

RE: 25-0502-A

FFF-LOT #9 ROOF

Trenco 818 Soundside Rd Edenton, NC 27932

Site Information:

Customer: Project Name: 25-0502-A

Lot/Block: Model:
Address: Subdivision:
City: State:

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

Design Code: IRC2018/TPI2014 Design Program: MiTek 20/20 8.7

Wind Code: ASCE 7-16 Wind Speed: 130 mph Roof Load: 40.0 psf Floor Load: N/A psf

This package includes 37 individual, dated Truss Design Drawings and 0 Additional Drawings.

Seal#	Truss Name	Date	No.	Seal#	Truss Name	Date
166888031	CJ01	7/18/2024	21	166888051	T07A	7/18/2024
166888032	GE01	7/18/2024	22	166888052	V01	7/18/2024
166888033	HG01	7/18/2024	23	166888053	V02	7/18/2024
166888034	J01	7/18/2024	24	166888054	V03	7/18/2024
166888035	M01	7/18/2024	25	166888055	V04	7/18/2024
166888036	T01	7/18/2024	26	166888056	V05	7/18/2024
166888037	T01A	7/18/2024	27	166888057	V06	7/18/2024
166888038	T01B	7/18/2024	28	166888058	V07	7/18/2024
166888039	T01C	7/18/2024	29	166888059	V08	7/18/2024
166888040	T01GE	7/18/2024	30	166888060	V09	7/18/2024
166888041	T02	7/18/2024	31	166888061	V10	7/18/2024
166888042	T03	7/18/2024	32	166888062	V11	7/18/2024
166888043	T03GE	7/18/2024	33	166888063	V12	7/18/2024
166888044	T04G	7/18/2024	34	166888064	V13	7/18/2024
166888045	T04GE	7/18/2024	35	166888065	V14	7/18/2024
166888046	T05	7/18/2024	36	166888066	V15	7/18/2024
166888047	T05A	7/18/2024	37	166888067	V16	7/18/2024
166888048	T05GE	7/18/2024				
166888049	T06G	7/18/2024				
166888050	T07	7/18/2024				
	I66888031 I66888032 I66888033 I66888034 I66888035 I66888036 I66888039 I66888039 I66888040 I66888041 I66888042 I66888043 I66888044 I66888045 I66888046 I66888046 I66888048 I66888048	I66888031 CJ01 I66888032 GE01 I66888033 HG01 I66888034 J01 I66888035 M01 I66888036 T01 I66888037 T01A I66888038 T01B I66888039 T01C I66888040 T01GE I66888041 T02 I66888042 T03 I66888043 T03GE I66888044 T04G I66888045 T04GE I66888046 T05 I66888047 T05A I66888048 T05GE I66888049 T06G	I66888031 CJ01 7/18/2024 I66888032 GE01 7/18/2024 I66888033 HG01 7/18/2024 I66888034 J01 7/18/2024 I66888035 M01 7/18/2024 I66888036 T01 7/18/2024 I66888037 T01A 7/18/2024 I66888038 T01B 7/18/2024 I66888039 T01C 7/18/2024 I66888040 T01GE 7/18/2024 I66888041 T02 7/18/2024 I66888042 T03 7/18/2024 I66888043 T03GE 7/18/2024 I66888044 T04G 7/18/2024 I66888045 T04GE 7/18/2024 I66888046 T05 7/18/2024 I66888048 T05GE 7/18/2024 I66888049 T06G 7/18/2024	I66888031 CJ01 7/18/2024 21 I66888032 GE01 7/18/2024 22 I66888033 HG01 7/18/2024 23 I66888034 J01 7/18/2024 24 I66888035 M01 7/18/2024 25 I66888036 T01 7/18/2024 26 I66888037 T01A 7/18/2024 27 I66888038 T01B 7/18/2024 28 I66888039 T01C 7/18/2024 29 I66888040 T01GE 7/18/2024 30 I66888041 T02 7/18/2024 31 I66888042 T03 7/18/2024 32 I66888043 T03GE 7/18/2024 34 I66888044 T04G 7/18/2024 35 I66888045 T04GE 7/18/2024 36 I66888047 T05A 7/18/2024 37 I66888048 T05GE 7/18/2024 37 I66888049 T06G 7/18/2024	I66888031	I66888031

The truss drawing(s) referenced above have been prepared by Truss Engineering Co. under my direct supervision

based on the parameters provided by Riverside Roof Truss.

Truss Design Engineer's Name: Gilbert, Eric My license renewal date for the state of North Carolina is December 31, 2025

North Carolina COA: C-0844

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 TRENCO. Any project specific information included is for TRENCO customers file reference purpose only, and was not taken into account in the preparation of these designs. 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.



July 18, 2024

Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888031 25-0502-A CJ01 DIAGONAL HIP GIRDER 2 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:20 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-jgf9Gdp8OknnSuLyl4tWeeq3j5yi_6udwZUQRZyxXsz 5-7-2 5-7-2 1-3-9 Scale = 1:17.4 2x4 || 3.54 12 NAILED NAILED 8 3x6 = 9 6 NAILED NAILED 4x4 = 5LOADING (psf) SPACING-2-0-0 DEFL. L/d **PLATES GRIP** CSI. (loc) I/defl TCLL (roof) 20.0 Plate Grip DOL 1.15 Vert(LL) -0.01 240 244/190 TC 0.55 6-7 >999 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.15 Vert(CT) -0.02 6-7 >999 180 TCDI 10.0 Rep Stress Incr NO WB 0.02 Horz(CT) -0.00 6 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-MF Weight: 35 lb FT = 20% **BCDL** 10.0 LUMBER-BRACING-TOP CHORD 2x4 SP No.2 TOP CHORD Structural wood sheathing directly applied or 5-7-2 oc purlins, **BOT CHORD** except end verticals.

BOT CHORD

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

2x6 SP No.2

2x4 SP No.3 *Except* **WEBS**

2-7: 2x6 SP No.2

(size) 7=0-5-5, 6=Mechanical

Max Horz 7=83(LC 9)

Max Uplift 7=-84(LC 12), 6=-31(LC 12) Max Grav 7=311(LC 2), 6=220(LC 17)

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

TOP CHORD 2-7=-260/94

NOTES-

REACTIONS.

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 10) "NAILED" indicates 3-10d (0.148"x3") or 2-12d (0.148"x3.25") toe-nails per NDS guidlines.
- 11) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard

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

Vert: 1-2=-43, 2-3=-43, 3-4=-43, 5-7=-20



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 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 and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888032 25-0502-A GE01 **GABLE** Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:20 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-jgf9Gdp8OknnSuLyl4tWeeq635yQ_56dwZUQRZyxXsz <u>10-0-0</u> 9-1-0 0-11-0 4-6-8 4-6-8 0-11-0 Scale = 1:25.1 4x4 = 3 7 00 12 2x4 II 2x4 || 3-9-10 3x8 < 3x8 // 14 13 1-1-13 1-1-13 · 2x4 || 7 3x10 = 2x4 2x4 || 9-1-0 Plate Offsets (X,Y)-- [2:0-3-3,0-1-8], [4:0-3-3,0-1-8] LOADING (psf) SPACING-2-0-0 CSI. **DEFL** in (loc) I/defl L/d **PLATES** GRIP TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.33 Vert(LL) -0.01 6-7 >999 240 MT20 244/190 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 BC 0.17 Vert(CT) -0.02 6-7 >999 180 TCDL 10.0 Rep Stress Incr YES WB 0.07 Horz(CT) 0.00 6 n/a n/a **BCLL** 0.0 * Code IRC2018/TPI2014 FT = 20% Matrix-MS Weight: 57 lb BCDL 10.0 LUMBER-BRACING-TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

BOT CHORD

except end verticals.

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

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

WEBS 2x4 SP No.3 **OTHERS** 2x4 SP No.3

REACTIONS. (size) 8=0-3-0, 6=0-3-0 Max Horz 8=-93(LC 14)

Max Uplift 8=-55(LC 16), 6=-55(LC 16) Max Grav 8=415(LC 2), 6=415(LC 2)

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

TOP CHORD 2-3=-346/109, 3-4=-346/109, 2-8=-375/173, 4-6=-375/173

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 4-6-8, Exterior(2R) 4-6-8 to 7-6-8 , Interior(1) 7-6-8 to 10-0-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) Gable studs spaced at 2-0-0 oc.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 6.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty Ply FFF-LOT #9 ROOF 166888033 25-0502-A HG01 HIP GIRDER Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:21 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541,

4-0-0

ID:tdHS5IWyLng?jaR9E1eBtqyly9_-CtDYTzqm92we32w9snOIAsNKNVIJjWLm8DEz_?yxXsy 12-11-0

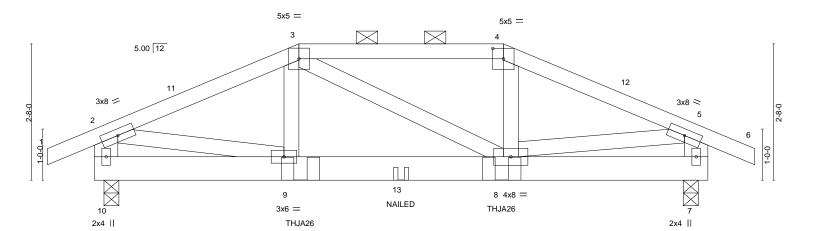
4-0-0

11-9-12

0-11-0

12-0_r0

Scale = 1:22.5



0-2-4	3-9-12	4-0-0		1		3-9-12	0-2-4	
Plate Offsets (X,Y) [4:0-2-8,	0-2-7]							
CADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 16.5/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr NO Code IRC2018/TPI2014	CSI. TC 0.17 BC 0.19 WB 0.20 Matrix-MS	Vert(CT) -0	in (loc) .01 8-9 .02 8-9 .00 7	l/defl >999 >999 n/a	L/d 240 180 n/a	PLATES MT20 Weight: 148 lb	GRIP 244/190 FT = 20%

8-0-0

LUMBER-BRACING-

TOP CHORD 2x4 SP No.2 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, **BOT CHORD** 2x6 SP No.2 except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4. 2x4 SP No.3 *Except* **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing. **WEBS**

REACTIONS. (size) 10=0-3-8, 7=0-3-8

Max Horz 10=49(LC 11)

2-10,5-7: 2x6 SP No.2

Max Uplift 10=-160(LC 12), 7=-158(LC 12) Max Grav 10=910(LC 35), 7=901(LC 35)

4-0-0

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 2-3=-1229/218, 3-4=-1092/211, 4-5=-1224/217, 2-10=-860/177, 5-7=-849/175

4-0-0

BOT CHORD 8-9=-170/1079

0_r2-4

0-11-0

WEBS 3-9=-48/285, 4-8=-54/310, 2-9=-160/956, 5-8=-160/943

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

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

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

3) Unbalanced roof live loads have been considered for this design.

- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=16.5 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10, Lu=50-0-0 Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.

6) Unbalanced snow loads have been considered for this design.

7) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.

8) Provide adequate drainage to prevent water ponding.

