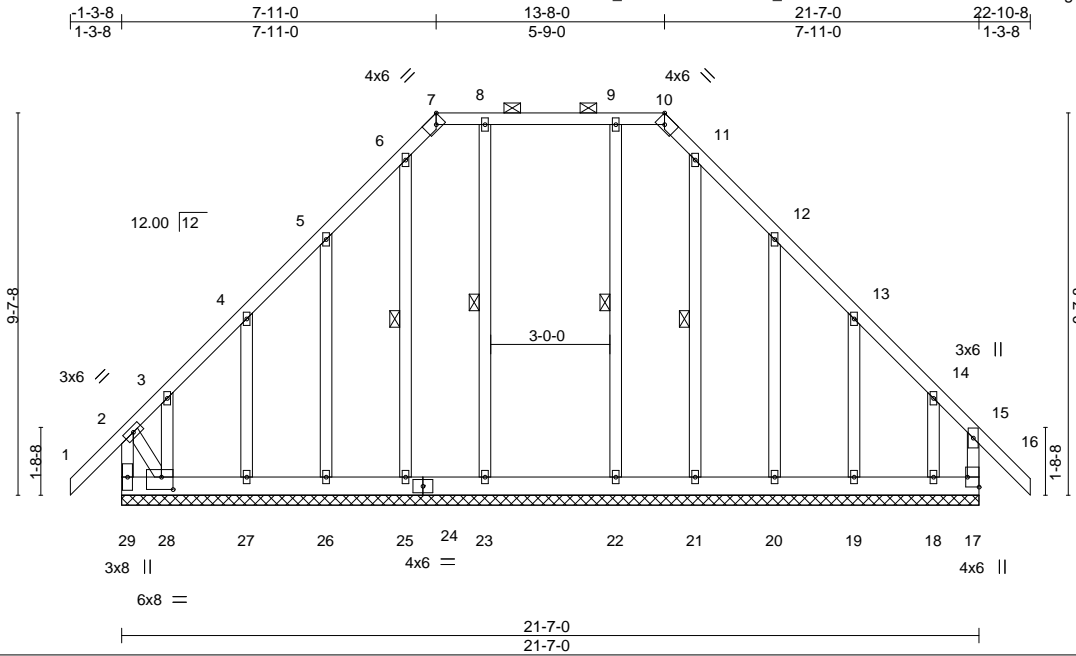
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107400
681099_Master_130	C24	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:35 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-Is3r9R16um8x7s363KzFuJguG\_f9BHuuX3?a?izG\_ps



Scale = 1:58.0

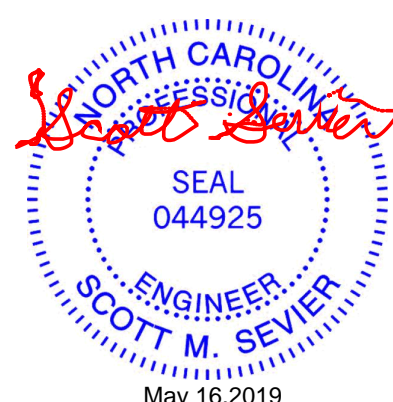
Plate Offsets (X,Y)--	[7:0-2-8,Edge], [10:0-2-8,Edge], [17:Edge,0-3-8], [28:0-3-8,0-3-12]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/def L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.23	Vert(LL) -0.01 16 n/r 120	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.12	Vert(CT) -0.01 16 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.18	Horz(CT) 0.00 17 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S		Weight: 191 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (10-0-0 max.): 7-10.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 2x4 SP No.2 *Except*	WEBS 1 Row at midpt 8-23, 6-25, 9-22, 11-21
OTHERS 2-28: 2x4 SP No.3	
2x4 SP No.3	

**REACTIONS.** All bearings 21-7-0.  
 (lb) - Max Horz 29=-379(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 23, 25, 22 except 29=-467(LC 10), 17=-111(LC 11), 26=-192(LC 12), 27=-164(LC 12), 28=-424(LC 12), 20=-211(LC 13), 19=-133(LC 13), 18=-375(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 25, 26, 27, 21, 20, 19 except 29=557(LC 9), 17=288(LC 13), 23=285(LC 22), 28=447(LC 10), 22=281(LC 22), 18=260(LC 11)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-29=-529/447, 2-3=-293/284, 3-4=-259/270, 5-6=-278/340, 6-7=-239/278, 7-8=-244/296, 8-9=-244/296, 9-10=-244/296, 10-11=-239/278, 11-12=-278/327  
 BOT CHORD 28-29=-347/325  
 WEBS 14-18=-267/219, 2-28=-397/434

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 23, 25, 22 except (jt=lb) 29=467, 17=111, 26=192, 27=164, 28=424, 20=211, 19=133, 18=375.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

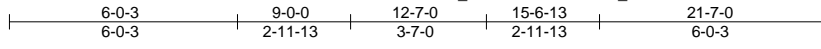


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107401
681099_Master_130	C25	Hip	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:36 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-m2dDMn2kf4Gol0eic2UURWD\_5NufwiL19j7X9zG\_pr



Scale = 1:60.8

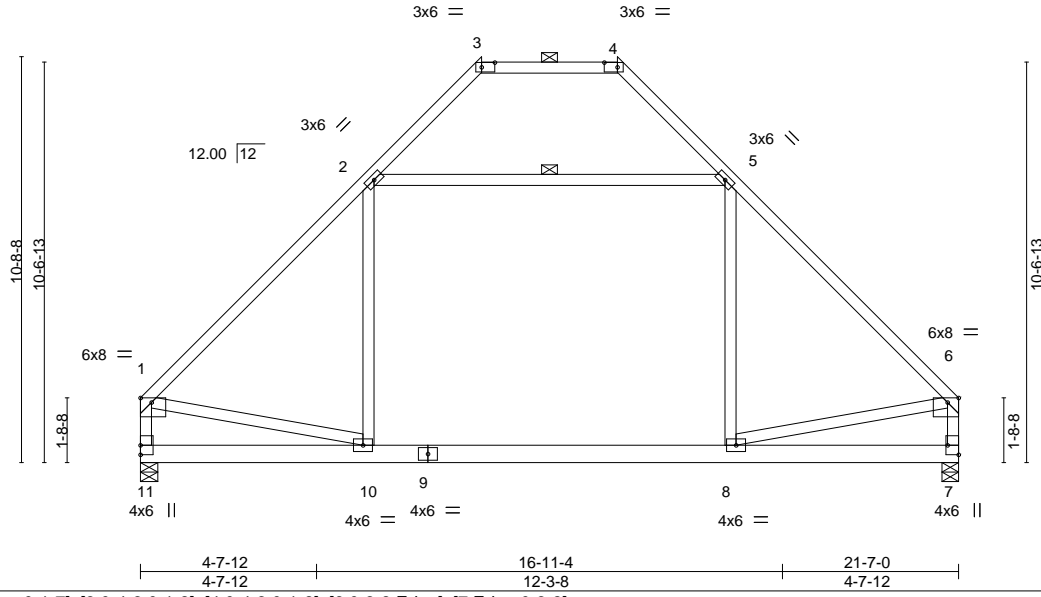


Plate Offsets (X,Y)--	[1:Edge,0-1-7], [3:0-4-3,0-1-8], [4:0-4-3,0-1-8], [6:0-3-8,Edge], [7:Edge,0-3-8]
-----------------------	--

<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.55	Vert(LL) 0.28 10 >924 240	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.55	Vert(CT) -0.28 10 >907 180		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.30	Horz(CT) 0.01 7 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-AS		Weight: 149 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3	WEBS 1 Row at midpt 2-5

**REACTIONS.** (lb/size) 11=852/0-5-8, 7=852/0-5-4  
 Max Horz 11=362(LC 9)  
 Max Uplift 11=-166(LC 12), 7=-166(LC 13)  
 Max Grav 11=888(LC 2), 7=888(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-2=-1007/315, 2-3=-318/152, 4-5=-318/152, 5-6=-1007/316, 1-11=-915/298, 6-7=-916/298  
 BOT CHORD 10-11=-496/522, 8-10=-128/694  
 WEBS 2-10=-50/331, 5-8=-50/331, 1-10=-239/729, 6-8=-245/733, 2-5=-639/358

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- 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.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (it=lb) 11=166, 7=166.
- 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.



May 16, 2019

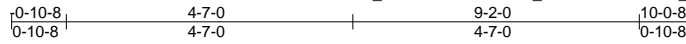


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107403
681099_Master_130	D01	Common Supported Gable	8	1		

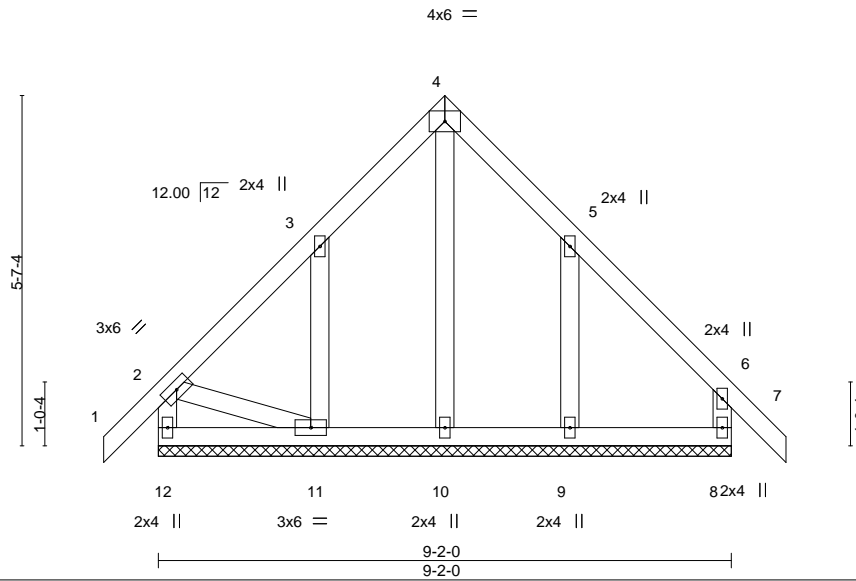
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:38 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-iRlznT4\_BhWW\_KohkTWyWxlRHbOe9Kd1EEb1zG\_pp



Scale = 1:36.9



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in	(loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.12	Vert(LL)	-0.00	7	n/r	120	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.07	Vert(CT)	-0.00	7	n/r	120		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.15	Horz(CT)	0.00	8	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						Weight: 59 lb	FT = 20%

**LUMBER-**

- TOP CHORD 2x4 SP No.2
- BOT CHORD 2x4 SP No.2
- WEBS 2x4 SP No.2 \*Except\*  
2-11: 2x4 SP No.3
- OTHERS 2x4 SP No.3

**BRACING-**

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

**REACTIONS.**

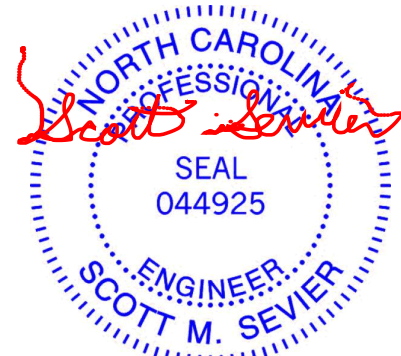
- All bearings 9-2-0.
- (lb) - Max Horz 12=-222(LC 10)
- Max Uplift All uplift 100 lb or less at joint(s) 8, 10 except 12=-141(LC 8), 11=-231(LC 12), 9=-224(LC 13)
- Max Grav All reactions 250 lb or less at joint(s) 12, 8 except 10=295(LC 13), 11=277(LC 19), 9=250(LC 20)

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

- TOP CHORD 3-4=-240/265, 4-5=-241/269
- WEBS 4-10=-291/208, 3-11=-256/215, 5-9=-273/237

**NOTES-** (10)

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- Gable requires continuous bottom chord bearing.
- Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 10 except (jt=lb) 12=141, 11=231, 9=224.
- This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107404
681099_Master_130	D02	Common Girder	5	2		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:39 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-AdJL?p4cy?eNcUNtIA1B39raLb\_f7?kUsh\_n8UzG\_po



4x6 ||

Scale = 1:39.3

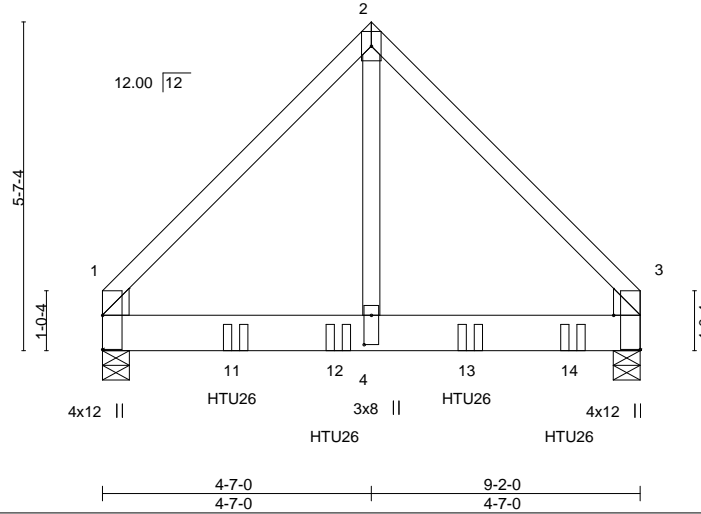


Plate Offsets (X,Y)--	[1:0-2-8,0-3-10], [3:0-2-8,0-3-10], [3:Edge,0-5-7], [4:0-6-0,0-1-8]
-----------------------	---

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.22	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.28	Vert(LL) -0.02 4-10 >999 360		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.51	Vert(CT) -0.05 4-10 >999 240		
BCDL 10.0	Rep Stress Incr NO	Matrix-MS	Horz(CT) 0.00 1 n/a n/a		
	Code IRC2015/TPI2014		Wind(LL) 0.03 4-10 >999 240	Weight: 115 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x8 SP DSS	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.2	
WEDGE	
Left: 2x6 SP No.2, Right: 2x6 SP No.2	

**REACTIONS.** (lb/size) 1=3419/0-5-8, 3=4340/0-5-8  
 Max Horz 1=153(LC 5)  
 Max Uplift 1=-754(LC 9), 3=-875(LC 8)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-2=-3235/758, 2-3=-3228/757  
 BOT CHORD 1-4=-453/2224, 3-4=-453/2224  
 WEBS 2-4=-897/4195

- 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 0-9-0 oc.  
 Bottom chords connected as follows: 2x8 - 2 rows staggered at 0-5-0 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 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 1=754, 3=875.
  - Use Simpson Strong-Tie HTU26 (20-10d Girder, 14-10dx1 1/2 Truss, Single Ply Girder) or equivalent spaced at 2-3-0 oc max. starting at 2-3-4 from the left end to 8-0-4 to connect truss(es) to back face of bottom chord.
  - Fill all nail holes where hanger is in contact with lumber.