- 9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 10) * 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.
- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 10=160, 7=158,
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

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



July 18,2024

Job	Truss	Truss Type	Qty	Ply	FFF-LOT #9 ROOF	
						166888033
25-0502-A	HG01	HIP GIRDER	1	2	Job Reference (optional)	

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:21 2024 Page 2 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-CtDYTzqm92we32w9snOlAsNKNVIJjWLm8DEz_?yxXsy

- 14) Use Simpson Strong-Tie THJA26 (THJA26 on 2 ply, Right Hand Hip) or equivalent at 4-0-6 from the left end to connect truss(es) to back face of bottom chord, skewed 0.0 deg.to the right, sloping 0.0 deg. down.
- 15) Use Simpson Strong-Tie THJA26 (THJA26 on 2 ply, Left Hand Hip) or equivalent at 7-11-10 from the left end to connect truss(es) to back face of bottom chord, skewed 0.0 deg.to the right, sloping 0.0 deg. down.
- 16) Fill all nail holes where hanger is in contact with lumber.
- 17) "NAILED" indicates 3-10d (0.148"x3") or 3-12d (0.148"x3.25") toe-nails per NDS guidlines.

LOAD CASE(S) Standard

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

Vert: 1-2=-43, 2-3=-43, 3-4=-53, 4-5=-43, 5-6=-43, 7-10=-20 Concentrated Loads (lb)

Vert: 9=-316(B) 8=-316(B) 13=-124(B)



818 Soundside Road Edenton, NC 27932

Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888034 25-0502-A J01 Jack-Open Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:22 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-g3nwhJrOwL2VhCVLQVv_j3vWcvg0S0EwNtzWWSyxXsx

Structural wood sheathing directly applied or 1-11-11 oc purlins,

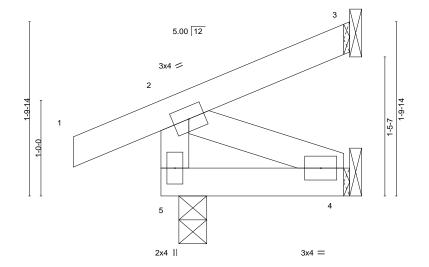
Rigid ceiling directly applied or 10-0-0 oc bracing.

except end verticals.



Scale: 1"=1

FT = 20%



				0-2-4	<i>i</i>	1-9-7		'				
Snow (Pf/Pg) 11.6/15 TCDL 1	0.0 5.0 0.0 0.0 *	SPACING- Plate Grip DOL Lumber DOL Rep Stress Incr	2-0-0 1.15 1.15 YES	CSI. TC BC WB	0.08 0.03 0.03	DEFL. Vert(LL) Vert(CT) Horz(CT)	in -0.00 -0.00 -0.00	(loc) 5 4-5 3	l/defl >999 >999 n/a	L/d 240 180 n/a	PLATES MT20	GRIP 244/190
	0.0	Code IRC2018/TF	PI2014	Matri	x-MP						Weight: 11 lb	FT = 2

0-2-4

1-11-11

BRACING-

TOP CHORD

BOT CHORD

BCDL LUMBER-

REACTIONS.

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

10.0

WEBS 2x4 SP No.3

> 3=Mechanical, 5=0-3-8, 4=Mechanical (size) Max Horz 5=58(LC 16)

Max Uplift 3=-9(LC 13), 5=-24(LC 16), 4=-11(LC 16) Max Grav 3=36(LC 21), 5=155(LC 21), 4=35(LC 7)

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

NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 5, 4.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888035 25-0502-A M01 MONOPITCH 3

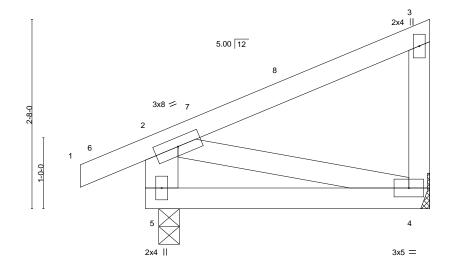
Riverside Roof Truss, LLC,

Danville, Va - 24541,

Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:22 2024 Page 1 ID:tdHS5iWyLng?jaR9E1eBtqyly9_-g3nwhJrOwL2VhCVLQVv_j3vUHve5S0xwNtzWWSyxXsx

4-0-0 0-11-0 4-0-0

Scale = 1:16.2



		0-2-4		4-0-0			
		0-2-4		3-9-12		1	
LOADING (psf)	ODAOINO	2.0.0	CCI	DEEL	: (I)	1/4.41	

SPACING-2-0-0 DEFL. I/defI L/d CSI. (loc) TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.22 Vert(LL) -0.01 240 4-5 >999 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.16 Vert(CT) -0.02 4-5 >999 180 TCDI 10.0 Rep Stress Incr YES WB 0.05 Horz(CT) -0.00 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-MF **BCDL** 10.0

PLATES GRIP 244/190 MT20

Weight: 23 lb FT = 20%

LUMBER-TOP CHORD **BOT CHORD**

WEBS

2x4 SP No.2 2x4 SP No.2 2x4 SP No.3 *Except*

2-5: 2x6 SP No.2

BRACING-TOP CHORD

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

except end verticals.

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

REACTIONS.

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

Max Horz 5=86(LC 15)

Max Uplift 5=-43(LC 16), 4=-19(LC 13) Max Grav 5=229(LC 21), 4=144(LC 21)

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

NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 3-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 4.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888036 25-0502-A T01 COMMON 2 Job Reference (optional)

Riverside Roof Truss, LLC, Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:23 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-8FLlufs0hfAMJM4XzCQDFHSb8lv1BFU3cXj42uyxXsw

Structural wood sheathing directly applied or 5-4-13 oc purlins.

7-16

6-18, 8-16

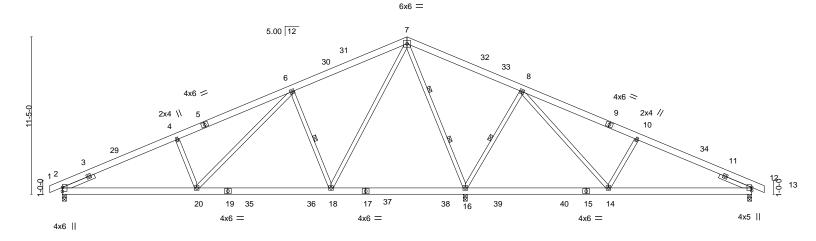
Rigid ceiling directly applied or 6-0-0 oc bracing.

1 Row at midpt

2 Rows at 1/3 pts

33-4-0 41-8-0 50-0-0 -0-11-0 0-11-0 8-4-0 8-4-0 8-4-0 8-4-0 8-4-0 8-4-0 0-11-0

Scale = 1:83.6



	9-8-15	i	19-5-13	1	29-2-12	į.		39-7-	6	1	50-0-0	
	9-8-15		9-8-15	ı	9-8-15	ı		10-4-1	10	- 1	10-4-10	<u>'</u>
LOADIN TCLL (ro Snow (P TCDL BCLL BCDL	oof) 20.0	SPACING- Plate Grip DOL Lumber DOL Rep Stress Inc Code IRC2018	1.15 r YES	CSI. TC BC WB Matr	0.47 0.49 0.92 ix-MS	DEFL. Vert(LL Vert(CT Horz(C) -0.21	18-20 18-20	l/defl >999 >999 n/a	L/d 240 180 n/a	PLATES MT20 Weight: 354 lb	GRIP 244/190 FT = 20%

BRACING-

WEBS

TOP CHORD

BOT CHORD

LUMBER-

TOP CHORD 2x6 SP No.2 BOT CHORD 2x6 SP No.2 2x4 SP No.3

WEBS **SLIDER** Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

REACTIONS.

(size) 2=0-3-8, 16=0-3-8, 12=0-3-8

Max Horz 2=190(LC 15)

Max Uplift 2=-90(LC 16), 16=-144(LC 16), 12=-66(LC 16) Max Grav 2=1167(LC 28), 16=2859(LC 30), 12=691(LC 29)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 2-4=-1806/182, 4-6=-1698/226, 6-7=-713/220, 7-8=0/853, 8-10=-622/140,

10-12=-766/119

BOT CHORD 2-20=-74/1747, 18-20=0/952, 14-16=-340/92, 12-14=-11/707

WEBS 4-20=-411/164, 6-20=-56/969, 6-18=-887/222, 7-18=-101/1408, 7-16=-1818/149,

8-16=-963/215, 8-14=-34/1050, 10-14=-467/167

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 4-1-0, Interior(1) 4-1-0 to 25-0-0, Exterior(2R) 25-0-0 to 30-0-0, Interior(1) 30-0-0 to 50-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 4x4 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 12 except (jt=lb) 16=144.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 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 and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888037 COMMON 25-0502-A T01A 2 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:23 2024 Page 1

8-4-0

ID:tdHS5lWyLng?jaR9E1eBtqyly9_-8FLlufs0hfAMJM4XzCQDFHSb5lv0BFZ3cXj42uyxXsw 33-4-0 8-4-0 8-4-0 8-1-0

Structural wood sheathing directly applied or 5-4-11 oc purlins.

7-15

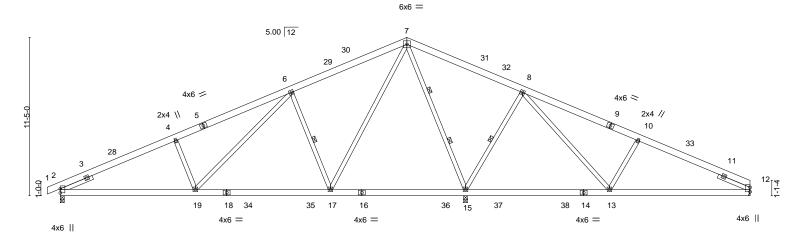
6-17, 8-15

Rigid ceiling directly applied or 6-0-0 oc bracing.

1 Row at midpt

2 Rows at 1/3 pts

Scale = 1:83.1



1	9-8-15	19-5-13	29-2-	12	39-7-6	1	49-9-0	
	9-8-15	9-8-15	9-8-1	15	10-4-10	'	10-1-10	<u> </u>
LOADING TCLL (ro Snow (Pf TCDL BCLL BCDL	of) 20.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. TC 0.48 BC 0.50 WB 0.92 Matrix-MS	DEFL. Vert(LL) Vert(CT) Horz(CT	in (loc) I/defl -0.12 17-19 >999 -0.21 17-19 >999) 0.02 15 n/a	L/d 240 180 n/a	PLATES MT20 Weight: 351 lb	GRIP 244/190 FT = 20%

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-

-0-11-0 0-11-0

8-4-0

8-4-0

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

SLIDER Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

REACTIONS.

(size) 2=0-3-8, 15=0-3-8, 12=Mechanical

Max Horz 2=188(LC 15)

Max Uplift 2=-89(LC 16), 15=-147(LC 16), 12=-34(LC 16) Max Grav 2=1168(LC 28), 15=2846(LC 30), 12=629(LC 29)

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

TOP CHORD $2\text{-}4\text{=-}1809/180,\ 4\text{-}6\text{=-}1702/224,\ 6\text{-}7\text{=-}717/218,\ 7\text{-}8\text{=-}0/843,\ 8\text{-}10\text{=-}598/141,}$

10-12=-737/120

BOT CHORD 2-19=-95/1745, 17-19=-14/949, 13-15=-334/77, 12-13=-37/680

WEBS 4-19=-411/164, 6-19=-56/969, 6-17=-887/221, 7-15=-1808/152, 7-17=-101/1404,

8-15=-954/215, 8-13=-39/1024, 10-13=-456/172

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 4-0-11, Interior(1) 4-0-11 to 25-0-0, Exterior(2R) 25-0-0 to 29-11-11, Interior(1) 29-11-11 to 49-9-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 4x4 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) 2, 12 except (it=lb) 15=147.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

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Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888038 25-0502-A T01B COMMON Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:24 2024 Page 1

ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-cSvg5_seSzIDwWfkXvxSoU_msiFCwiqDqBSdaKyxXsv

Structural wood sheathing directly applied or 5-4-12 oc purlins.

6-14

5-16, 7-14

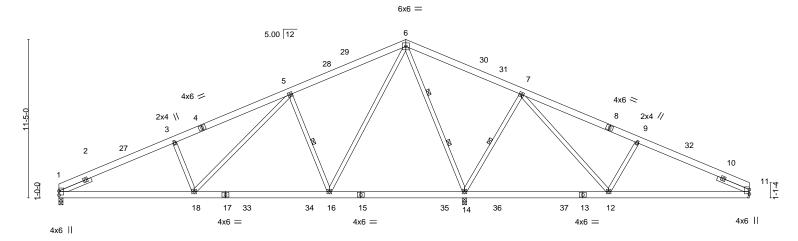
Rigid ceiling directly applied or 6-0-0 oc bracing.

1 Row at midpt

2 Rows at 1/3 pts

33-4-0 8-4-0 8-4-0 8-4-0 8-4-0 8-1-0

Scale = 1:83.0



9-8-15	19-5-13	29-2-12	39-7-6	49-9-0
9-8-15	9-8-15	9-8-15	10-4-10	10-1-10
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. DEFL TC 0.48 Vert(L BC 0.50 Vert(C WB 0.92 Horz(Matrix-MS Horz(L) -0.12 16-18 >999 240 CT) -0.21 16-18 >999 180	PLATES GRIP MT20 244/190 Weight: 348 lb FT = 20%

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-

TOP CHORD 2x6 SP No.2 BOT CHORD 2x6 SP No.2 2x4 SP No.3 WEBS

SLIDER Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

REACTIONS.

(size) 1=0-3-8, 14=0-3-8, 11=Mechanical

Max Horz 1=182(LC 15)

Max Uplift 1=-60(LC 16), 14=-147(LC 16), 11=-34(LC 16) Max Grav 1=1121(LC 27), 14=2845(LC 29), 11=630(LC 28)

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

TOP CHORD $1-3 = -1781/189, \ 3-5 = -1708/234, \ 5-6 = -719/221, \ 6-7 = 0/841, \ 7-9 = -599/141, \ 9-11 = -738/120$

BOT CHORD 1-18=-95/1751, 16-18=-14/952, 12-14=-331/76, 11-12=-37/681

WFBS 3-18=-413/169, 5-18=-64/974, 5-16=-889/222, 6-14=-1807/152, 6-16=-101/1405,

7-14=-954/215, 7-12=-39/1023, 9-12=-456/172

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-0-0 to 4-11-11, Interior(1) 4-11-11 to 25-0-0, Exterior(2R) 25-0-0 to 29-11-11, Interior(1) 29-11-11 to 49-9-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) All plates are 4x4 MT20 unless otherwise indicated.
- 6) 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.
- 8) Refer to girder(s) for truss to truss connections.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 11 except (it=lb) 14=147.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888039 COMMON 25-0502-A T01C 2 Job Reference (optional)

8-4-0

Riverside Roof Truss, LLC, Danville, Va - 24541,

8-4-0

8-4-0

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:25 2024 Page 1 ID:tdHS5IWyLng?jaR9E1eBtqyly9_-4eT2JKtHDGQ4YfEw5dShLiXwf6aSf9?M3rCA7nyxXsu 33-4-0 41-8-0 50-0-0

Structural wood sheathing directly applied or 5-4-13 oc purlins.

6-15

5-17, 7-15

Rigid ceiling directly applied or 6-0-0 oc bracing.

1 Row at midpt

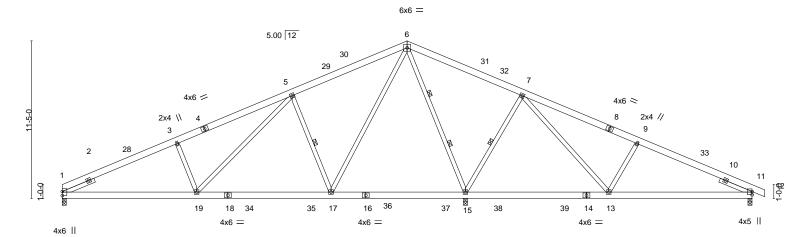
2 Rows at 1/3 pts

8-4-0

Scale = 1:83.5

0-11-0

8-4-0



	9-8-15	19-5-13		29-2-12			-7-6		50-0-0	
	9-8-15	9-8-15		9-8-15		10-	4-10		10-4-10	
Snow (Pf/Pg) 11.6/15 TCDL 10 BCLL 0	.0 Pla .0 Lu .0 * Re	ACING- 2-0-0 te Grip DOL 1.11 mber DOL 1.11 p Stress Incr YES de IRC2018/TPI2014	TC BC WE	0.47 0.50	DEFL. Vert(LL) Vert(CT) Horz(CT)	in (loc -0.12 17-1 -0.21 17-1 0.02 1	9 >999	L/d 240 180 n/a	PLATES MT20 Weight: 352 lb	GRIP 244/190 FT = 20%

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-

TOP CHORD 2x6 SP No 2 BOT CHORD 2x6 SP No.2 2x4 SP No.3

WEBS **SLIDER** Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

REACTIONS. (size) 1=0-3-8, 15=0-3-8, 11=0-3-8 Max Horz 1=-189(LC 14)

Max Uplift 1=-61(LC 16), 15=-143(LC 16), 11=-66(LC 16) Max Grav 1=1119(LC 28), 15=2858(LC 30), 11=692(LC 29)

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

TOP CHORD 1-3=-1777/192, 3-5=-1705/236, 5-6=-715/223, 6-7=0/850, 7-9=-623/140, 9-11=-767/119

BOT CHORD 1-19=-77/1753, 17-19=0/955, 13-15=-338/92, 11-13=-12/708

3-19=-414/169, 5-19=-64/974, 5-17=-889/222, 6-17=-101/1409, 6-15=-1817/149, WFBS

7-15=-963/215, 7-13=-34/1050, 9-13=-467/167

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-0-0 to 5-0-0, Interior(1) 5-0-0 to 25-0-0, Exterior(2R) 25-0-0 to 30-0-0, Interior(1) 30-0-0 to 50-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 4x4 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 11 except (it=lb) 15=143.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888040 25-0502-A T01GE COMMON SUPPORTED GAB Job Reference (optional)

Riverside Roof Truss, LLC, Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:26 2024 Page 1 ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-Yq1RWguv_aYxApp6fKzwtv4B?W1oOofWIVxkfDyxXst

50-11-0 0-11-0 25-0-0 25-0-0

Scale = 1:85.0

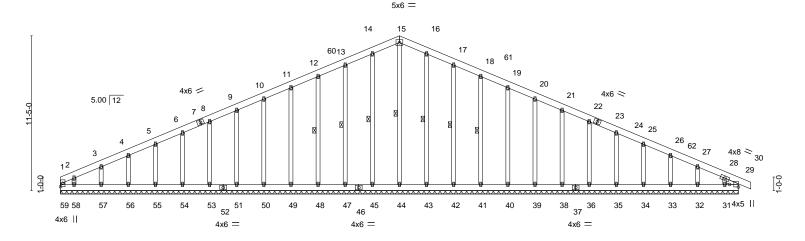


Plate Offsets (X,Y)--[29:Edge,0-7-13] LOADING (psf) SPACING-2-0-0 CSI. **DEFL** (loc) I/defl L/d **PLATES** GRIP TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.11 Vert(LL) -0.00 29 120 244/190 n/r MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 BC 0.04 Vert(CT) -0.00 29 n/r 120 TCDL 10.0 Rep Stress Incr YES WB 0.13 Horz(CT) 0.01 29 n/a n/a **BCLL** 0.0 * Code IRC2018/TPI2014

Matrix-S

50-0-0

BCDL LUMBER-BRACING-

TOP CHORD 2x6 SP No.2 **BOT CHORD** 2x6 SP No.2

WEBS 2x4 SP No.3 **OTHERS** 2x4 SP No.3

10.0

SLIDER Right 2x4 SP No.3 0-11-5 TOP CHORD

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

except end verticals.

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

1 Row at midpt 18-41

15-44, 14-45, 13-47, 12-48, 16-43, 17-42,

Weight: 446 lb

FT = 20%

REACTIONS. All bearings 50-0-0.

Max Horz 59=-200(LC 14) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 29, 47, 48, 49, 50, 51, 53, 54, 55, 56, 57, 58, 42, 41, 40, 39,

38, 36, 35, 34, 33, 32, 31 except 59=-124(LC 14)

All reactions 250 lb or less at joint(s) 59, 29, 44, 45, 47, 48, 49, 50, 51, 53, 54, 55, 56, 57, 58, Max Grav

43, 42, 41, 40, 39, 38, 36, 35, 34, 33, 32, 31

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

12-13=-107/264, 13-14=-123/304, 14-15=-132/327, 15-16=-132/327, 16-17=-123/304,

17-18=-107/264

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) 0-1-12 to 5-0-0, Exterior(2N) 5-0-0 to 25-0-0, Corner(3R) 25-0-0 to 30-0-0, Exterior(2N) 30-0-0 to 50-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 11) * 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.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 29, 47, 48, 49, 50, 51, 53, 54, 55, 56, 57, 58, 42, 41, 40, 39, 38, 36, 35, 34, 33, 32, 31 except (jt=lb) 59=124.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888041 COMMON 25-0502-A T02 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:27 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-00apk0vXlugonzOIC2V9Q7cHJwFa75_fX9hHBfyxXss

32-9-2

7-9-2

40-6-4

7-9-2

Structural wood sheathing directly applied or 5-2-3 oc purlins.

6-17, 8-15

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

7-15

6-0-0 oc bracing: 13-15.