**LOAD CASE(S)** Standard  
 1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-60, 2-3=-60, 5-8=-20



Continued on page 2

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

**ENGINEERING BY**  
**TRENCO**  
 A MiTek Affiliate

818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	I37107404
681099_Master_130	D02	Common Girder	5	<b>2</b>	Job Reference (optional)	

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:39 2019 Page 2  
 ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-AdJL?p4cy?eNcUNtIA1B39raLb\_f7?kUsh\_n8UzG\_po

**LOAD CASE(S)** Standard

Concentrated Loads (lb)

Vert: 11=-1686(B) 12=-1780(B) 13=-1780(B) 14=-1780(B)

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



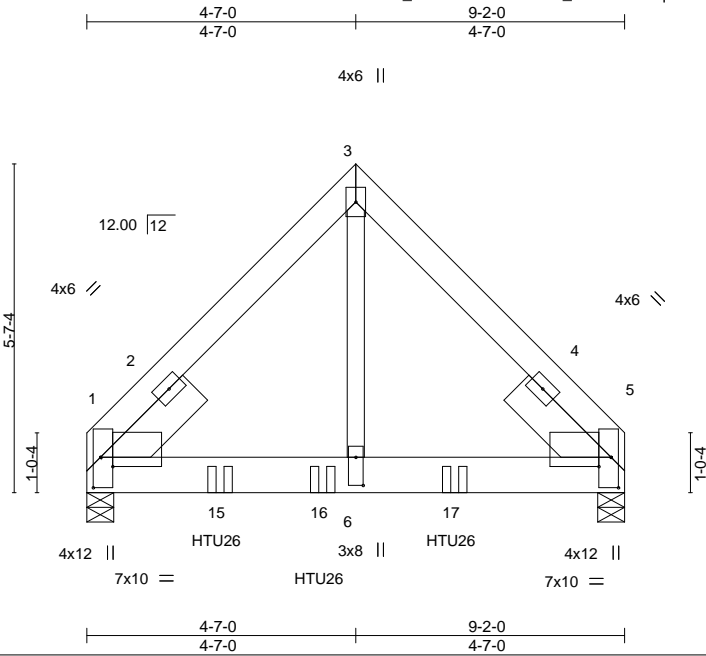
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107405
681099_Master_130	D03	Common Girder	3	2		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:40 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-fqskC95FJmEEdy3rtYQbMnnp?KGsUMd4LJLgwzG\_pn



Scale = 1:39.3

Plate Offsets (X,Y)-- [1:0-6-4,0-1-8], [1:0-2-8,0-1-14], [5:0-6-4,0-1-8], [5:0-2-8,0-1-14], [6:0-5-12,0-1-8]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.11	Vert(LL)	0.03	6-9	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.25	Vert(CT)	-0.04	6-9	>999		
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.43	Horz(CT)	0.01	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS						
								Weight: 159 lb	FT = 20%

**LUMBER-**  
TOP CHORD 2x6 SP No.2  
BOT CHORD 2x8 SP DSS  
WEBS 2x4 SP No.2  
SLIDER Left 2x8 SP DSS 1-11-12, Right 2x8 SP DSS 1-11-12

**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.** (lb/size) 1=3194/0-5-8, 5=2760/0-5-8  
Max Horz 1=145(LC 5)  
Max Uplift 1=-1202(LC 9), 5=-974(LC 8)

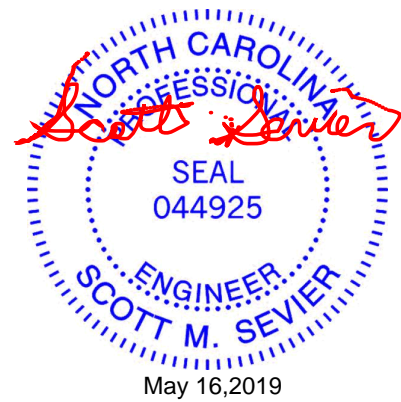
**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
TOP CHORD 1-3=-2606/1043, 3-5=-2685/1057  
BOT CHORD 1-6=-663/1842, 5-6=-663/1842  
WEBS 3-6=-1316/3479

**NOTES-**

- 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:  
Top chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc.  
Bottom chords connected as follows: 2x8 - 2 rows staggered at 0-5-0 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 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 1=1202, 5=974.
- Use Simpson Strong-Tie HTU26 (20-10d Girder, 14-10dx1 1/2 Truss, Single Ply Girder) or equivalent spaced at 2-3-0 oc max. starting at 2-3-4 from the left end to 6-3-4 to connect truss(es) to back face of bottom chord.
- Fill all nail holes where hanger is in contact with lumber.

**LOAD CASE(S)** Standard

- Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15  
Uniform Loads (plf)  
Vert: 1-3=-60, 3-5=-60, 7-11=-20  
Concentrated Loads (lb)  
Vert: 15=-1686(B) 16=-1786(B) 17=-1786(B)



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107406
681099_Master_130	E01	Common Supported Gable	3	1		

Builders FirstSource, Sumter, SC - 29153,

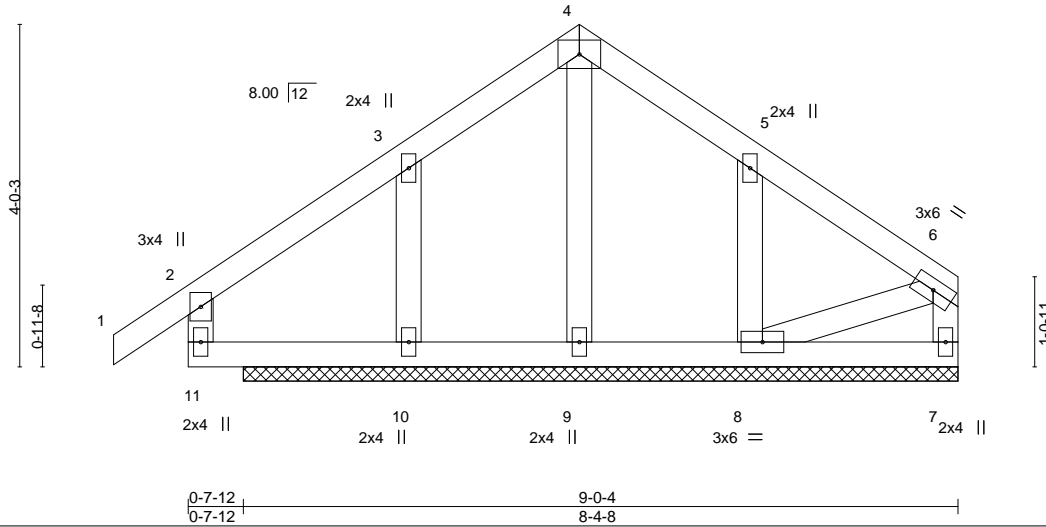
8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:41 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-70Q6QV6tUcu5snXFPb3f8awxYOihb03mJ?TuCMzG\_pm



4x6 =

Scale = 1:27.0



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.18	Vert(LL)	-0.00	1	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.11	Vert(CT)	-0.00	1-2	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.08	Horz(CT)	-0.00	8	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S					Weight: 48 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x4 SP No.3 \*Except\*  
 2-11: 2x4 SP No.2  
 OTHERS 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 9-0-4 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing. Except: 10-0-0 oc bracing: 7-8.

**REACTIONS.** All bearings 8-4-8.  
 (lb) - Max Horz 10=134(LC 9)  
 Max Uplift All uplift 100 lb or less at joint(s) 7 except 10=-190(LC 12), 8=-163(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 7 except 9=254(LC 1), 10=342(LC 19), 8=296(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 3-10=-266/200

- NOTES-** (10)
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left exposed; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 4) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - 5) Gable studs spaced at 2-0-0 oc.
  - 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7 except (jt=lb) 10=190, 8=163.
  - 9) Non Standard bearing condition. Review required.
  - 10) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



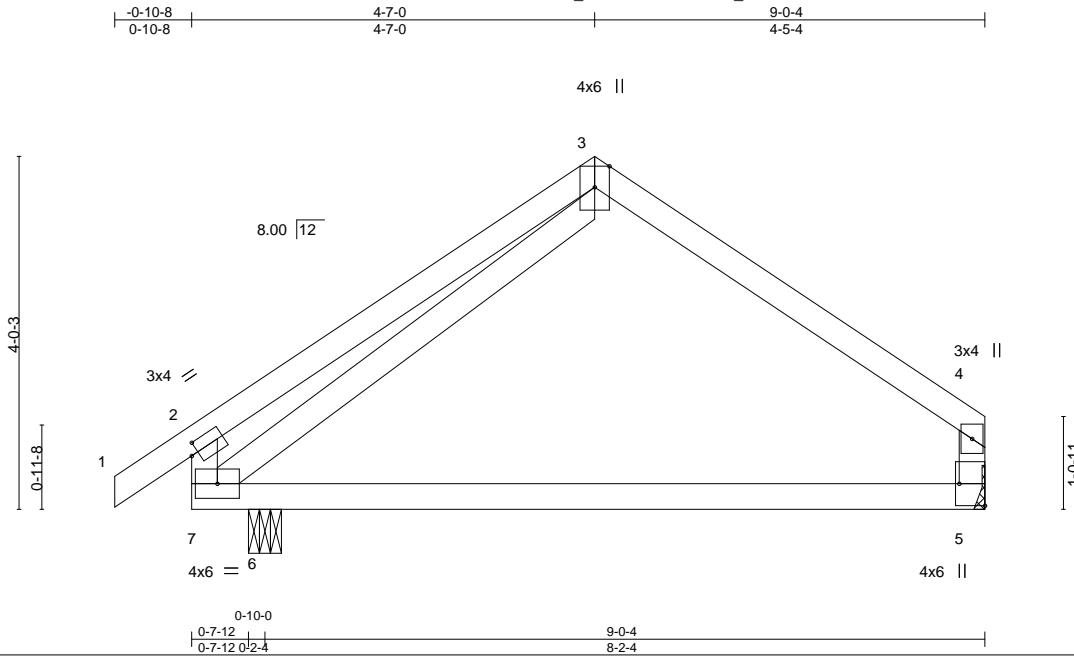
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107407
681099_Master_130	E02	Common	6	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:41 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-70Q6QV6tUcu5snXFPb3f8awv8Ob7b?dmJ?TuCMzG\_pm



Scale = 1:26.2

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

LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.27	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.53	Vert(LL) 0.25 5-6 >393 240		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.17	Vert(CT) -0.20 5-6 >475 240		
BCDL 10.0	Rep Stress Incr YES	Matrix-AS	Horz(CT) 0.00 5 n/a n/a		
	Code IRC2015/TPI2014			Weight: 41 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x4 SP No.2 \*Except\*  
 3-7: 2x4 SP No.3

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

**REACTIONS.** (lb/size) 5=310/Mechanical, 6=449/0-4-8  
 Max Horz 6=134(LC 9)  
 Max Uplift 5=-75(LC 13), 6=-126(LC 12)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-225/451, 3-4=-271/233, 2-7=-225/361, 4-5=-261/183  
 WEBS 3-7=-265/179

- NOTES-** (8)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCCL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left exposed ; end vertical left exposed; porch left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 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 except (jt=lb) 6=126.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107408
681099_Master_130	FG01	Flat Girder	8	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:42 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-bC\_Udr7VfW0xTx6SzlbugnT0xozSKGBwYfCRkozG\_pl

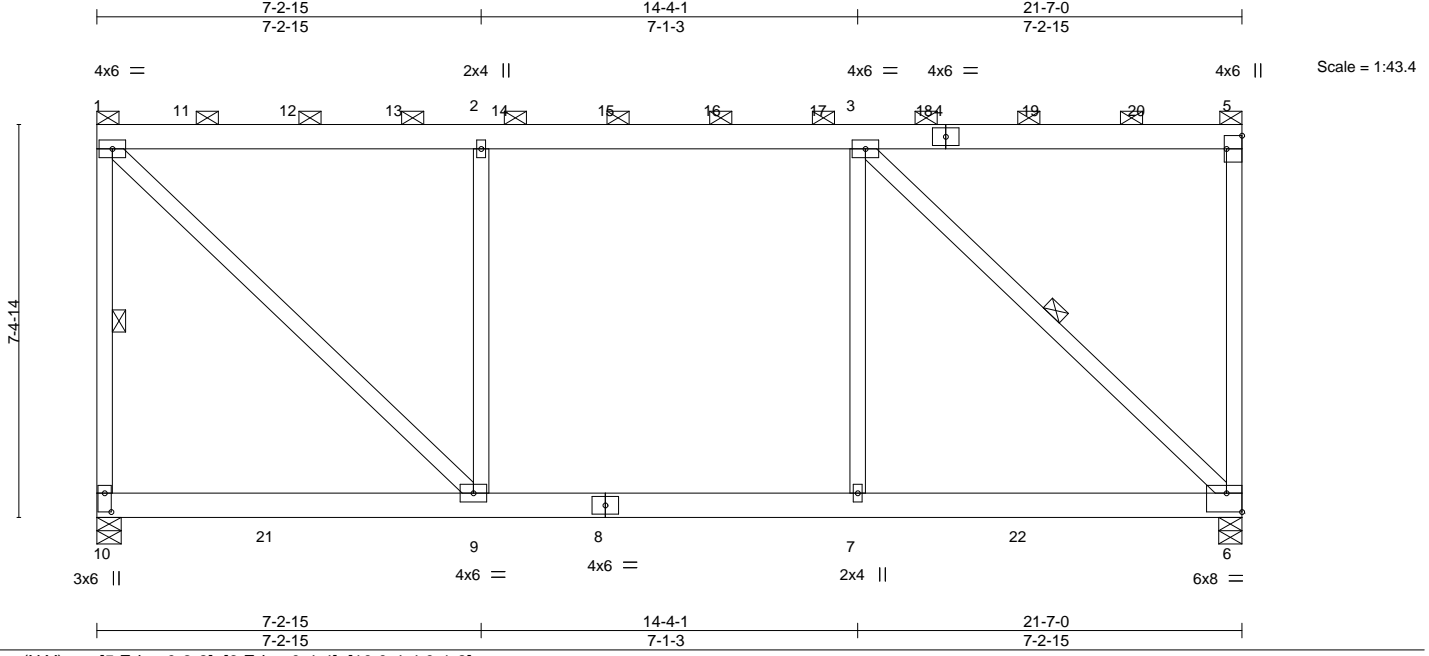


Plate Offsets (X,Y)-- [5:Edge,0-3-8], [6:Edge,0-4-4], [10:0-4-4,0-1-8]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.52	Vert(LL)	0.08	6-7	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.40	Vert(CT)	-0.09	7-9	>999		
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.92	Horz(CT)	0.01	6	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS						
								Weight: 167 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD 2-0-0 oc purlins (6-0-0 max.): 1-5, except end verticals.
BOT CHORD 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.2	WEBS 1 Row at midpt 1-10, 3-6