1 Row at midpt

2 Rows at 1/3 pts

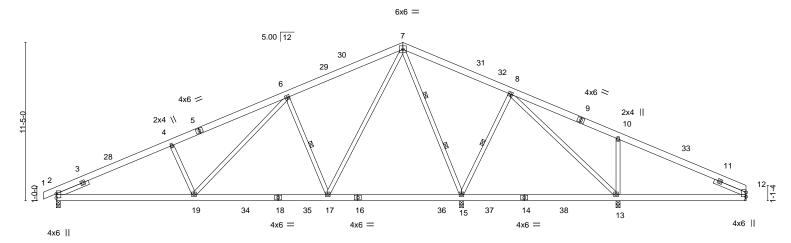
25-0-0

8-4-0

Scale = 1:83.1

49-9-0

9-2-12



9-11-4		29-2-12	40-6-4	49-9-0
9-11-4	9-7-12	9-7-12	11-3-8	9-2-12
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014		(/	L/d PLATES GRIP 240 MT20 244/190 180 n/a Weight: 352 lb FT = 20%

BOT CHORD

LUMBER-BRACING-TOP CHORD

8-4-0

TOP CHORD 2x6 SP No 2 2x6 SP No.2 **BOT CHORD** WEBS

-0-11-0 0-11-0

8-4-0

2x4 SP No.3

Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

SLIDER WEBS

REACTIONS. All bearings 0-3-8 except (jt=length) 12=Mechanical.

Max Horz 2=188(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 13, 12 except 2=-104(LC 16), 15=-106(LC 16)

Max Grav All reactions 250 lb or less at joint(s) except 2=1235(LC 28), 15=2467(LC 28), 13=571(LC 37),

12=466(LC 35)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 2-4=-1952/213, 4-6=-1828/250, 6-7=-847/252, 7-8=0/604, 8-10=-462/246,

10-12=-370/135

BOT CHORD 2-19=-127/1875, 17-19=-48/1097, 13-15=-315/96, 12-13=-40/341

WEBS 4-19=-403/162, 6-19=-45/940, 6-17=-890/218, 7-17=-102/1385, 7-15=-1628/114,

8-15=-641/216, 8-13=-108/588, 10-13=-530/197

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 4-0-11, Interior(1) 4-0-11 to 25-0-0, Exterior(2R) 25-0-0 to 29-11-11, Interior(1) 29-11-11 to 49-9-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 4x4 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.
- * 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) 13, 12 except (jt=lb) 2=104, 15=106.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Riverside Roof Truss, LLC, Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:27 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-00apk0vXlugonzOIC2V9Q7cGEw9s756fX9hHBfyxXss

33-6-4 49-9-0 8-6-5 8-2-13 8-2-13 8-6-4 7-11-10 8-3-2

> Scale = 1:88.7 6x6 =

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

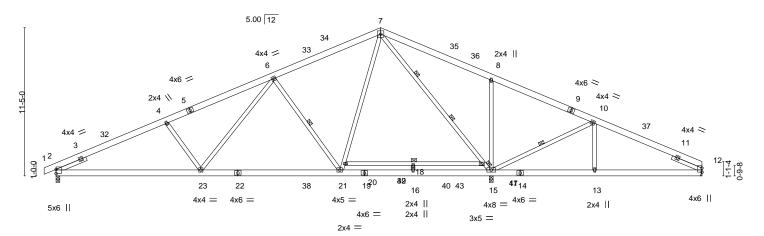
6-21, 10-15

Rigid ceiling directly applied or 2-2-0 oc bracing. Except:

6-0-0 oc bracing: 17-20

1 Row at midpt

2 Rows at 1/3 pts



<u> 11-1-1</u>		22-0-0		27-6-0	33-6-4		41-5-14		49-9-0	4
	12	10-10-4	'	5-6-0	6-0-4	I	7-11-10		8-3-2	
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- Plate Grip DOL Lumber DOL Rep Stress Incr Code IRC2018/	1.15 YES		0.47 0.95 0.82 -MS	DEFL. Vert(LL) Vert(CT) Horz(CT)	in (loc) -0.29 18-20 -0.46 18-20 0.05 15	I/defI >999 >881 n/a	L/d 240 180 n/a	PLATES MT20 Weight: 367 lb	GRIP 244/190 FT = 20%

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-TOP CHORD

2x6 SP No.2

2x6 SP No.2 *Except* **BOT CHORD**

14-19: 2x6 SP 2400F 2.0E, 17-20: 2x4 SP No.2

WEBS 2x4 SP No.3 *Except*

7-15: 2x4 SP DSS

SLIDER Left 2x4 SP No.3 2-6-0, Right 2x4 SP No.3 2-6-0

REACTIONS. (size) 2=0-3-8, 15=0-3-8, 12=Mechanical

Max Horz 2=188(LC 15)

Max Uplift 2=-80(LC 16), 15=-33(LC 16), 12=-26(LC 16) Max Grav 2=1536(LC 28), 15=3080(LC 30), 12=478(LC 35)

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

TOP CHORD 2-4=-2591/182, 4-6=-2393/187, 6-7=-1331/169, 7-8=0/688, 8-10=0/662, 10-12=-433/107

BOT CHORD 2-23=-96/2456, 21-23=-6/1755, 16-21=0/811, 15-16=0/811, 13-15=-61/400,

12-13=-61/400

WEBS 4-23=-398/165, 6-23=-20/824, 6-21=-924/211, 20-21=-0/1488, 7-20=0/1600,

7-17=-2116/31, 15-17=-2202/0, 8-15=-539/216, 10-15=-854/150, 16-18=-315/0

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=6ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 4-0-11, Interior(1) 4-0-11 to 25-0-0, Exterior(2R) 25-0-0 to 29-11-11, Interior(1) 29-11-11 to 49-9-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) 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.
- 8) Refer to girder(s) for truss to truss connections.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 15, 12.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888043 25-0502-A T03GE Common Supported Gable Job Reference (optional)

Riverside Roof Truss, LLC,

-1-0-0 1-0-0

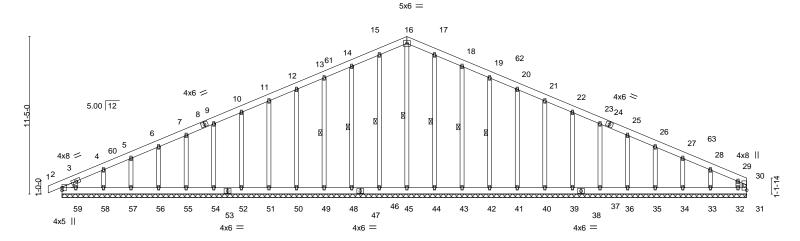
Danville, Va - 24541,

25-0-0

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:29 2024 Page 1 ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-zPiZ9iwnGVwV1HXhKTXdVYii3j3Sb9Py_TAOGYyxXsq

24-7-8

Scale = 1:83.5



	49-7-8									
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. TC 0.13 BC 0.05 WB 0.13 Matrix-S	DEFL. Vert(LL) Vert(CT) Horz(CT)	in -0.00 -0.00 0.00	(loc) 1 1 31	l/defl n/r n/r n/a	L/d 120 120 n/a	PLATES MT20 Weight: 445 lb	GRIP 244/190 FT = 20%	

BRACING-

49-7-8

LUMBER-TOP CHORD

2x6 SP No 2

BOT CHORD 2x6 SP No.2 WEBS 2x4 SP No.3

OTHERS 2x4 SP No.3

SLIDER Left 2x4 SP No.3 0-11-5 TOP CHORD

except end verticals. Rigid ceiling directly applied or 10-0-0 oc bracing.

BOT CHORD

WEBS 16-45, 15-46, 14-48, 13-49, 17-44, 18-43, 1 Row at midpt

19-42

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

REACTIONS. All bearings 49-7-8.

Max Horz 2=203(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 31, 48, 49, 50, 51, 52, 54, 55, 56, 57, 58, 59, 43, 42, 41, 40,

39, 37, 36, 35, 34, 33, 2 except 32=-128(LC 16)

Max Grav All reactions 250 lb or less at joint(s) 31, 45, 46, 48, 49, 50, 51, 52, 54, 55, 56, 57, 58, 59, 44,

43, 42, 41, 40, 39, 37, 36, 35, 34, 33, 32, 2

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

TOP CHORD 13-14=-109/263, 14-15=-123/302, 15-16=-131/326, 16-17=-131/326, 17-18=-123/302,

18-19=-109/263

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=50ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -1-0-0 to 3-11-11, Exterior(2N) 3-11-11 to 25-0-0, Corner(3R) 25-0-0 to 29-11-11, Exterior(2N) 29-11-11 to 49-5-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) 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.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) 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.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 31, 48, 49, 50, 51, 52, 54, 55, 56, 57, 58, 59, 43, 42, 41, 40, 39, 37, 36, 35, 34, 33, 2 except (jt=lb) 32=128.
- 13) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2.
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty Ply FFF-LOT #9 ROOF 166888044 25-0502-A T04G COMMON GIRDER Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:30 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5lWyLng?jaR9E1eBtqyly9_-RbGxM2xP1p2MeR6tuA2s1lEpi7K3KYX5D7vxo_yxXsp 12-4-0 3-1-0 3-1-0 3-1-0 Scale = 1:30.1 4x4 = 3 7.00 12 3x5 / 3x5 < 12 3x5 < 3x5 🖊 5 1-1-13 ПГ 13 14 15 16 17 18 9 8 10 LUS26 LUS26 LUS26 LUS26 3x5 = 3x8 3x5 = 3x4 || 3x4 | LUS26 LUS26 3-1-0 6-2-0 12-4-0 3-1-0 3-1-0

LUMBER-

LOADING (psf)

Snow (Pf/Pg) 11.6/15.0

TCLL (roof)

TCDI

BCLL

BCDL

TOP CHORD 2x4 SP No 2

20.0

10.0

10.0

0.0

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

DEFL.

Vert(LL)

Vert(CT)

Horz(CT)

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

L/d

240

180

n/a

PLATES

Weight: 167 lb

MT20

GRIP

244/190

FT = 20%

except end verticals.

(loc)

8-9

8-9

6

-0.02

-0.04

0.01

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

I/defI

>999

>999

n/a

REACTIONS.

(size) 10=0-3-8, 6=0-3-8 Max Horz 10=-97(LC 10)

Max Uplift 10=-177(LC 12), 6=-155(LC 12) Max Grav 10=2453(LC 2), 6=2112(LC 2)

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

SPACING-

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

2-0-0

1.15

1.15

NO

CSI.

0.32

0.34

0.39

TC

ВС

WB

Matrix-MS

TOP CHORD 1-2=-2418/197, 2-3=-1948/193, 3-4=-1948/193, 4-5=-2416/198, 1-10=-1811/148,

5-6=-1813/148

BOT CHORD 9-10=-85/274, 8-9=-121/2045, 7-8=-121/2043

WFBS 3-8=-138/1725, 4-8=-529/76, 4-7=-59/448, 2-8=-531/75, 2-9=-58/451, 1-9=-114/1883,

5-7=-115/1896

NOTES-

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

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

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

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

- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 6) Unbalanced snow loads have been considered for this design.
- 7) 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.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 10=177, 6=155
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 11) Use Simpson Strong-Tie LUS26 (4-10d Girder, 3-10d Truss, Single Ply Girder) or equivalent spaced at 2-0-0 oc max. starting at 0-7-4 from the left end to 10-7-4 to connect truss(es) to back face of bottom chord.
- 12) Fill all nail holes where hanger is in contact with lumber.

July 18,2024

COARIGASE(S)geStandard

MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 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 and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Truss Type Job Truss Qty Ply FFF-LOT #9 ROOF 166888044 25-0502-A T04G COMMON GIRDER

Riverside Roof Truss, LLC,

Danville, Va - 24541,

Z | Job Reference (optional) 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:30 2024 Page 2 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-RbGxM2xP1p2MeR6tuA2s1lEpi7K3KYX5D7vxo_yxXsp

LOAD CASE(S) Standard

1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-43, 3-5=-43, 6-10=-20

Concentrated Loads (lb)

Vert: 13=-451(B) 14=-445(B) 15=-445(B) 16=-445(B) 17=-445(B) 18=-445(B)



818 Soundside Road Edenton, NC 27932

Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888045 25-0502-A T04GE COMMON SUPPORTED GAB Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:30 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-RbGxM2xP1p2MeR6tuA2s1lEtZ7PuKe05D7vxo_yxXsp 13-3-0 6-2-0 0-11-0 6-2-0 6-2-0 0-11-0 Scale = 1:29.9 4x4 = 5 7.00 12 3 3x5 / 3x5 < 16 15 14 13 12 11 10 3x4 =3x4 =

12-4-0 12-4-0 LOADING (psf) SPACING-DEFL. **PLATES GRIP** 2-0-0 CSI. (loc) I/defl L/d TCLL (roof) 20.0 Vert(LL) 244/190 Plate Grip DOL 1.15 TC 0.08 -0.00 9 n/r 120 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.03 Vert(CT) -0.00 9 120 n/r TCDI 10.0 Rep Stress Incr YES WB 0.04 Horz(CT) 0.00 10 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 72 lb FT = 20% **BCDL** 10.0

LUMBER-BRACING-

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

2x4 SP No.3 2x4 SP No.3 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

except end verticals.

BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 12-4-0.

Max Horz 16=-112(LC 14) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 16, 10, 14, 15, 12, 11 Max Grav All reactions 250 lb or less at joint(s) 16, 10, 13, 14, 15, 12, 11

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

NOTES-

OTHERS

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; B=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 2-2-0, Exterior(2N) 2-2-0 to 6-2-0, Corner(3R) 6-2-0 to 9-2-0, Exterior(2N) 9-2-0 to 13-3-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 10) Gable studs spaced at 2-0-0 oc.
- 11) 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.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 16, 10, 14, 15, 12 11
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888046 25-0502-A T05 COMMON Job Reference (optional) 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:31 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-voqJZOy1o6ADGah4RuZ5aznxDXZ?3xhFSnfVKQyxXso 21-7-0 0-11-0 20-8-0 5-2-0 5-2-0 5-2-0 4x4 = Scale = 1:45.0 13 7.00 12 12 4x4 🖊 4x4 > 5 3 3x4 || ⊠ 10 9 5x8 = 3x6 3x6 = 20-8-0 10-4-0 10-4-0 Plate Offsets (X,Y)--[9:0-4-0,0-3-4] LOADING (psf) SPACING-2-0-0 CSI. (loc) I/defl L/d **PLATES** GRIP TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.53 Vert(LL) -0.19 8-9 >999 240 244/190 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 BC 0.74 Vert(CT) -0.38 8-9 >648 180 TCDL 10.0 Rep Stress Incr YES WB 0.59 Horz(CT) 0.02 8 n/a n/a **BCLL** 0.0 * Code IRC2018/TPI2014 FT = 20% Matrix-MS Weight: 118 lb

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

BCDL

WEBS

TOP CHORD 2x4 SP No.2 BOT CHORD 2x4 SP No.1

2x4 SP No.3 REACTIONS. (size) 10=0-3-8, 8=0-3-8 Max Horz 10=161(LC 15)

10.0

Max Uplift 10=-83(LC 16), 8=-83(LC 16) Max Grav 10=879(LC 2), 8=879(LC 2)

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

 $2\hbox{-}3\hbox{-}-286/66,\ 3\hbox{-}4\hbox{-}-829/124,\ 4\hbox{-}5\hbox{-}-829/124,\ 5\hbox{-}6\hbox{-}-286/66,\ 2\hbox{-}10\hbox{-}-312/95,\ 6\hbox{-}8\hbox{-}-312/95$ TOP CHORD

BOT CHORD 9-10=-70/802, 8-9=-57/800

4-9=-13/505, 3-10=-782/102, 5-8=-782/102 WFBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 10-4-0, Exterior(2R) 10-4-0 to 13-4-0, Interior(1) 13-4-0 to 21-7-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) 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.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10, 8.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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

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

except end verticals.



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888047 25-0502-A T05A Common Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:32 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5lWyLng?jaR9E1eBtqyly9_-N_OinjzgZQI4ukGG?b4K7AK?_xtroONOgQO2styxXsn 0-11-0 0-11-0 20-8-0 5-2-0 5-2-0 Scale = 1:42.6 4x4 = 12 7.00 12 13 10 4x4 // 4x4 < 5 4x4 || 14 3x4 II 6 8 3x6 =5x8 3x8 =10-4-0 10-4-0 Plate Offsets (X,Y)--[8:0-4-0,0-3-4] LOADING (psf) SPACING-2-0-0 CSI. (loc) I/defl L/d **PLATES** GRIP TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.98 Vert(LL) -0.19 8-9 >999 240 244/190 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 BC 0.83 Vert(CT) -0.38 8-9 >646 180 TCDL 10.0 Rep Stress Incr NO WB 0.63 Horz(CT) 0.03 n/a n/a **BCLL** 0.0 * Code IRC2018/TPI2014 FT = 20% Matrix-MS Weight: 116 lb BCDL 10.0

LUMBER-

TOP CHORD 2x4 SP No.2 *Except*

4-6: 2x4 SP No.1

BOT CHORD 2x4 SP No.1 WEBS 2x4 SP No.3 BRACING-

TOP CHORD Structural wood sheathing directly applied or 5-0-4 oc purlins,

except end verticals.

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

REACTIONS. (size) 9=0-3-8, 7=0-3-8

Max Horz 9=158(LC 15)

Max Uplift 9=-84(LC 16), 7=-86(LC 16) Max Grav 9=907(LC 2), 7=1421(LC 2)

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

TOP CHORD 2-3=-287/66, 3-4=-876/129, 4-5=-885/133, 5-6=-758/84, 2-9=-311/95, 6-7=-903/144

BOT CHORD 8-9=-105/837, 7-8=-110/941

WEBS 4-8=-25/556, 5-8=-350/155, 3-9=-828/108, 5-7=-746/117

NOTES

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 10-4-0, Exterior(2R) 10-4-0 to 13-4-0, Interior(1) 13-4-0 to 20-6-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 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) 9, 7.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 705 lb down and 107 lb up at 19-8-0 on top chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

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

Vert: 1-2=-43, 2-4=-43, 4-6=-43, 7-9=-20



July 18,2024

Continued on page 2



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818 Soundside Road Edenton, NC 27932 Job Truss Truss Type Qty Ply FFF-LOT #9 ROOF 166888047 25-0502-A T05A Common

Riverside Roof Truss, LLC,

Danville, Va - 24541,

Job Reference (optional) 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:32 2024 Page 2 ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-N_OinjzgZQI4ukGG?b4K7AK?_xtroONOgQO2styxXsn

LOAD CASE(S) Standard Concentrated Loads (lb) Vert: 14=-500



818 Soundside Road Edenton, NC 27932

Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888048 25-0502-A T05GE COMMON SUPPORTED GAB Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:32 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-N_OinjzgZQl4ukGG?b4K7AKD3x4GoWcOgQO2styxXsn

21-7-0 0-11-0 20-8-0 10-4-0 10-4-0

4x4 =

Scale = 1:45.9

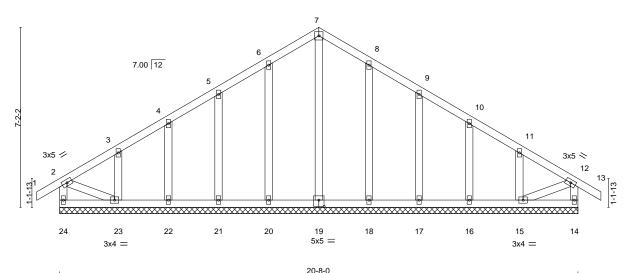


Plate Offsets (X,Y)-- [19:0-2-8,0-3-0]

LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15	CSI. TC 0.08 BC 0.04	 in (loc) 0.00 13 0.00 13	l/defl n/r n/r	L/d 120 120	PLATES MT20	GRIP 244/190
TCDL 10.0 BCLL 0.0 * BCDL 10.0	Rep Stress Incr YES Code IRC2018/TPI2014	WB 0.10 Matrix-S	 0.00 14	n/a	n/a	Weight: 132 lb	FT = 20%

LUMBER-BRACING-

2x4 SP No.2 TOP CHORD **BOT CHORD** 2x4 SP No.2 WEBS 2x4 SP No.3 **OTHERS** 2x4 SP No.3

TOP CHORD **BOT CHORD** Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.

Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 23-24,14-15.

REACTIONS. All bearings 20-8-0.

Max Horz 24=161(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 24, 20, 21, 22, 23, 18, 17, 16, 15

Max Grav All reactions 250 lb or less at joint(s) 24, 14, 19, 20, 21, 22, 23, 18, 17, 16, 15

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

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 2-4-0, Exterior(2N) 2-4-0 to 10-4-0, Corner(3R) 10-4-0 to 13-4-0, Exterior(2N) 13-4-0 to 21-7-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 10) Gable studs spaced at 2-0-0 oc.
- 11) 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.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 24, 20, 21, 22, 23, 18, 17, 16, 15.
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024



Job Truss Truss Type Qty Ply FFF-LOT #9 ROOF 166888049 25-0502-A T06G **GABLE** Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:33 2024 Page 1

ID:tdHS5IWyLng?jaR9E1eBtqyly9_-rAy4_3zIKkQxVurSZlcZfOsE1KFrXmOYv48cPJyxXsm 20-6-4 5-10-2 5-10-2 2-11-15 7-5-12

20-6-4

except end verticals.

6-0-0 oc bracing: 9-10.