**REACTIONS.** (lb/size) 10=1247/0-5-8, 6=1323/0-5-4  
 Max Horz 10=-339(LC 4)  
 Max Uplift 10=-469(LC 4), 6=-501(LC 5)  
 Max Grav 10=1324(LC 2), 6=1356(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-10=-1206/507, 1-2=-1006/324, 2-3=-1006/324, 5-6=-349/204  
 BOT CHORD 9-10=-300/271, 7-9=-470/1006, 6-7=-470/1006  
 WEBS 1-9=-551/1391, 2-9=-759/452, 3-7=0/391, 3-6=-1391/552

- NOTES-** (9)
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFERS (envelope) gable end zone; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 10=469, 6=501.
  - 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) 133 lb down and 46 lb up at 1-7-12, 133 lb down and 46 lb up at 3-7-12, 133 lb down and 46 lb up at 5-7-12, 133 lb down and 46 lb up at 7-7-12, 133 lb down and 46 lb up at 9-7-12, 133 lb down and 46 lb up at 11-7-12, 133 lb down and 46 lb up at 13-7-12, 133 lb down and 46 lb up at 15-7-12, 133 lb down and 46 lb up at 17-7-12, and 133 lb down and 46 lb up at 19-7-12, and 96 lb down and 46 lb up at 21-5-4 on top 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).
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

**LOAD CASE(S)** Standard

- Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (plf)
  - Vert: 1-5=-60, 6-10=-20
- Concentrated Loads (lb)
  - Vert: 5=-86 11=-78(B) 12=-78(B) 13=-78(B) 14=-78(B) 15=-78(B) 16=-78(B) 17=-78(B) 18=-78(B) 19=-78(B) 20=-78(B)



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



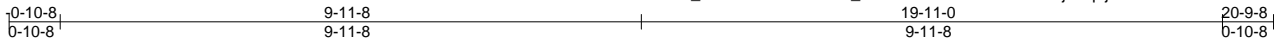


Job 681099_Master_130	Truss G01	Truss Type GABLE	Qty 4	Ply 1	H&H/Jackson/ Job Reference (optional)	137107409
--------------------------	--------------	---------------------	----------	----------	--	-----------

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:44 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-Xb6E2W8ImXGfjFq4jdMmCYTLckVoNID?zhYphzG\_pj



Scale = 1:39.5

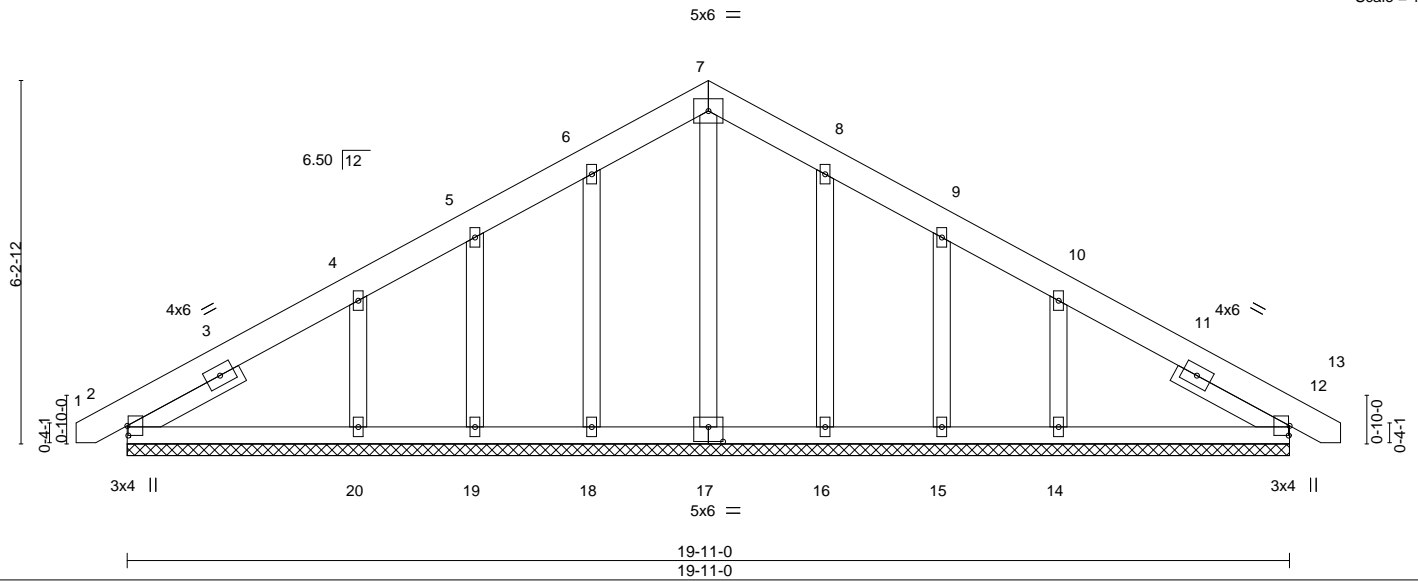


Plate Offsets (X,Y)--	[2:0-2-0,0-0-3], [12:0-2-0,0-0-3], [17:0-3-0,0-3-0]
-----------------------	---

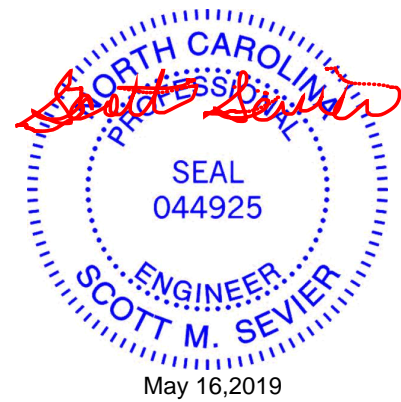
LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.08	in (loc) l/defl L/d	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.10	Vert(LL) 0.00 13 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.08	Vert(CT) 0.00 13 n/r 120		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S	Horz(CT) 0.00 12 n/a n/a		
				Weight: 132 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	
SLIDER Left 2x4 SP No.2 2-2-2, Right 2x4 SP No.2 2-2-2	

**REACTIONS.** All bearings 19-11-0.  
 (lb) - Max Horz 2=150(LC 9)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 12, 18, 19, 16, 15 except 20=184(LC 12), 14=174(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 2, 12, 17, 18, 19, 16, 15 except 20=308(LC 19), 14=299(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
**WEBS** 4-20=-281/222, 10-14=-281/212

- NOTES-** (10)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 12, 18, 19, 16, 15 except (jt=lb) 20=184, 14=174.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

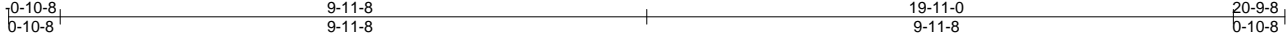


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107410
681099_Master_130	G02	COMMON	25	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:45 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-?ngdFs9NXrOWKPq1eR8blQ4YSovUXpZMEdR6L7zG\_pi



Scale = 1:39.1

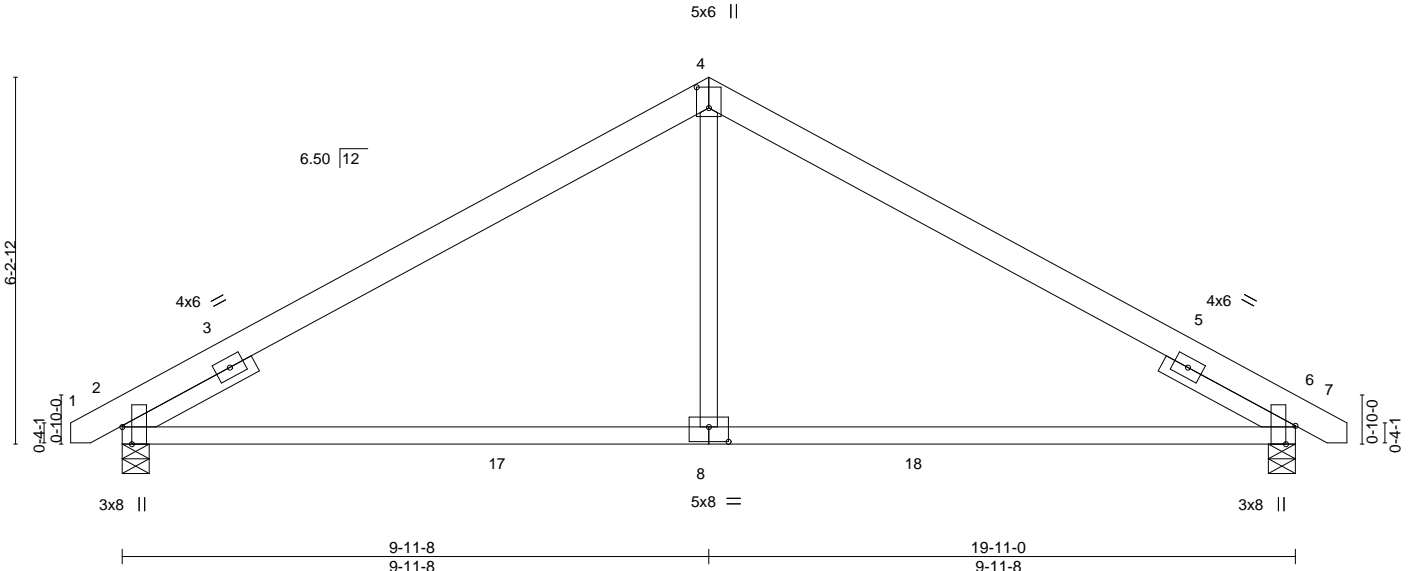


Plate Offsets (X,Y)--	[2:0-3-8,Edge], [4:0-4-4,0-2-8], [6:0-3-12,Edge], [8:0-4-0,0-3-0]
-----------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.51	Vert(LL)	-0.11	8-11	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.82	Vert(CT)	-0.25	8-11	>959		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.17	Horz(CT)	0.03	2	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.13	8-11	>999	Weight: 103 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x4 SP No.3  
 SLIDER Left 2x4 SP No.2 2-6-0, Right 2x4 SP No.2 2-6-0

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

**REACTIONS.** (lb/size) 2=839/0-5-8, 6=839/0-5-8  
 Max Horz 2=-148(LC 10)  
 Max Uplift 2=-228(LC 12), 6=-228(LC 13)  
 Max Grav 2=851(LC 19), 6=851(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-4=-976/343, 4-6=-976/343  
 BOT CHORD 2-8=-135/900, 6-8=-135/900  
 WEBS 4-8=0/452

- NOTES-** (7)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=228, 6=228.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

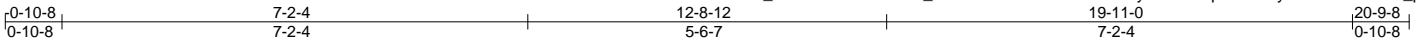


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107411
681099_Master_130	G03	GABLE	1	1		

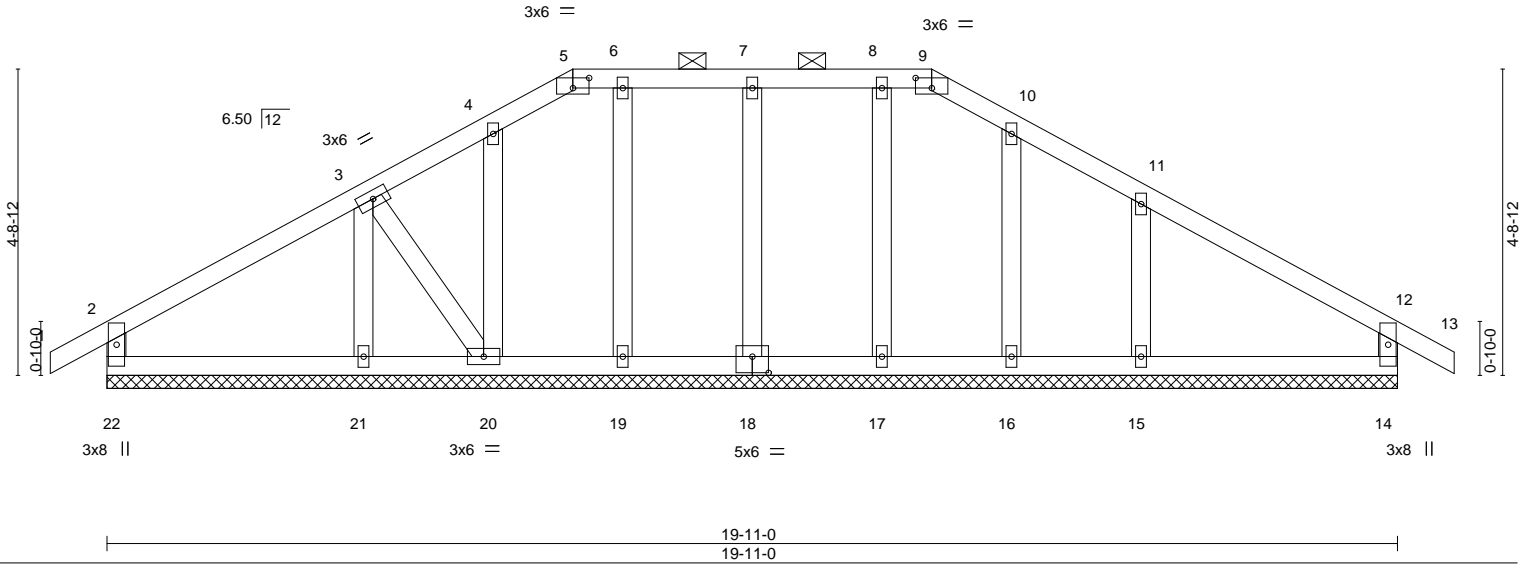
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:46 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-TzE?TCA?I9WNyYPCD8fqrddotPqyGIYWTHAftazG\_ph