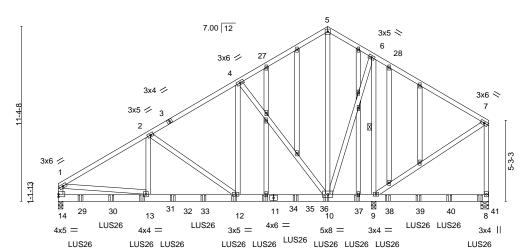
1 Row at midpt

Scale = 1:75.0 4x4 =

28-0-0

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

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



		5-10-2		5-10-2	'	5-10-2	2-	11-15		7-5-12		<u> </u>	
LOADING (ps TCLL (roof) Snow (Pf/Pg) TCDL BCLL	20.0	SPACING- Plate Grip DOL Lumber DOL Rep Stress Incr	2-0-0 1.15 1.15 NO	CSI. TC BC WB	0.77 0.72 0.90	,	DEFL. Vert(LL) Vert(CT) Horz(CT)	in -0.07 -0.13 0.02	(loc) 10-12 8-9 8	l/defl >999 >689 n/a	L/d 240 180 n/a	PLATES MT20	GRIP 244/190
BCDL	10.0	Code IRC2018/Ti	PI2014	Matri	x-MS							Weight: 563 lb	FT = 20%

17-6-5

BRACING-

TOP CHORD

BOT CHORD

WEBS

11-8-3

LUMBER-

TOP CHORD 2x4 SP No.2 2x6 SP No.2 **BOT CHORD**

WEBS 2x4 SP No.3 **OTHERS** 2x4 SP No.3

REACTIONS. (size) 14=0-3-8, 9=0-3-8, 8=0-6-0

Max Horz 14=291(LC 11)

Max Uplift 14=-201(LC 12), 9=-490(LC 12), 8=-61(LC 12) Max Grav 14=2912(LC 2), 9=4873(LC 2), 8=832(LC 30)

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

TOP CHORD 1-2=-3627/273, 2-4=-2355/228, 4-5=-686/154, 5-6=-667/182, 6-7=-72/333,

1-14=-2321/187

BOT CHORD 13-14=-260/655, 12-13=-276/3060, 10-12=-179/1963, 9-10=-261/154

WEBS 2-13=-44/1140, 2-12=-1351/170, 4-12=-147/2352, 4-10=-2387/275, 5-10=-112/464,

5-10-2

6-10=-108/2258, 6-9=-2924/282, 1-13=-107/2520, 7-9=-322/130

NOTES-

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

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

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

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

- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 3) Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=28ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) 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.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 7) Unbalanced snow loads have been considered for this design.
- 8) All plates are 2x4 MT20 unless otherwise indicated.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) 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.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8 except (jt=lb) 14=201, 9=490.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and Continuiere naestagia 12 dard ANSI/TPI 1



July 18,2024

MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job	Truss	Truss Type	Qty	Ply	FFF-LOT #9 ROOF	
						166888049
25-0502-A	T06G	GABLE	1	2	Job Reference (optional)	

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:34 2024 Page 2 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-JNVSCP_w51Yo72Qf707oCbPPnkb4GDeh8kt9xlyxXsl

14) Use Simpson Strong-Tie LUS26 (4-10d Girder, 3-10d Truss, Single Ply Girder) or equivalent spaced at 2-0-0 oc max. starting at 1-5-4 from the left end to 27-5-4 to connect truss(es) to back face of bottom chord.

15) Fill all nail holes where hanger is in contact with lumber.

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

Uniform Loads (plf)

Vert: 1-5=-43, 5-7=-43, 8-14=-20

Concentrated Loads (lb)

Vert: 12=-319(B) 10=-319(B) 29=-319(B) 30=-319(B) 31=-319(B) 32=-319(B) 33=-319(B) 34=-319(B) 36=-319(B) 37=-319(B) 38=-334(B) 40=-334(B)

41=-340(B)



818 Soundside Road Edenton, NC 27932

Job	Truss	Truss Type		Qty	Ply	FFF-LOT #9 ROOF		
JOB	Truss	Truss Type		Qiy	Ply	FFF-LOT #9 ROOF		166888050
25-0502-A	T07	COMMON		2	1			10000000
25-0502-A	107	COMMON		2	'	Job Reference (optional)		
Riverside Roof Truss, LLC,	Danville, Va - 24541,				9 720 c li	I 11 2024 MiTek Industries, Inc.	Tuo lul 16 00:57:2	1 2024 Page 1
Riverside Roof Truss, LLC,	Dariville, va - 24541,		ID-			1eBtqyly9JNVSCP_w51Yo72		
-0-11-0		6-0-0	וטו.	unssivvyL	ily : jakse	11-6-8		
-0-11-0 0-11-0		6-0-0	-			5-6-8	0-5-8	12-11-0 0-11-0
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0 ₇ 2- <u>4</u> 0-2-4		6-0-0	1			11-9-12	12-0 ₇ 0 0-2-4	
0-2-4		5-9-12	ı			5-9-12	0-2-4	
LOADING (psf)								
	SPACING-	2-0-0 CSI.		DEFL.	in	(loc) I/defl L/d	PLATES	GRIP
TCLL (roof) 20.0	Plate Grip DOL	1.15 TC 0.45		Vert(LL)	-0.02		MT20	244/190
Snow (Pf/Pg) 11.6/15.0	Lumber DOL	1.15 BC 0.29		Vert(CT)				
TCDL 10.0	Dan Chross Inca	VEC WD 0.44		Usr=(CT)				

LUMBER-

BCLL

BCDL

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

2x4 SP No.3 *Except* WEBS

2-8,4-6: 2x6 SP No.2

0.0

10.0

REACTIONS. (size) 8=0-3-8, 6=0-3-8 Max Horz 8=-63(LC 14)

Max Uplift 8=-64(LC 16), 6=-64(LC 16) Max Grav 8=530(LC 2), 6=530(LC 2)

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

Rep Stress Incr

Code IRC2018/TPI2014

TOP CHORD 2-3=-562/180, 3-4=-562/180, 2-8=-478/231, 4-6=-478/231

BOT CHORD 7-8=-165/271, 6-7=-120/271 WFBS 2-7=0/260, 4-7=0/260

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 6-0-0, Exterior(2R) 6-0-0 to 9-0-0 , Interior(1) 9-0-0 to 12-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

YES

WB

Matrix-MS

0.11

Horz(CT)

BRACING-

TOP CHORD

BOT CHORD

0.00

6

except end verticals.

n/a

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

n/a

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

- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) 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.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Weight: 64 lb

FT = 20%

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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 and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



lob	Truss	Truss Type		Qty	Ply	FFF-LOT #9 ROO)F		100000054
25-0502-A	T07A	Common		1	1				I66888051
				-		Job Reference (o	otional)		
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	-0 0-1-12	5-6-4	1			5-9-12		d-2-	1
LOADING (psf)	0 1 12								
TCLL (roof) 20.0	SPACING-		CSI.	DEFL.	in		L/d	PLATES	GRIP
Snow (Pf/Pg) 11.6/15.0	Plate Grip L		TC 0.47	Vert(LL)	-0.02	5-6 >999	240	MT20	244/190
TCDL 10.0	Lumber DC		BC 0.29	Vert(CT)	-0.05	5-6 >999	180		
BCLL 0.0	* Rep Stress		WB 0.12	Horz(CT)	0.00	4 n/a	n/a	144 : 14 04 "	FT 000'
BCDL 10.0		2018/TPI2014	Matrix-MS					Weight: 61 lb	FT = 20%
LUMBER-	'		BRAC	ING-					
TOP CHORD 2x4 SP N	lo 2			CHORD	Structura	al wood sheathin	directly appl	ied or 6-0-0 oc purling	3

BOT CHORD

except end verticals.

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

BOT CHORD 2x4 SP No.2

2x4 SP No.3 *Except*

1-6,3-4: 2x6 SP No.2

REACTIONS. (size) 6=0-3-8, 4=0-3-8

Max Horz 6=-57(LC 14)

Max Uplift 6=-28(LC 16), 4=-28(LC 16) Max Grav 6=462(LC 2), 4=462(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 1-2=-576/188, 2-3=-576/185, 1-6=-409/173, 3-4=-409/171

WEBS 1-5=-39/297, 3-5=-40/297

NOTES-

1) Unbalanced roof live loads have been considered for this design.

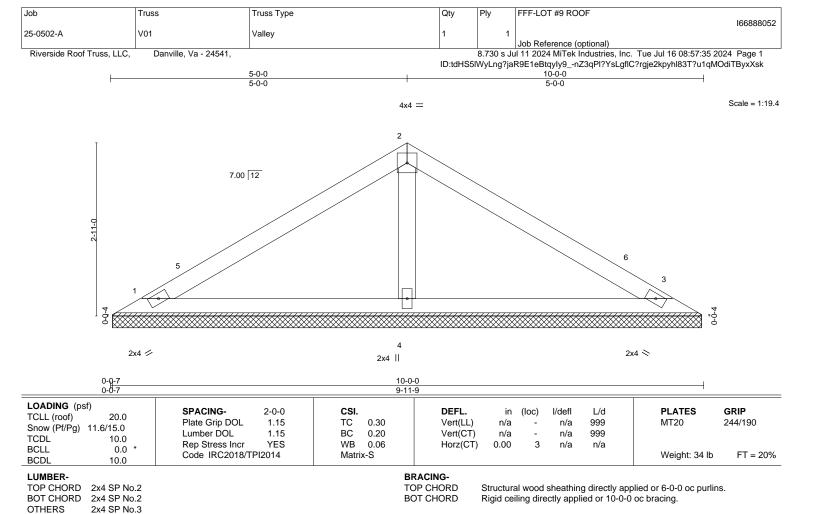
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-2-12 to 3-2-12, Interior(1) 3-2-12 to 6-0-0, Exterior(2R) 6-0-0 to 9-0-0, Interior(1) 9-0-0 to 11-9-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate
- DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6, 4.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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REACTIONS.

1=9-11-2, 3=9-11-2, 4=9-11-2 (size)

Max Horz 1=52(LC 15)

Max Uplift 1=-21(LC 16), 3=-21(LC 16)

Max Grav 1=169(LC 2), 3=169(LC 2), 4=376(LC 2)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 5-0-0, Exterior(2R) 5-0-0 to 8-0-0, Interior(1) 8-0-0 to 9-5-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888053 25-0502-A V02 Valley Job Reference (optional) 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:35 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5IWyLng?jaR9E1eBtqyly9_-nZ3qPl?YsLgflC?rgje2kpyjj856?uPqMOdiTByxXsk 3-6-14 3-6-14 Scale = 1:15.0 4x4 = 2 7.00 12 0-0-4 0-0-4 2x4 / 2x4 || 2x4 > 7-1-5 LOADING (psf) SPACING-2-0-0 CSI. DEFL. I/defI L/d **PLATES GRIP** (loc) TCLL (roof) 20.0 Plate Grip DOL TC Vert(LL) 999 244/190 1.15 0.18 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.09 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.03 Horz(CT) 0.00 3 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-P Weight: 23 lb FT = 20% **BCDL** 10.0 LUMBER-BRACING-TOP CHORD 2x4 SP No.2 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.

2x4 SP No.2

BOT CHORD OTHERS 2x4 SP No.3 BOT CHORD

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

REACTIONS.