Scale = 1:35.6



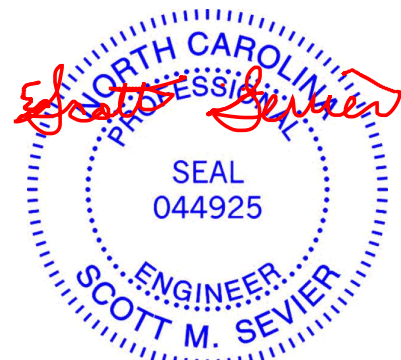
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.14	Vert(LL)	0.00	13	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.11	Vert(CT)	0.00	13	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.06	Horz(CT)	0.00	14	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 107 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 5-9.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.2 *Except* 3-20: 2x4 SP No.3	
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 19-11-0.  
 (lb) - Max Horz 22=-142(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 18, 19, 21, 17, 16, 14 except 22=-127(LC 12), 20=-167(LC 12), 15=-177(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 18, 19, 20, 21, 17, 16, 14 except 22=257(LC 1), 15=288(LC 20)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 11-15=-272/208

- NOTES-** (13)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18, 19, 21, 17, 16, 14 except (jt=lb) 22=127, 20=167, 15=177.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



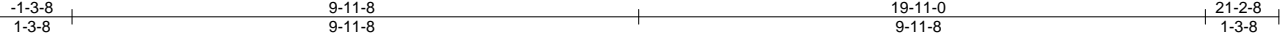
May 16, 2019

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107412
681099_Master_130	G04	COMMON	5	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:47 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-xAnNgYBe3SeEai\_PmrA3NrAuapaz?jyfhxwCQ0zG\_pg



Scale = 1:40.5

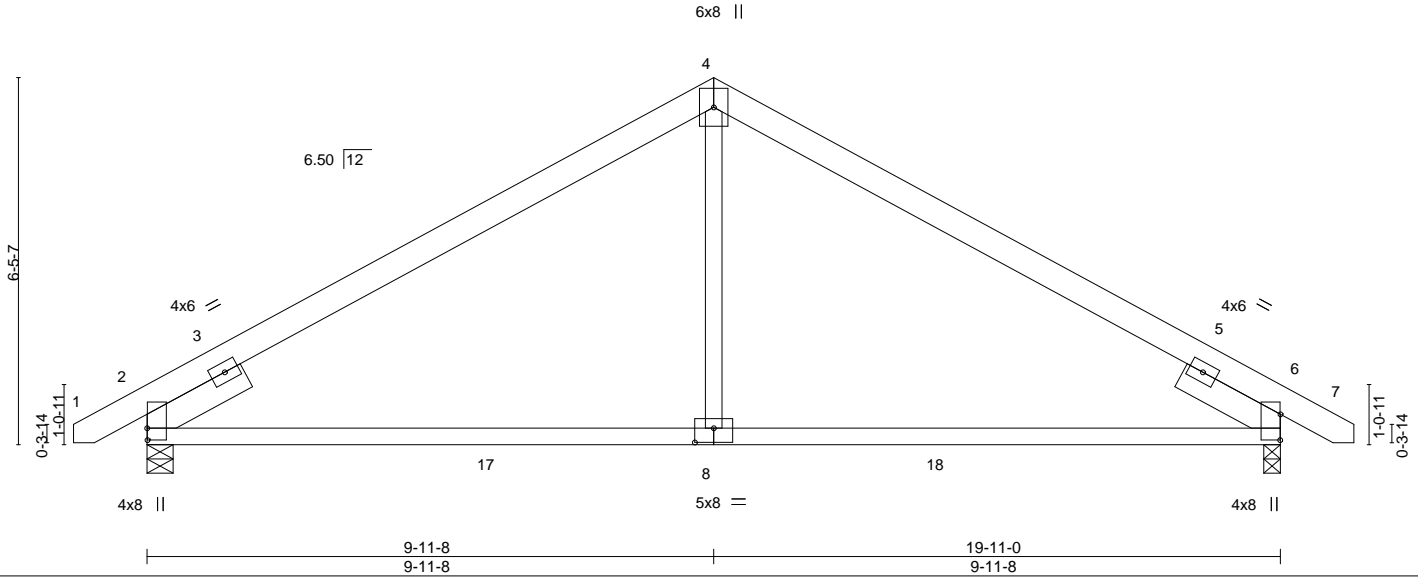


Plate Offsets (X,Y)--	[2:0-2-8,0-0-1], [6:0-5-7,0-0-1], [8:0-4-0,0-3-0]
-----------------------	---

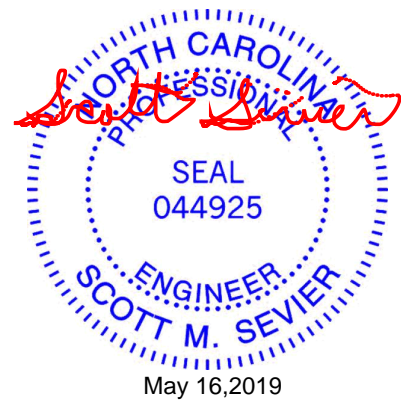
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.46	Vert(LL)	-0.11	8-11	>999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.82	Vert(CT)	-0.24	8-15	>999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.18	Horz(CT)	-0.04	2	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.11	8-11	>999	Weight: 108 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3	
SLIDER Left 2x6 SP No.2 1-11-12, Right 2x6 SP No.2 1-11-12	

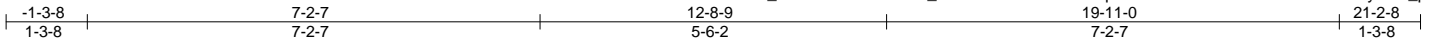
<b>REACTIONS.</b> (lb/size)	2=863/0-5-8, 6=863/0-3-8
	Max Horz 2=-154(LC 10)
	Max Uplift 2=-240(LC 12), 6=-240(LC 13)
	Max Grav 2=883(LC 19), 6=883(LC 20)

<b>FORCES.</b> (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1037/335, 4-6=-1037/335
BOT CHORD 2-8=-126/875, 6-8=-126/875
WEBS 4-8=0/468

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=240, 6=240.
  - 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.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107413
681099_Master_130	G05	GABLE	1	1		
Builders FirstSource, Sumter, SC - 29153,						8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:48 2019 Page 1
						ID:6U_sNXmsGM6hZXeeE_Ila6zQrSu-QMLluuBGqmm5BsZcJZilw2i76D6DKC7owbfmySzG_pf



Scale = 1:36.7

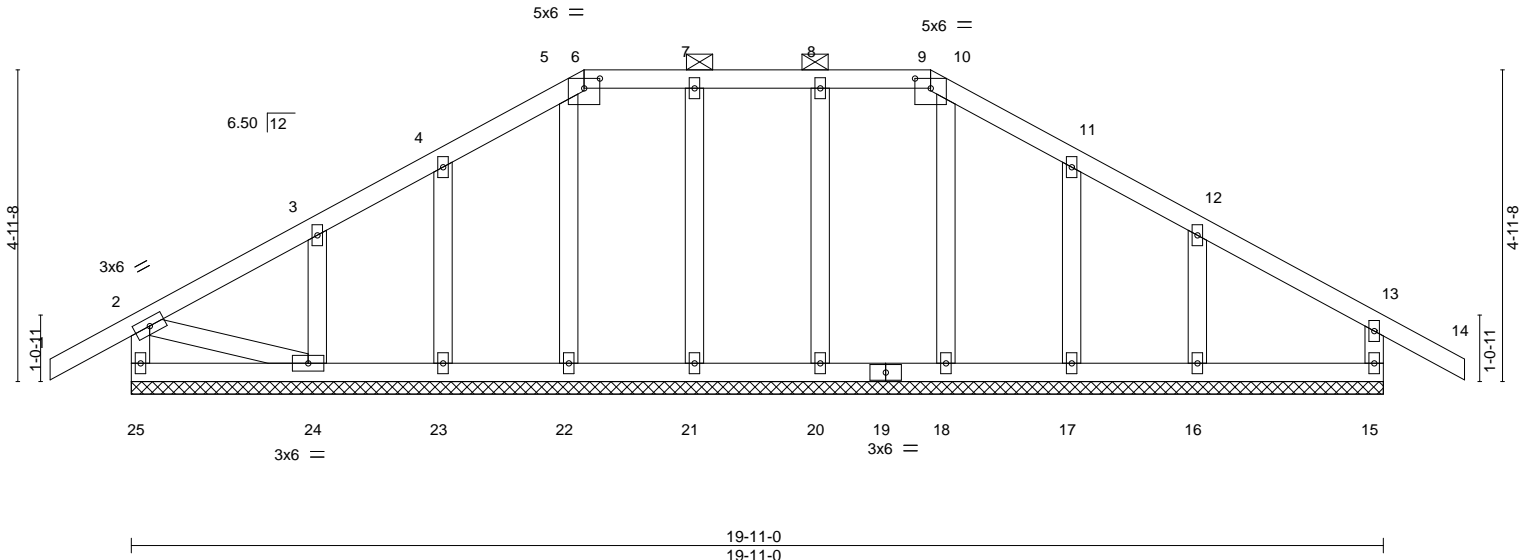


Plate Offsets (X,Y)--	[5:0-1-12,0-0-15], [6:0-3-0,0-1-14], [6:0-0-0,0-1-12], [9:0-3-0,0-1-14], [9:0-0-0,0-1-12], [10:0-1-12,0-0-15]
-----------------------	---

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.16	Vert(LL)	-0.01	14	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.05	Vert(CT)	-0.01	14	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.06	Horz(CT)	0.00	15	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						
								Weight: 114 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 6-9.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 2x4 SP No.3	
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 19-11-0.  
 (lb) - Max Horz 25=-159(LC 10)  
 Max Uplift All uplift 100 lb or less at joint(s) 25, 15, 21, 22, 23, 20, 17 except 24=-128(LC 12), 16=-121(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 25, 15, 21, 22, 23, 24, 20, 18, 17, 16

**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 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 25, 15, 21, 22, 23, 20, 17 except (jt=lb) 24=128, 16=121.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.





Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107414
681099_Master_130	J01	MONOPITCH	25	1		

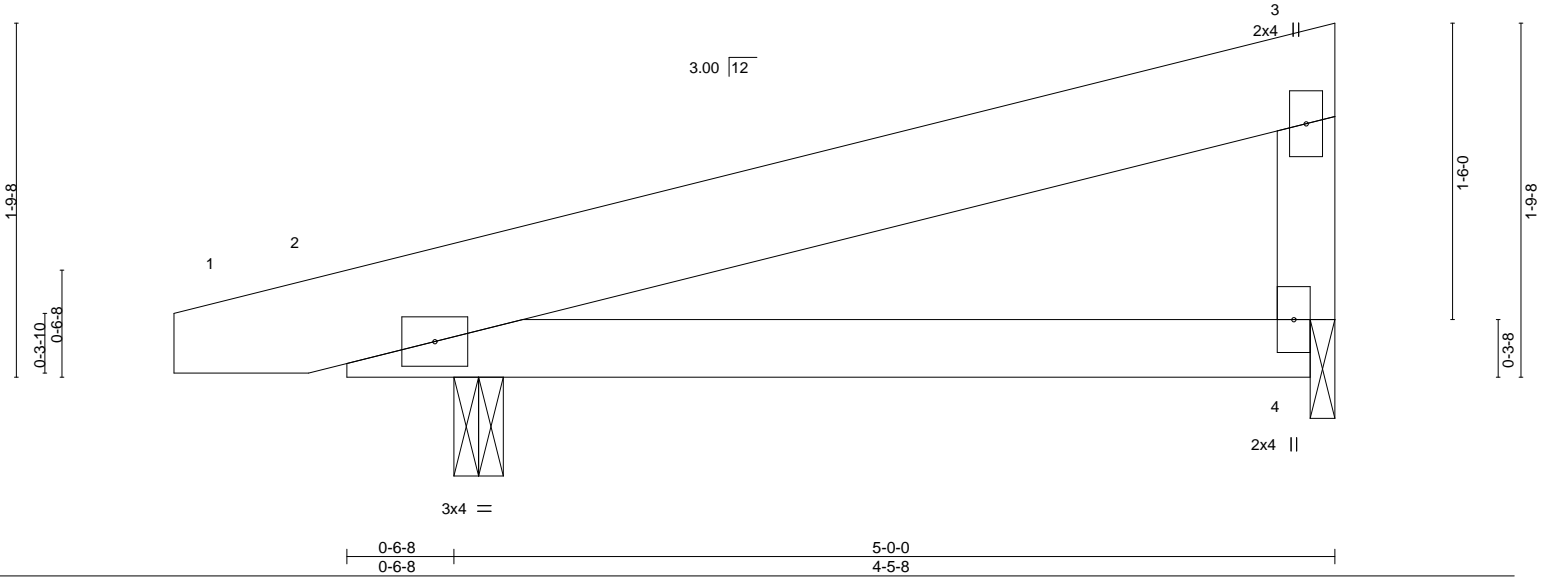
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:48 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-QMLluuBGqmm5BsZcZiIw2i7ID4JkC\_owbfmySzG\_pf



Scale = 1:11.7



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.15	Vert(LL)	0.03 4-9	>999	240	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.18	Vert(CT)	-0.02 4-9	>999	240		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	-0.00 2	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS					Weight: 23 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3	

**REACTIONS.** (lb/size) 2=257/0-3-0, 4=164/0-1-8  
 Max Horz 2=73(LC 8)  
 Max Uplift 2=-170(LC 8), 4=-118(LC 8)

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

- NOTES-** (8)
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left exposed; end vertical left exposed; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 4) Bearing at joint(s) 4 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 5) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 4.
  - 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=170, 4=118.
  - 7) 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.
  - 8) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107415
681099_Master_130	J02	MONOPITCH	28	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:49 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-uYv75ECub4uy08otGDXTGFHpdOyTfEY9FPJUvzG\_pe



Scale = 1:14.6

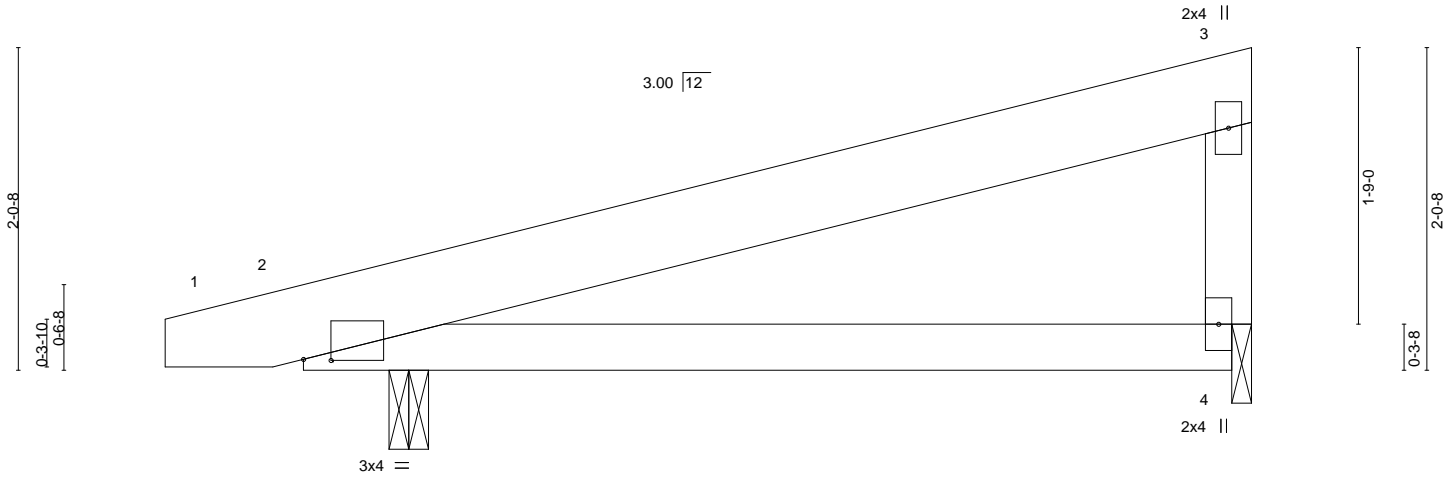


Plate Offsets (X,Y)-- [2:0-2-1,0-0-1]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.23	Vert(LL)	0.07	4-9	>992	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.28	Vert(CT)	-0.05	4-9	>999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	-0.00	2	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS					Weight: 27 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x4 SP No.3

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

**REACTIONS.** (lb/size) 2=295/0-3-0, 4=205/0-1-8  
 Max Horz 2=86(LC 8)  
 Max Uplift 2=-193(LC 8), 4=-148(LC 8)

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

- NOTES-** (8)
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left exposed; end vertical left exposed; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 4) Bearing at joint(s) 4 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 5) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 4.
  - 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=193, 4=148.
  - 7) 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.
  - 8) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

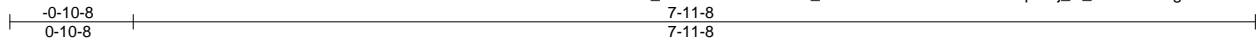


818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107416
681099_Master_130	J03	GABLE	7	1		
Builders FirstSource, Sumter, SC - 29153,						Job Reference (optional)

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:50 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lla6zQrSu-MITWJaDWMN0pRAj\_R\_km?ToJH1gcC6U5Nu8t0LzG\_pd



Scale = 1:16.3

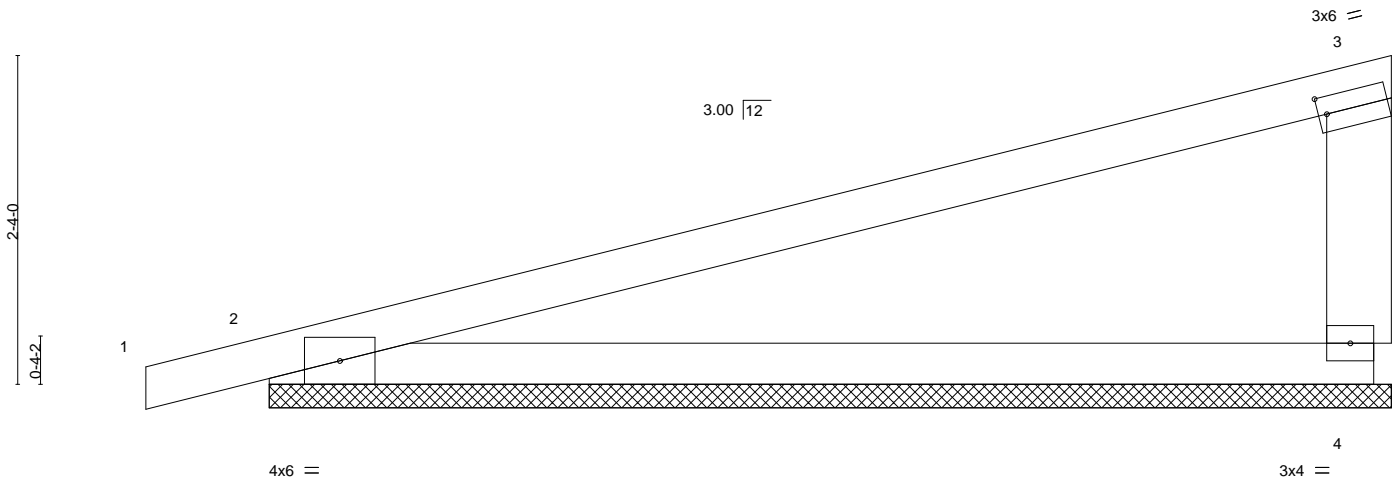


Plate Offsets (X,Y)--	[3:0-0-11,0-1-8]									
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>	
TCLL 20.0	Plate Grip DOL	1.15	TC 0.82	Vert(LL)	-0.02	1	n/r	120	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.57	Vert(CT)	0.04	1	n/r	120		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	4	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S						Weight: 29 lb	FT = 20%

<b>LUMBER-</b>		<b>BRACING-</b>	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 5-3-4 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x6 SP No.2		

**REACTIONS.** (lb/size) 4=306/7-11-8, 2=365/7-11-8  
 Max Horz 2=113(LC 11)  
 Max Uplift 4=114(LC 12), 2=156(LC 8)

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

- NOTES-** (8)
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 3) Gable requires continuous bottom chord bearing.
  - 4) Gable studs spaced at 2-0-0 oc.
  - 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 4=114, 2=156.
  - 8) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107417
681099_Master_130	J04	Monopitch	70	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:50 2019 Page 1  
 ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-MITWJaDWMN0pRAj\_R\_km?To091iBC4j5Nu8t0LzG\_pd



Scale = 1:16.9

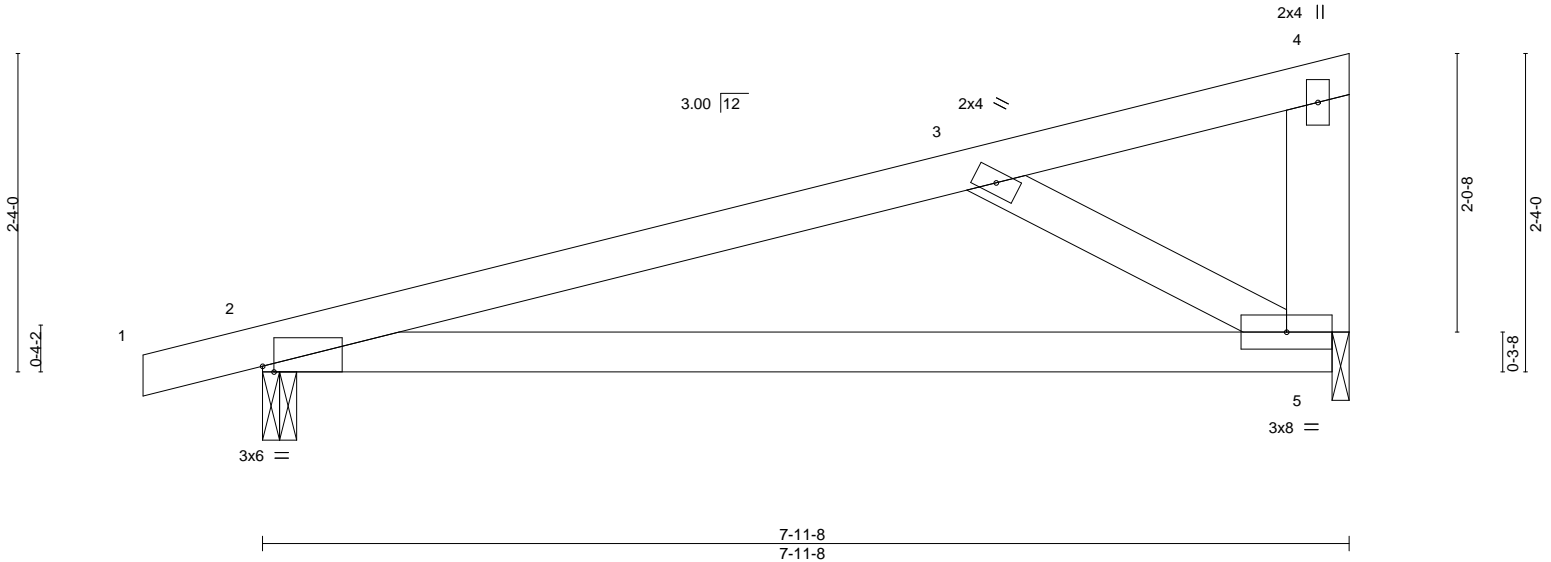


Plate Offsets (X,Y)--	[2:0-1-0,Edge]								
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.51	Vert(LL)	0.19	5-8	>493	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.41	Vert(CT)	-0.14	5-8	>676		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.18	Horz(CT)	-0.01	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS						
								Weight: 33 lb	FT = 20%

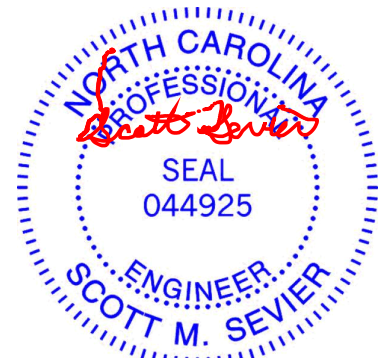
**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x6 SP No.2 \*Except\*  
 3-5: 2x4 SP No.3

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

**REACTIONS.** (lb/size) 2=365/0-3-0, 5=306/0-1-8  
 Max Horz 2=116(LC 8)  
 Max Uplift 2=-245(LC 8), 5=-215(LC 8)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-469/548  
 BOT CHORD 2-5=-635/444  
 WEBS 3-5=-450/596

- NOTES-** (8)
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 4) Bearing at joint(s) 5 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 5) Provide mechanical connection (by others) of truss to bearing plate at joint(s) 5.
  - 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (it=lb) 2=245, 5=215.
  - 7) 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.
  - 8) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107418
681099_Master_130	J05	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:51 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-qx1uWwE87h9g2KIA?hF?YhKTFQ?DxYkFcYuQZnzG\_pc

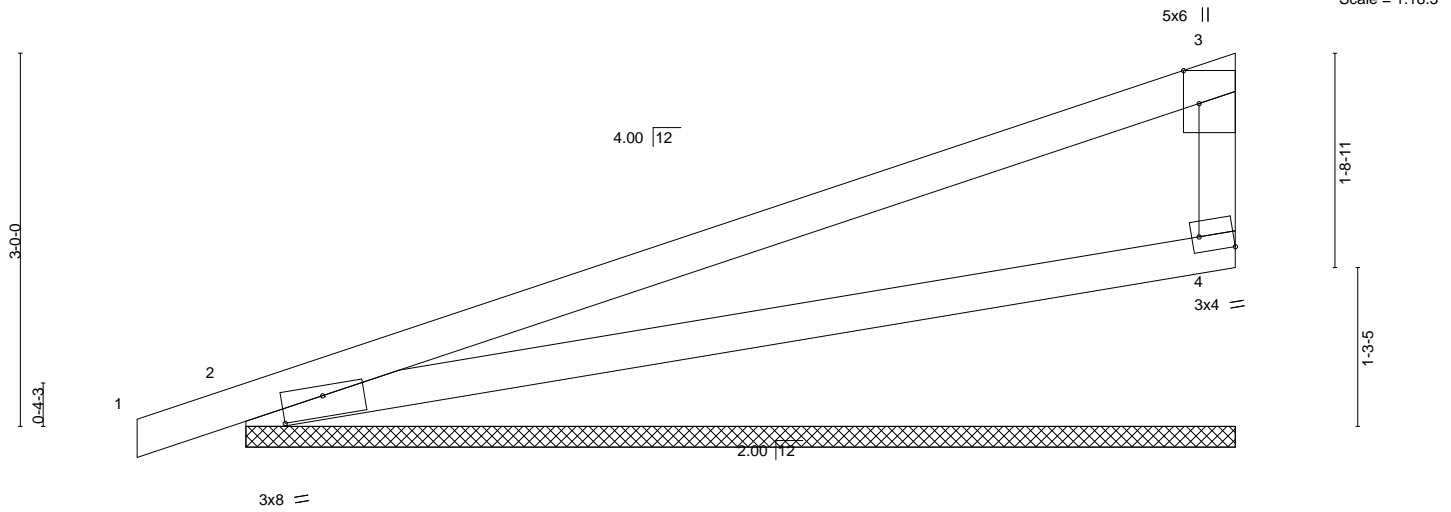
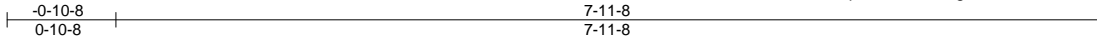


Plate Offsets (X,Y)--	[2:0-4-0-0-2-1], [3:0-3-3,Edge], [4:Edge,0-1-8]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.87	Vert(LL) -0.02 1 n/r 120	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.61	Vert(CT) 0.04 1 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.00 4 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S		Weight: 28 lb	FT = 20%

**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2  
 WEBS 2x4 SP No.3

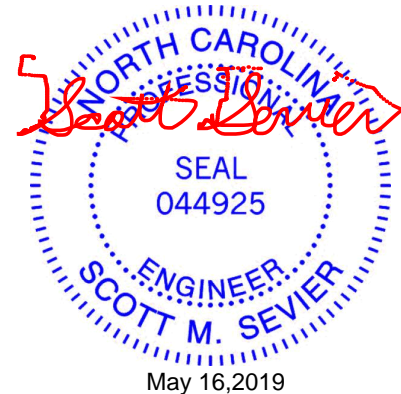
**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (lb/size) 4=310/7-11-8, 2=368/7-11-8  
 Max Horz 2=154(LC 8)  
 Max Uplift 4=133(LC 12), 2=139(LC 8)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-297/71

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 3) Gable requires continuous bottom chord bearing.
- 4) Gable studs spaced at 2-0-0 oc.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Bearing at joint(s) 4, 2 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) except (it=lb) 4=133, 2=139.
- 9) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 4.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107419
681099_Master_130	J06	Monopitch	10	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:52 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-17bGjGFmu?HXgTtNYPmE4utiqqMLguSOrCdz5DzG\_pb