1=7-0-14, 3=7-0-14, 4=7-0-14 (size) Max Horz 1=35(LC 15) Max Uplift 1=-21(LC 16), 3=-21(LC 16)

Max Grav 1=129(LC 20), 3=129(LC 21), 4=231(LC 2)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty FFF-LOT #9 ROOF 166888054 25-0502-A V03 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:36 2024 Page 1 ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-FldCd50AdfoWMMa1ER9HH0UwYYRskL8_b2MG?eyxXsj 2-1-11 2-1-11 Scale = 1:8.9 3x4 2 7.00 12 3 0-0-4 5-0-0 2x4 // 2x4 < Plate Offsets (X,Y)--[2:0-2-0,Edge] LOADING (psf) SPACING-2-0-0 CSI. **DEFL** in (loc) I/defl L/d **PLATES** GRIP 20.0 TCLL (roof) Plate Grip DOL 1.15 TC 0.05 Vert(LL) 999 MT20 244/190 n/a n/a Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 BC 0.12 Vert(CT) n/a n/a 999 TCDL 10.0 Rep Stress Incr YES WB 0.00 Horz(CT) 0.00 3 n/a n/a **BCLL** 0.0 * Code IRC2018/TPI2014 FT = 20% Matrix-P Weight: 12 lb BCDL 10.0 LUMBER-BRACING-TOP CHORD 2x4 SP No.2 TOP CHORD Structural wood sheathing directly applied or 4-3-7 oc purlins. BOT CHORD 2x4 SP No.2 **BOT CHORD** Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

1=4-2-9, 3=4-2-9 (size) Max Horz 1=-19(LC 14)

Max Uplift 1=-8(LC 16), 3=-8(LC 16) Max Grav 1=128(LC 2), 3=128(LC 2)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888055 25-0502-A V04 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:36 2024 Page 1

ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-FldCd50AdfoWMMa1ER9HH0UtvYR0kLU_b2MG?eyxXsj 4-1-8

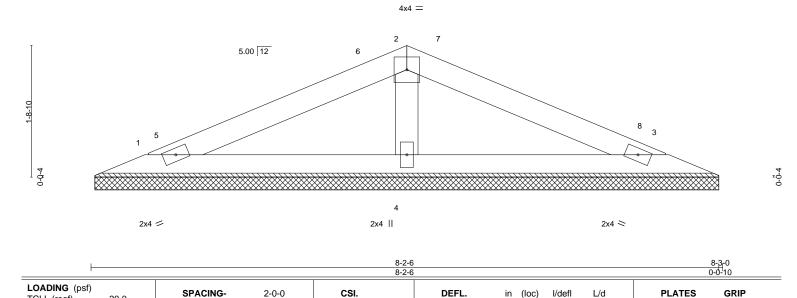
Scale = 1:15.0

244/190

FT = 20%

MT20

Weight: 25 lb



TC

ВС

WB

Matrix-P

0.21

0.11

0.04

LUMBER-

TCLL (roof)

TCDI

BCLL

BCDL

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

Snow (Pf/Pg) 11.6/15.0

OTHERS 2x4 SP No.3

20.0

10.0

0.0

10.0

BRACING-

Vert(LL)

Vert(CT)

Horz(CT)

n/a

n/a

0.00

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

999

999

n/a

n/a

n/a

n/a

3

REACTIONS.

1=8-1-13, 3=8-1-13, 4=8-1-13 (size) Max Horz 1=18(LC 15) Max Uplift 1=-19(LC 16), 3=-19(LC 16)

Max Grav 1=134(LC 20), 3=134(LC 21), 4=273(LC 2)

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-9-1 to 3-9-1, Interior(1) 3-9-1 to 4-1-8, Exterior(2R) 4-1-8 to 7-1-8, Interior(1) 7-1-8 to 7-5-15 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

1.15

1.15

YES

- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



July 18,2024

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888056 25-0502-A V05 Valley Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:37 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5IWyLng?jaR9E1eBtqyIy9_-kyBbqR0oOyxN_V9Do8gWqE15IymcToO7qi6pY4yxXsi 2-1-8 Scale = 1:7.9 3x4 = 5.00 12 2 2x4 = 2x4 < 4-2-6 Plate Offsets (X,Y)--[2:0-2-0,Edge] LOADING (psf) GRIP SPACING-2-0-0 CSI. **DEFL** in (loc) I/defl L/d **PLATES** TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.05 Vert(LL) 999 MT20 244/190 n/a n/a 11.6/15.0 Snow (Pf/Pg) Lumber DOL 1.15 BC 0.09 Vert(CT) n/a n/a 999 TCDL 10.0 Rep Stress Incr YES WB 0.00 Horz(CT) 0.00 3 n/a n/a

LUMBER-

BCLL

BCDL

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

0.0 *

10.0

BRACING-

Matrix-P

TOP CHORD **BOT CHORD** Structural wood sheathing directly applied or 4-3-0 oc purlins.

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

REACTIONS.

1=4-1-13, 3=4-1-13 (size) Max Horz 1=-7(LC 14) Max Uplift 1=-7(LC 16), 3=-7(LC 16) Max Grav 1=110(LC 2), 3=110(LC 2)

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

Code IRC2018/TPI2014

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



FT = 20%

Weight: 11 lb

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Truss Type Qty 166888057 25-0502-A V06 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:37 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-kyBbqR0oOyxN_V9Do8gWqE12fylOTlZ7qi6pY4yxXsi 28-4-8 0-11-0 16-4-5 11-1-3 Scale = 1:56.7 4x4 = 6 7.00 12 20 19 3x4 // Ø 9 10 3-0-13 3x4 // 18 17 16 15 13 12 14 11 3x4 = LOADING (psf) SPACING-DEFL. **PLATES** GRIP 2-0-0 CSI. (loc) I/defl L/d TCLL (roof) 20.0 Plate Grip DOL Vert(LL) 244/190 1.15 TC 0.21 -0.00 n/r 120 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.17 Vert(CT) -0.00 10 120 n/r TCDI 10.0 Rep Stress Incr YES WB 0.25 Horz(CT) 0.00 n/a n/a 11 **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 142 lb FT = 20% **BCDL** 10.0

LUMBER-

Job

Truss

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

WEBS 2x4 SP No.3 **OTHERS** 2x4 SP No.3 BRACING-

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

FFF-I OT #9 ROOF

except end verticals.

BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

WEBS 1 Row at midpt

REACTIONS. All bearings 27-5-1.

Max Horz 1=230(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 11, 1, 15, 17, 18, 13, 12

Max Grav All reactions 250 lb or less at joint(s) 11, 1 except 14=442(LC 28), 15=467(LC 28), 17=397(LC 28),

18=417(LC 28), 13=470(LC 29), 12=377(LC 29)

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

TOP CHORD 5-6=-196/274, 6-7=-196/267

WFBS 5-15=-261/123, 2-18=-263/113, 7-13=-266/125

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 16-4-5, Exterior(2R) 16-4-5 to 19-4-5, Interior(1) 19-4-5 to 28-4-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 2x4 MT20 unless otherwise indicated.
- 7) Gable requires continuous bottom chord bearing.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 1, 15, 17, 18, 13 12
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:38 2024 Page 1

ID:tdHS5IWyLng?jaR9E1eBtqyly9_-C8lz2n1Q9G3EcfjQMsBIMRaDYL5cCDfH3MrM4WyxXsh 26-11-6 0-11-0 14-11-3 11-1-3

4x4 =

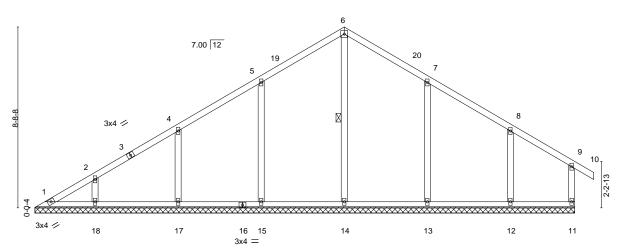
Scale = 1:55.5

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

Rigid ceiling directly applied or 6-0-0 oc bracing.

except end verticals.

1 Row at midpt



LOADING (psf) SPACING-2-0-0 DEFL. L/d **PLATES** GRIP CSI. (loc) I/defl TCLL (roof) 20.0 Plate Grip DOL Vert(LL) 244/190 1.15 TC 0.21 -0.00 10 n/r 120 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.17 Vert(CT) -0.00 10 120 n/r TCDI 10.0 Rep Stress Incr YES WB 0.19 Horz(CT) 0.00 n/a n/a 11 **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 128 lb FT = 20% **BCDL** 10.0

BRACING-

TOP CHORD

BOT CHORD

WEBS

26-0-6

LUMBER-

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

(lb) -

2x4 SP No.3 REACTIONS. All bearings 25-11-15. Max Horz 1=201(LC 15)

Max Uplift All uplift 100 lb or less at joint(s) 11, 1, 15, 17, 18, 13, 12

Max Grav All reactions 250 lb or less at joint(s) 11, 1 except 14=435(LC 28), 15=461(LC 28), 17=416(LC 28),

18=337(LC 28), 13=469(LC 29), 12=378(LC 29)

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

TOP CHORD 5-6=-180/250

WFBS 5-15=-259/122, 7-13=-266/124

NOTES-

OTHERS

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=26ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 14-11-3, Exterior(2R) 14-11-3 to 17-11-3, Interior(1) 17-11-3 to 26-11-6 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 2x4 MT20 unless otherwise indicated.
- 7) Gable requires continuous bottom chord bearing.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 1, 15, 17, 18, 13 12
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



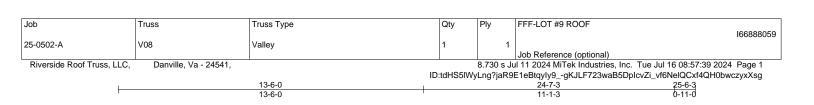
July 18,2024

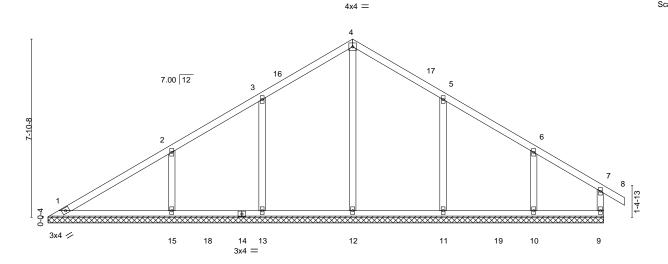
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LUMBER-BRACING-

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

OTHERS 2x4 SP No.3 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins,

except end verticals.

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

REACTIONS. All bearings 24-6-13.

Max Horz 1=172(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 1, 9, 13, 15, 11, 10

Max Grav All reactions 250 lb or less at joint(s) 1, 9 except 12=427(LC 28), 13=420(LC 28), 15=507(LC 28),

11=463(LC 29), 10=357(LC 29)

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

WEBS 2-15=-307/131, 5-11=-266/124

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=25ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 13-6-0, Exterior(2R) 13-6-0 to 16-6-0, Interior(1) 16-6-0 to 25-6-3 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 2x4 MT20 unless otherwise indicated.
- 7) Gable requires continuous bottom chord bearing.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 9, 13, 15, 11, 10.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Scale = 1:50.9

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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888060 25-0502-A V09 Valley Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:39 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5lWyLng?jaR9E1eBtqyly9_-gKJLF723waB5DplcvZi_vf6ONlRlxgLQH0bwczyxXsg 24-1-1 0-11-0 12-0-14 11-1-3 Scale = 1:46.0 4x4 = 7.00 12]4-5 17^{3x4} = 3x4 / 14 13 12 11 10 9 3x4 =

LOADING (psf) SPACING-2-0-0 CSI. DEFL. L/d **PLATES** GRIP (loc) I/defl TCLL (roof) 20.0 Plate Grip DOL 0.20 Vert(LL) 244/190 1.15 TC 0.00 8 n/r 120 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.18 Vert(CT) 0.01 120 8 n/r TCDI 10.0 Rep Stress Incr YES WB 0.16 Horz(CT) 0.00 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 103 lb FT = 20%

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

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

10.0

OTHERS 2x4 SP No.3

Max Horz 1=-138(LC 14)

All bearings 23-5-15.