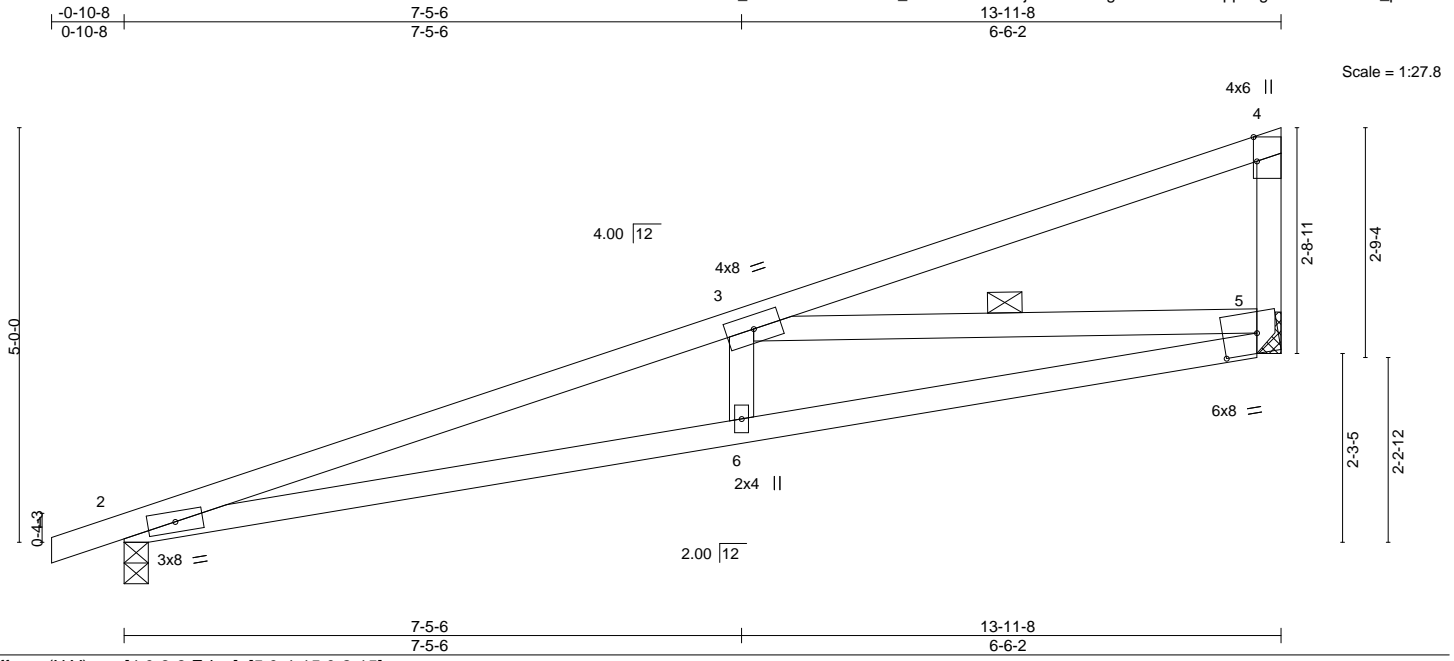


Plate Offsets (X,Y)--	[4:0-3-8,Edge], [5:0-4-15,0-2-15]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.62	Vert(LL) 0.34 6-9 >481 240	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.55	Vert(CT) -0.22 6-9 >760 240		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.48	Horz(CT) -0.05 5 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-AS		Weight: 58 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.1	TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD 2x4 SP No.1	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3 *Except*	WEBS 1 Row at midpt 3-5
3-5: 2x4 SP No.2	

**REACTIONS.** (lb/size) 2=607/0-3-8, 5=551/Mechanical  
 Max Horz 2=317(LC 8)  
 Max Uplift 2=-371(LC 8), 5=-411(LC 8)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-1755/2794  
 BOT CHORD 2-6=-3053/1668, 5-6=-2944/1664  
 WEBS 3-6=-598/288, 3-5=-1564/2735

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BC DL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 4) Refer to girder(s) for truss to truss connections.
  - 5) 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.
  - 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (it=lb) 2=371, 5=411.
  - 7) 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.

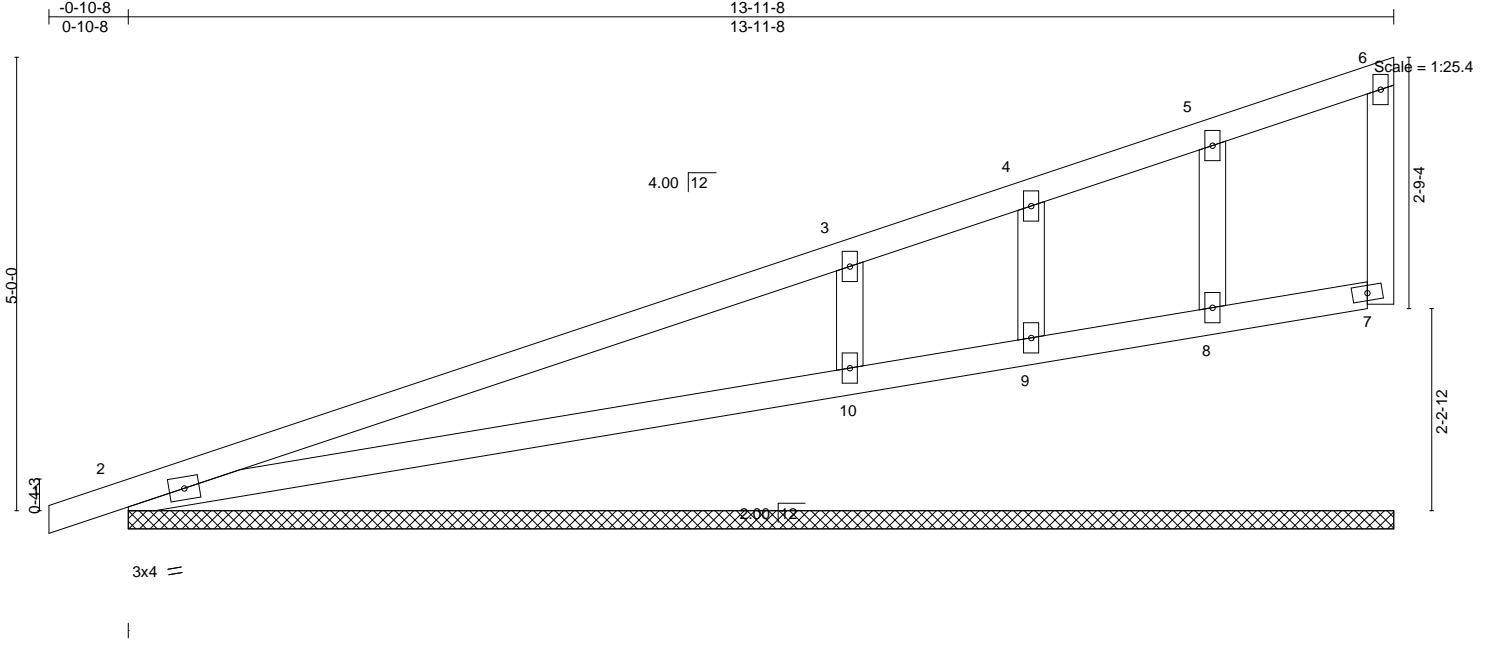


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107420
681099_Master_130	J07	GABLE	1	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:52 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-I7bGjGFmu?HXgTtNYPmE4utiEqOpgzkOrCdz5DzG\_pb



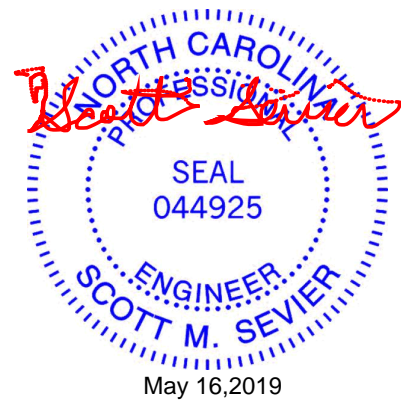
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.60	Vert(LL)	-0.02	1	n/r	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.40	Vert(CT)	0.03	1	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.14	Horz(CT)	-0.00	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S					Weight: 54 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.1	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.1	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 2x4 SP No.3	
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 13-11-8.  
 (lb) - Max Horz 2=259(LC 8)  
 Max Uplift All uplift 100 lb or less at joint(s) 2, 7 except 8=-105(LC 12), 9=-224(LC 1), 10=-327(LC 12)  
 Max Grav All reactions 250 lb or less at joint(s) 7, 9 except 2=309(LC 1), 8=263(LC 1), 10=766(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 3-10=-537/485

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 3) All plates are 2x4 MT20 unless otherwise indicated.
  - 4) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 2-0-0 oc.
  - 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 8) Bearing at joint(s) 2, 7, 8, 9, 10 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 7 except (jt=lb) 8=105, 9=224, 10=327.
  - 10) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 7, 8, 9, 10.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107421
681099_Master_130	J22	MONOPITCH	6	1		

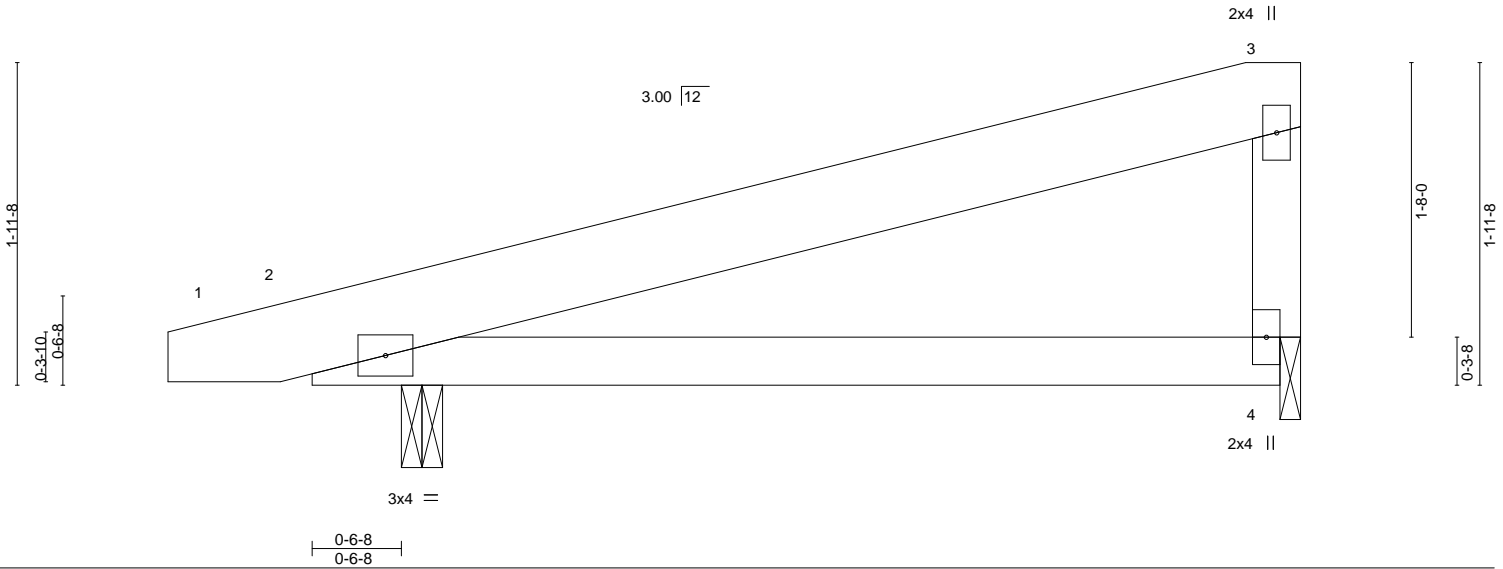
Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:53 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-mK9exbFOlPOldSZ66HTd6Qz6EmqPSEX4sNXdgzG\_pa



Scale = 1:14.0



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.21	Vert(LL)	-0.02 4-9	>999	360	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.22	Vert(CT)	-0.05 4-9	>999	240		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00 2	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-AS	Wind(LL)	0.02 4-9	>999	240	Weight: 27 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied, except end verticals.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied.
WEBS 2x4 SP No.3	

**REACTIONS.** (lb/size) 2=295/0-3-0, 4=205/0-1-8  
 Max Horz 2=90(LC 11)  
 Max Uplift 2=-120(LC 8), 4=-78(LC 12)

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

- NOTES-** (8)
- Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Bearing at joint(s) 4 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 at joint(s) 4.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4 except (it=lb) 2=120.
  - 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.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.

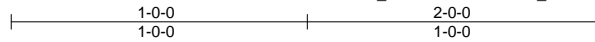


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107422
681099_Master_130	PB01	GABLE	16	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:54 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-EWj08xG1QcXFvn0lgqoiAJyBje918vThIW64A6zG\_pZ



Scale = 1:7.8

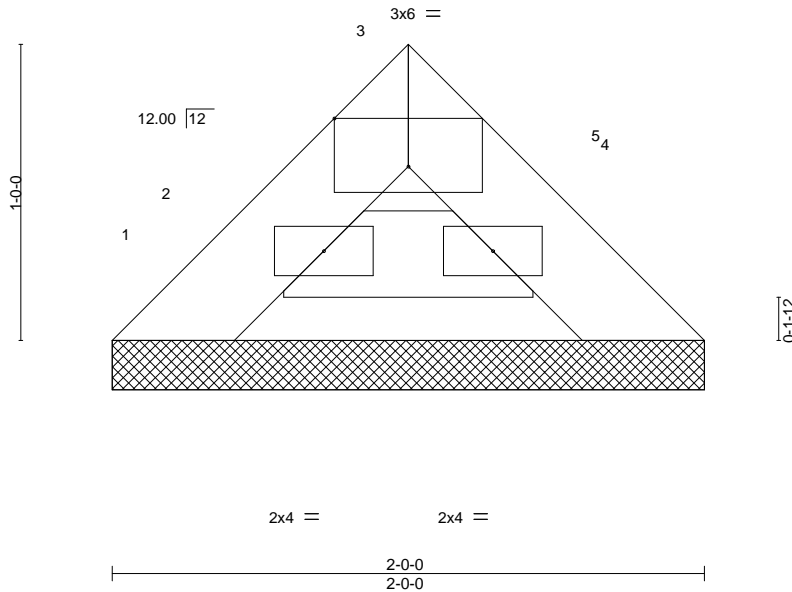


Plate Offsets (X,Y)--	[3:0-3:0,Edge]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.02	Vert(LL) n/a - n/a 999	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.01	Vert(CT) n/a - n/a 999		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.00 5 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S		Weight: 5 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2

**BRACING-**

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

**REACTIONS.** (lb/size) 1=-1/2-0-0, 5=45/2-0-0, 2=87/2-0-0  
 Max Horz 1=26(LC 11)  
 Max Uplift 1=-18(LC 8), 5=-13(LC 13), 2=-26(LC 12)  
 Max Grav 1=16(LC 11), 5=45(LC 1), 2=94(LC 19)

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

**NOTES-**

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) Gable requires continuous bottom chord bearing.
- 5) Gable studs spaced at 2-0-0 oc.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) 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.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 2.
- 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107423
681099_Master_130	PB02	GABLE	2	1		
Builders FirstSource, Sumter, SC - 29153,						Job Reference (optional)

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:55 2019 Page 1  
 ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-iiGPMHHfBwf5XxbyEXKxiXVMT2VXtMjqXAsdiYZg\_pY



Scale = 1:7.8

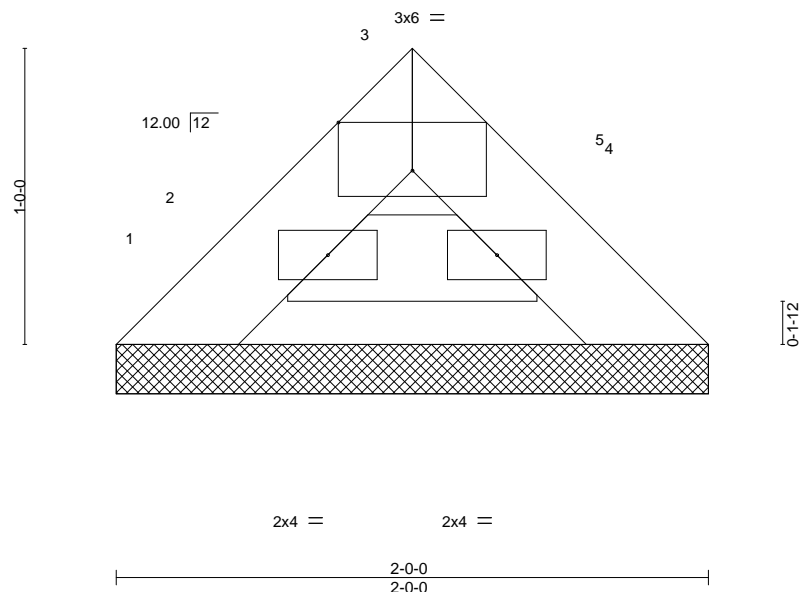


Plate Offsets (X,Y)--	[3:0-3-0,Edge]
-----------------------	----------------

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.02	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.01	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S					Weight: 5 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 2-0-0 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (lb/size) 1=-1/2-0-0, 5=45/2-0-0, 2=87/2-0-0  
 Max Horz 1=26(LC 11)  
 Max Uplift 1=-18(LC 8), 5=-13(LC 13), 2=-26(LC 12)  
 Max Grav 1=16(LC 11), 5=45(LC 1), 2=94(LC 19)

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

**NOTES-**

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TC DL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) Gable requires continuous bottom chord bearing.
- 5) Gable studs spaced at 2-0-0 oc.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) 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.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 2.
- 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
 Edenton, NC 27932

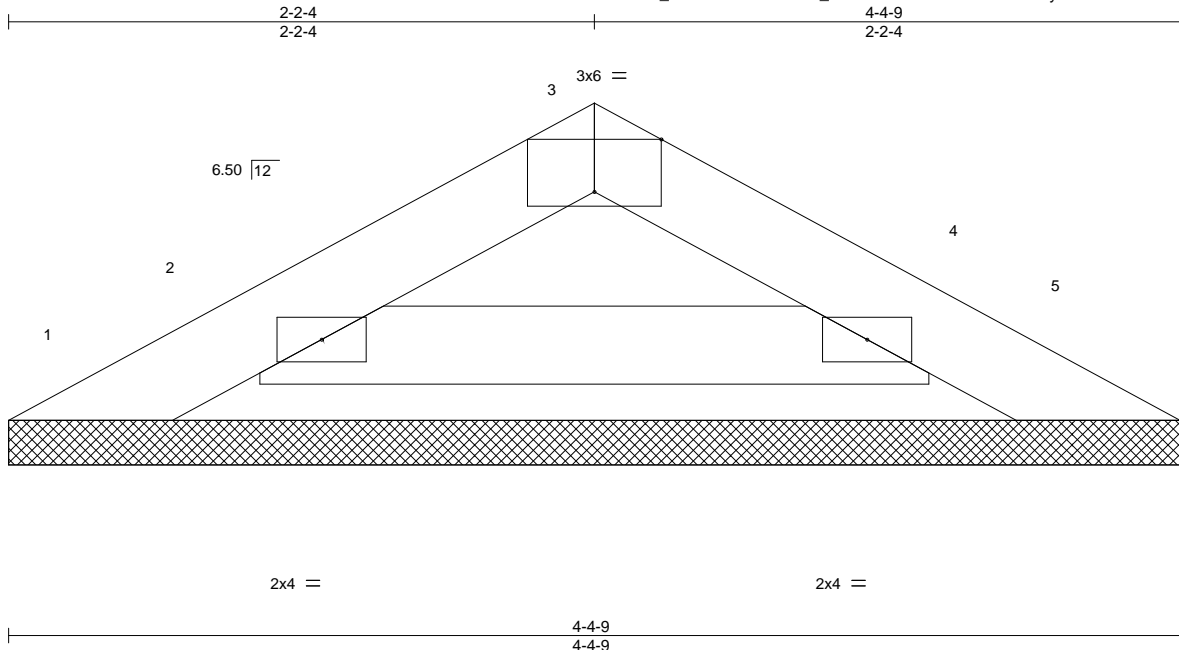


Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107424
681099_Master_130	PB03	GABLE	4	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:55 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-iiGPMHfBwf5XxbyEXKxiXVMP2UatMjqXAsdiYz\_gY



Scale = 1:8.6

Plate Offsets (X,Y)--	[3:0-3:0,Edge]						
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d
TCLL 20.0	Plate Grip DOL	1.15	TC 0.03	Vert(LL)	n/a	-	n/a
TCDL 10.0	Lumber DOL	1.15	BC 0.07	Vert(CT)	n/a	-	999
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P				
							<b>PLATES</b>
							MT20
							<b>GRIP</b>
							244/190
							Weight: 11 lb
							FT = 20%

**LUMBER-**  
 TOP CHORD 2x4 SP No.2  
 BOT CHORD 2x4 SP No.2

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 4-4-9 oc purlins.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 4-4-9.  
 (lb) - Max Horz 1=26(LC 11)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 2, 4  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

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

- NOTES-** (10)
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 4) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 2-0-0 oc.
  - 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 2, 4.
  - 9) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.
  - 10) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



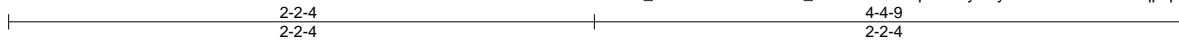
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107425
681099_Master_130	PB04	GABLE	78	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:56 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-BvqnZdlHyDny95A8nEraFk2X9Rqcpz\_mqbBE?zG\_pX



Scale = 1:8.6

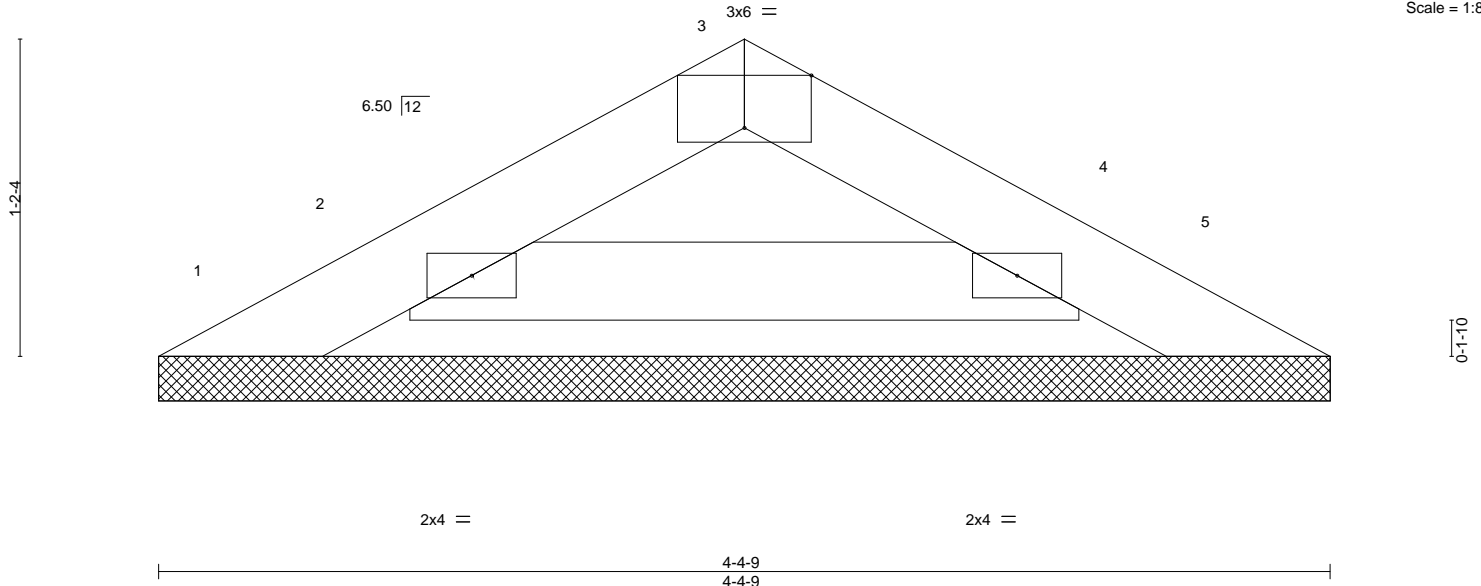


Plate Offsets (X,Y)--	[3:0-3:0,Edge]						
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d
TCLL 20.0	Plate Grip DOL	1.15	TC 0.03	Vert(LL)	n/a	-	n/a
TCDL 10.0	Lumber DOL	1.15	BC 0.07	Vert(CT)	n/a	-	n/a
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P				
							<b>PLATES</b>
							MT20
							<b>GRIP</b>
							244/190
							Weight: 11 lb
							FT = 20%

**LUMBER-**  
TOP CHORD 2x4 SP No.2  
BOT CHORD 2x4 SP No.2

**BRACING-**  
TOP CHORD Structural wood sheathing directly applied or 4-4-9 oc purlins.  
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 4-4-9.  
(lb) - Max Horz 1=26(LC 11)  
Max Uplift All uplift 100 lb or less at joint(s) 1, 2, 4  
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

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

- NOTES-** (10)
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - 4) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 2-0-0 oc.
  - 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 2, 4.
  - 9) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.
  - 10) This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107426
681099_Master_130	PB05	GABLE	4	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:57 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_lIa6zQrSu-f5O9nZlvjXvpmFIKLyMPnyavrA2LGD7?ULkmRzG\_pW

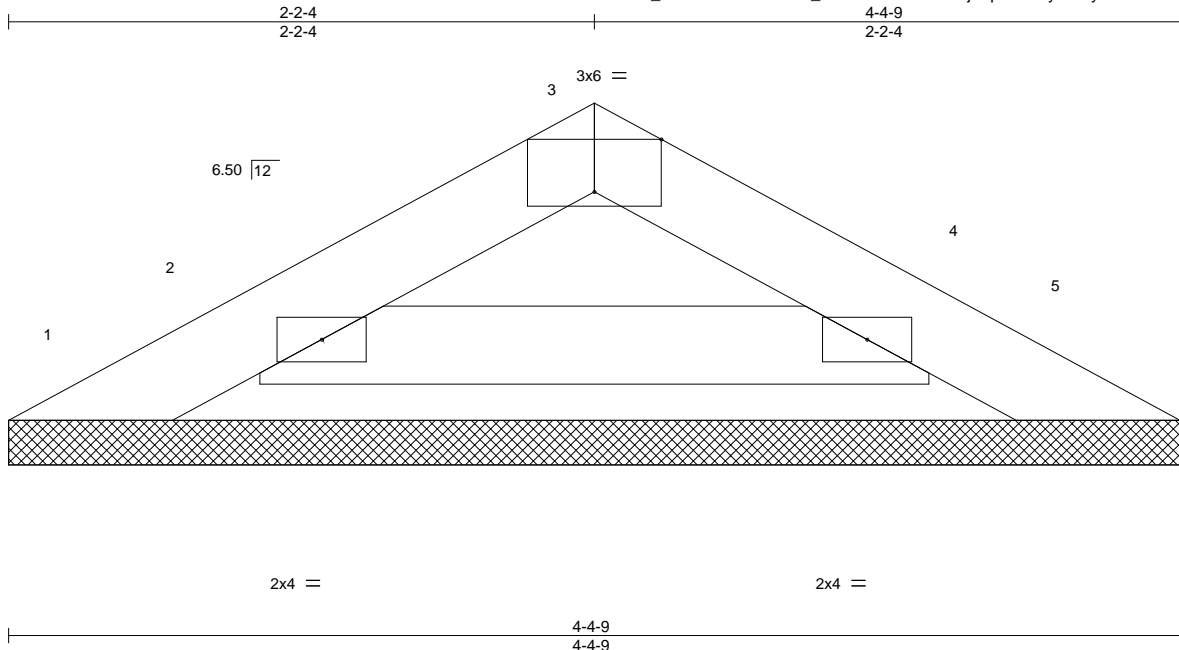


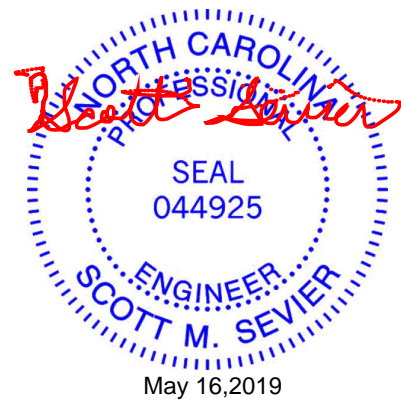
Plate Offsets (X,Y)--	[3:0-3-0,Edge]				
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.03	Vert(LL) n/a - n/a 999	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.07	Vert(CT) n/a - n/a 999		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.00 5 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-P		Weight: 11 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 4-4-9 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 4-4-9.  
 (lb) - Max Horz 1=26(LC 11)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 2, 4  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

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

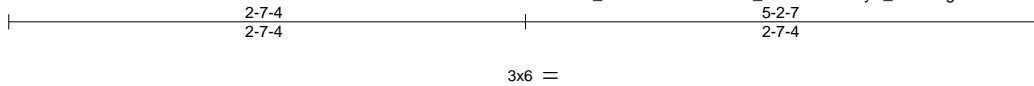
- NOTES-** (10)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 2, 4.
  - See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107427
681099_Master_130	PB06	GABLE	2	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:58 2019 Page 1  
ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-7HyX\_JJXTr1gOOKXvteK97tNFVH4jTHD84JtzG\_pV



Scale = 1:11.6

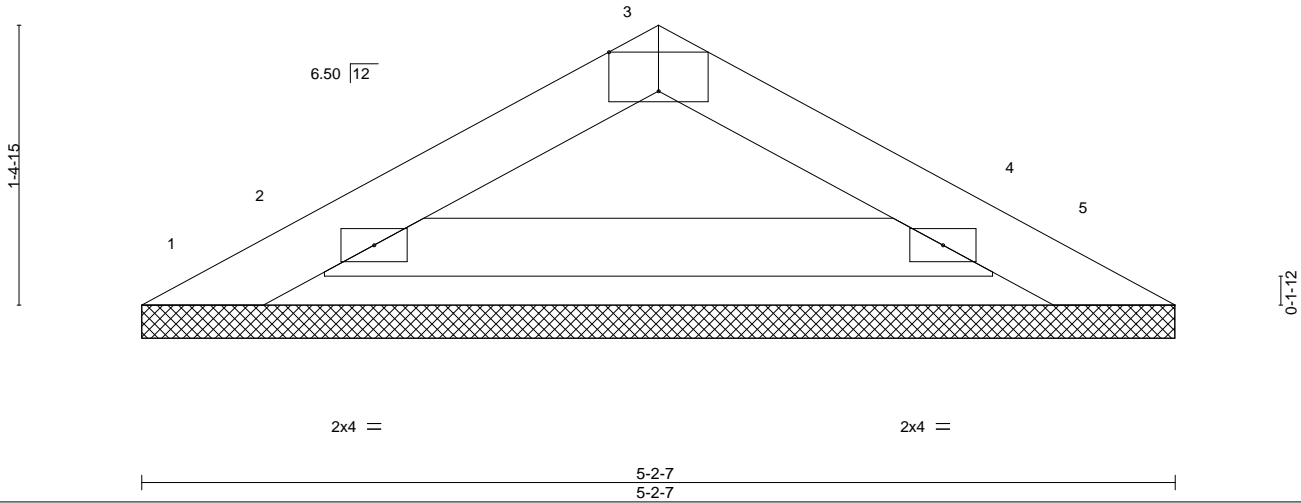


Plate Offsets (X,Y)--	[3:0-3-0,Edge]									
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in	(loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.04	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.14	Vert(CT)	n/a	-	n/a	999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P						Weight: 14 lb	FT = 20%

**LUMBER-**  
TOP CHORD 2x4 SP No.2  
BOT CHORD 2x4 SP No.2

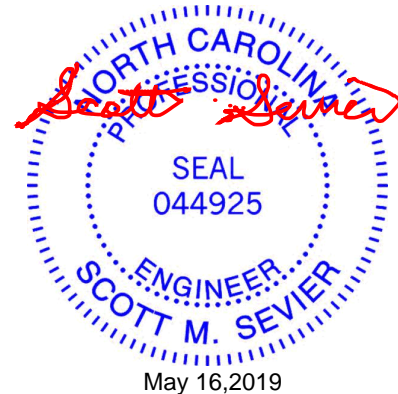
**BRACING-**  
TOP CHORD Structural wood sheathing directly applied or 5-2-7 oc purlins.  
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 5-2-7.  
(lb) - Max Horz 1=32(LC 10)  
Max Uplift All uplift 100 lb or less at joint(s) 1, 5, 2, 4  
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

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

**NOTES-**

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) Gable requires continuous bottom chord bearing.
- 5) Gable studs spaced at 2-0-0 oc.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 2, 4.
- 9) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107428
681099_Master_130	PB07	GABLE	46	1		

Builders FirstSource, Sumter, SC - 29153,

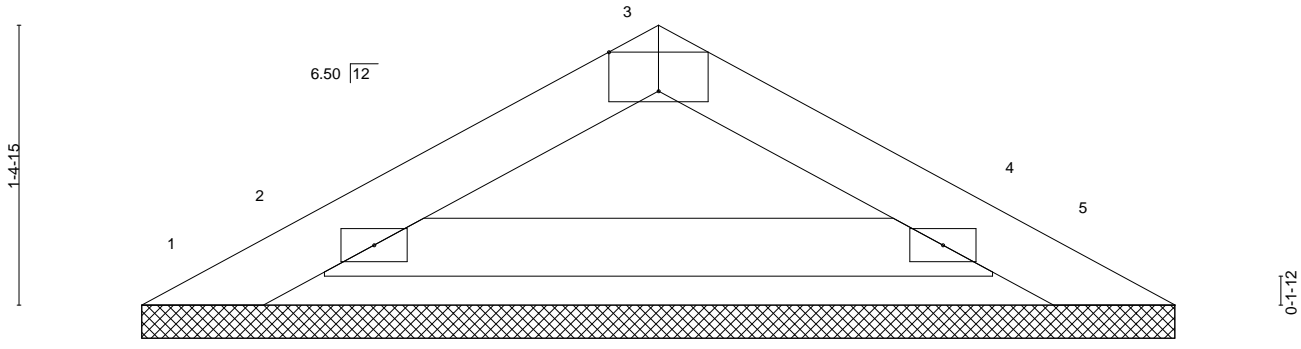
8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:39:59 2019 Page 1

ID:6U\_sNXmsGM6hZKeeE\_lIa6zQrSu-bUWvBfK9E89X0YvjTNOttNg26frWpAjQSoqrrJzG\_pU



3x6 =

Scale = 1:11.6



2x4 =

2x4 =

5-2-7  
5-2-7

Plate Offsets (X,Y)--	[3:0-3:0,Edge]								
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.04	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.14	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P						
								Weight: 14 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2  
BOT CHORD 2x4 SP No.2

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 5-2-7 oc purlins.  
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.**

All bearings 5-2-7.  
(lb) - Max Horz 1=32(LC 10)  
Max Uplift All uplift 100 lb or less at joint(s) 1, 5, 2, 4  
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

**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 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 2, 4.
- See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



818 Soundside Road  
Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107429
681099_Master_130	PB08	GABLE	2	1		

Builders FirstSource, Sumter, SC - 29153,

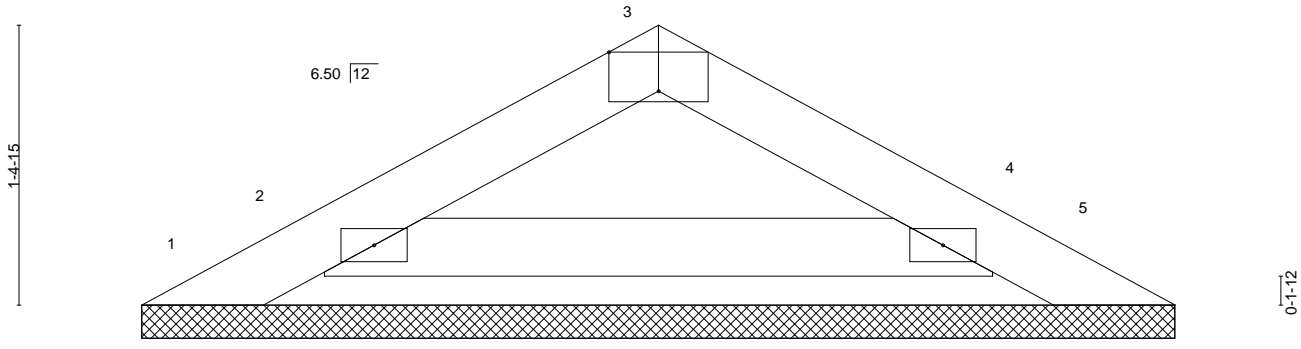
8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:40:00 2019 Page 1

ID:6U\_sNXmsGM6hZXeeE\_Ila6zQrSu-3g4HP?Ln?SHODiUv04v6PaCDs3AIYdyZhSZONmzG\_pT



3x6 =

Scale = 1:11.6



2x4 =

2x4 =

5-2-7  
5-2-7

Plate Offsets (X,Y)--	[3:0-3:0,Edge]								
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.04	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.14	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P					Weight: 14 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2  
BOT CHORD 2x4 SP No.2

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 5-2-7 oc purlins.  
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.**

All bearings 5-2-7.  
(lb) - Max Horz 1=32(LC 10)  
Max Uplift All uplift 100 lb or less at joint(s) 1, 5, 2, 4  
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 2, 4

**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 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; 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
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 2, 4.
- See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



May 16, 2019

**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 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, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.



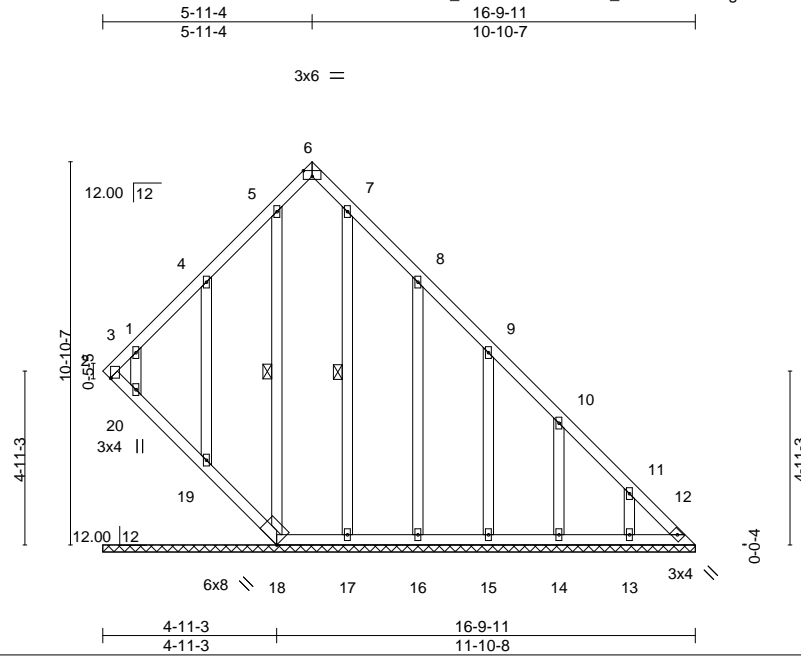
818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	H&H/Jackson/	137107430
681099_Master_130	V01	GABLE	6	1		

Builders FirstSource, Sumter, SC - 29153,

8.220 s Nov 16 2018 MiTek Industries, Inc. Thu May 16 07:40:01 2019 Page 1

ID:6U\_sNXmsGM6hZxeeE\_lla6zQrSu-XsegcKLQmIPFFs35aoQLYoINLSXWH1Hjv6JyvCzG\_pS



Scale = 1:65.4

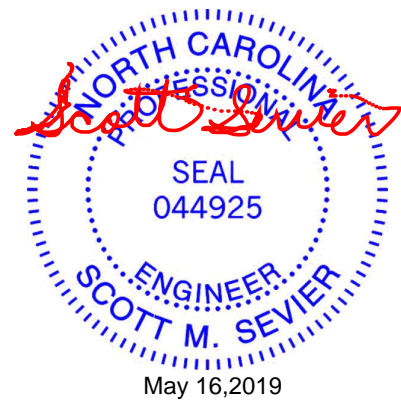
Plate Offsets (X,Y)--	[6:0-3-0,Edge]								
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.13	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.10	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.25	Horz(CT)	0.02	12	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S					Weight: 126 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 5-18, 7-17

**REACTIONS.** All bearings 16-9-11.  
 (lb) - Max Horz 1=-376(LC 13)  
 Max Uplift All uplift 100 lb or less at joint(s) 1 except 12=-115(LC 11), 2=-109(LC 10), 18=-332(LC 13), 19=-196(LC 12), 20=-225(LC 12), 16=-197(LC 13), 15=-154(LC 13), 14=-163(LC 13), 13=-156(LC 13)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 18, 19, 20, 17, 16, 15, 14, 13 except 12=371(LC 13), 2=447(LC 12)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-2=-291/404, 2-3=-375/234, 9-10=-262/183, 10-11=-412/302, 11-12=-547/410  
 BOT CHORD 2-20=-440/577, 19-20=-448/596, 18-19=-447/601, 17-18=-306/416, 16-17=-306/416, 15-16=-306/416, 14-15=-306/416, 13-14=-306/416, 12-13=-306/416

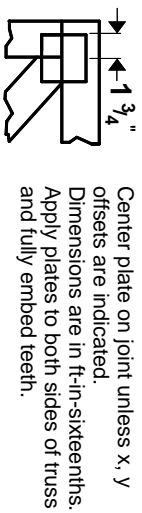
- NOTES-** (10)
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
  - Bearing at joint(s) 1, 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) 1 except (jt=lb) 12=115, 2=109, 18=332, 19=196, 20=225, 16=197, 15=154, 14=163, 13=156.
  - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 1, 2, 19, 20.
  - This manufactured truss is designed as an individual building component. The suitability and use of this component for any particular building is the responsibility of the building designer per ANSI TPI 1 as referenced by the building code.



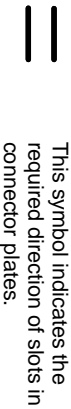


# Symbols

## PLATE LOCATION AND ORIENTATION



For 4 x 2 orientation, locate plates 0-  $\frac{1}{16}$ " from outside edge of truss.



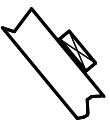
\* Plate location details available in **MITrak 20/20 software or upon request.**

## PLATE SIZE

4 X 4

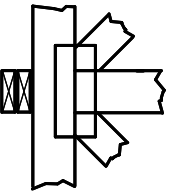
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

## LATERAL BRACING LOCATION



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

## BEARING

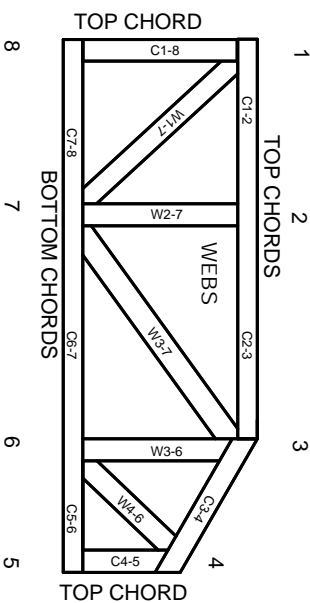


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

## Industry Standards:

ANSI/TPI 1: National Design Specification for Metal Plate Connected Wood Truss Construction.  
DSB-89: Design Standard for Bracing.  
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System



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

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

## PRODUCT CODE APPROVALS

ICC-ES Reports:

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

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

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

© 2012 MITTEK® All Rights Reserved



MITek Engineering Reference Sheet: MII-7473 rev. 10/03/2015



# General Safety Notes

**Failure to Follow Could Cause Property Damage or Personal Injury**

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