Max Uplift All uplift 100 lb or less at joint(s) 12, 14, 10, 9, 7

All reactions 250 lb or less at joint(s) 1, 7 except 11=384(LC 28), 12=423(LC 28), 14=393(LC 28), Max Grav

10=425(LC 29), 9=385(LC 29)

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

3-12=-259/123, 5-10=-260/124 WEBS

NOTES-

BCDL

REACTIONS.

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 12-0-14, Exterior(2R) 12-0-14 to 15-0-14, Interior(1) 15-0-14 to 24-1-1 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 2x4 MT20 unless otherwise indicated.
- 7) Gable requires continuous bottom chord bearing.
- 8) 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.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 12, 14, 10, 9, 7.
- 11) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 7.
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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

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

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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888061 25-0502-A V10 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:40 2024 Page 1 ID:tdHS5lWyLng?jaR9E1eBtqyly9_-8XtjST3hhtJxrztoTGEDRsfZ39n4g8CZWgKT8PyxXsf 10-7-12 10-7-12 Scale = 1:40.6 4x4 = 7.00 12 15 5 3x4 / 3x4 > 13 12 16 11 10 17 9 8 3x4 =LOADING (psf) **PLATES GRIP** TCLL (roof)

BRACING-

TOP CHORD

BOT CHORD

TCDI 10.0 **BCLL** 0.0 **BCDL**

20.0 Snow (Pf/Pg) 11.6/15.0 10.0

SPACING-2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014

CSI. TC 0.20 ВС 0.17 WB 0.12 Matrix-S

DEFL. I/defI L/d (loc) Vert(LL) n/a n/a 999 Vert(CT) 999 n/a n/a Horz(CT) 0.00 n/a n/a

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

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

MT20

244/190

Weight: 88 lb FT = 20%

LUMBER-

REACTIONS.

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

2x4 SP No.3

All bearings 21-2-10 Max Horz 1=118(LC 15)

Max Uplift All uplift 100 lb or less at joint(s) 1, 12, 13, 9, 8

Max Grav All reactions 250 lb or less at joint(s) 1, 7 except 10=374(LC 27), 12=433(LC 27), 13=319(LC 27),

9=433(LC 28), 8=319(LC 28)

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

3-12=-268/127, 5-9=-268/127 WEBS

NOTES-

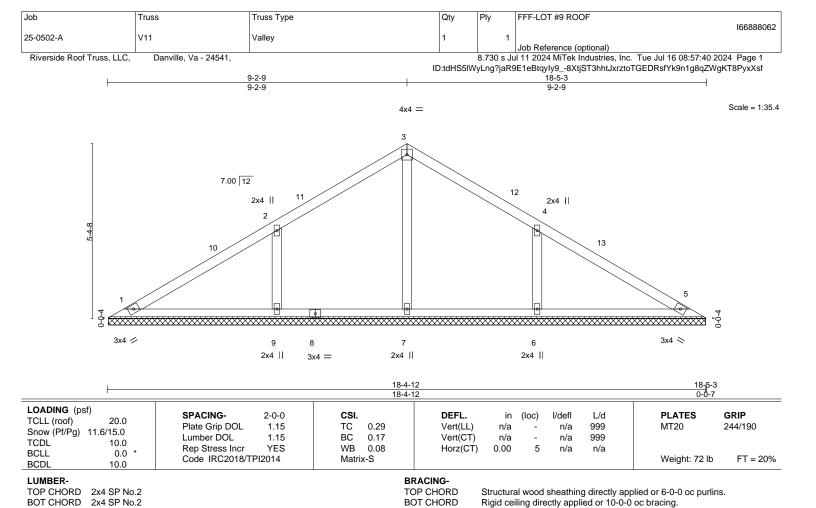
- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 10-7-12, Exterior(2R) 10-7-12 to 13-7-12, Interior(1) 13-7-12 to 20-9-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- 7) 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.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 12, 13, 9, 8.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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OTHERS 2x4 SP No.3

REACTIONS. All bearings 18-4-5. Max Horz 1=101(LC 15)

Max Uplift All uplift 100 lb or less at joint(s) 9, 6

Max Grav All reactions 250 lb or less at joint(s) 1, 5, 7 except 9=422(LC 27), 6=422(LC 28)

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

2-9=-312/143, 4-6=-312/143 WEBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 9-2-9, Exterior(2R) 9-2-9 to 12-2-9, Interior(1) 12-2-9 to 17-10-11 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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) 9, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty 166888063 25-0502-A V12 Valley Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:41 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5lWyLng?jaR9E1eBtqyly9_-cjR5go4JSBRoT7S?1_IS_4CjrZ8GPbljlK41hryxXse 7-9-7 7-9-7 7-9-7 Scale = 1:29.7 4x4 = 7.00 12 10 2x4 || 2x4 || 2 8 6 3x4 <> 2x4 || 2x4 || 2x4 II 15-6-14 LOADING (psf) SPACING-2-0-0 CSI. DEFL. I/defI L/d **PLATES GRIP** (loc) TCLL (roof) 20.0 Plate Grip DOL Vert(LL) 999 244/190 1.15 TC 0.20 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.11 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.07 Horz(CT) 0.00 5 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 59 lb FT = 20% **BCDL** 10.0 LUMBER-BRACING-TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.

BOT CHORD

FFF-I OT #9 ROOF

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

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

BOT CHORD **OTHERS** 2x4 SP No.3

> All bearings 15-6-1. Max Horz 1=-84(LC 14) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 8, 6

Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=264(LC 2), 8=343(LC 33), 6=343(LC 34)

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

2-8=-259/134, 4-6=-259/134 WEBS

NOTES-

REACTIONS.

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-9-7, Interior(1) 3-9-7 to 7-9-7, Exterior(2R) 7-9-7 to 10-9-7, Interior(1) 10-9-7 to 15-0-6 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty FFF-I OT #9 ROOF 166888064 25-0502-A V13 Valley Job Reference (optional)
8.730 s Jul 11 2024 MiTek Industries, Inc. Tue Jul 16 08:57:41 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:tdHS5lWyLng?jaR9E1eBtqyly9_-cjR5go4JSBRoT7S?1_IS_4CjsZ83PcYjlK41hryxXse 12-8-10 6-4-5 6-4-5 Scale = 1:24.4 4x4 = 3 7.00 12 10 2x4 || 4^{2x4} || 2 5 3x4 // 3x4 > 2x4 || 2x4 || 2x4 || 12-8-3 12-8-10 0-0-7 LOADING (psf) SPACING-2-0-0 DEFL. I/defI L/d **PLATES GRIP** CSI. (loc) TCLL (roof) 20.0 Plate Grip DOL Vert(LL) 999 244/190 1.15 TC 0.20 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.12 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.05 Horz(CT) 0.00 5 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 46 lb FT = 20% **BCDL** 10.0 BRACING-

TOP CHORD

BOT CHORD

LUMBER-

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

BOT CHORD **OTHERS** 2x4 SP No.3

REACTIONS. All bearings 12-7-12. Max Horz 1=68(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 1, 8, 6

Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=277(LC 2), 8=307(LC 20), 6=307(LC 21)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 6-4-5, Exterior(2R) 6-4-5 to 9-4-5, Interior(1) 9-4-5 to 12-2-2 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 8, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



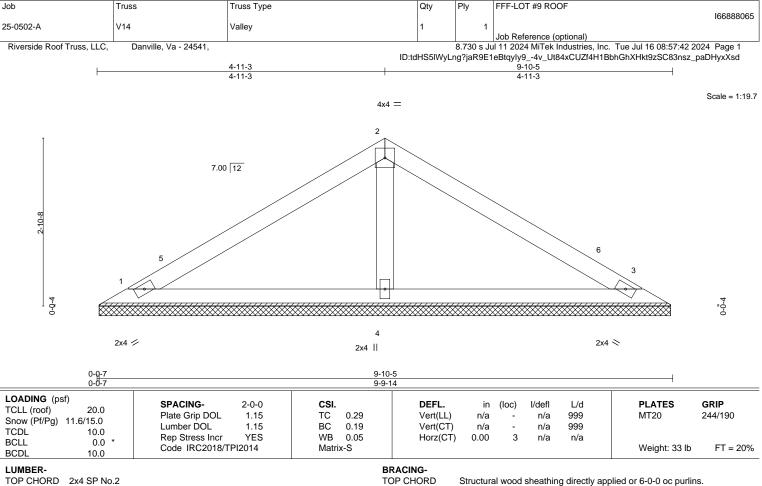
Structural wood sheathing directly applied or 6-0-0 oc purlins.

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

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BOT CHORD **OTHERS**

2x4 SP No.2

2x4 SP No.3

BOT CHORD

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

REACTIONS.

1=9-9-7, 3=9-9-7, 4=9-9-7 (size) Max Horz 1=-51(LC 14) Max Uplift 1=-21(LC 16), 3=-21(LC 16)

Max Grav 1=166(LC 2), 3=166(LC 2), 4=370(LC 2)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 4-11-3, Exterior(2R) 4-11-3 to 7-11-3, Interior(1) 7-11-3 to 9-3-13 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

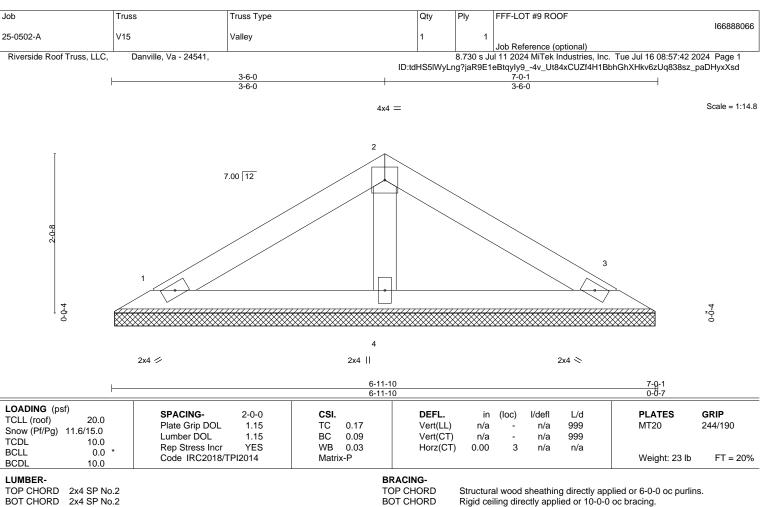


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OTHERS REACTIONS.

1=6-11-3, 3=6-11-3, 4=6-11-3 (size)

Max Horz 1=-34(LC 14)

2x4 SP No.3

Max Uplift 1=-20(LC 16), 3=-20(LC 16)

Max Grav 1=126(LC 20), 3=126(LC 21), 4=226(LC 2)

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

NOTES-

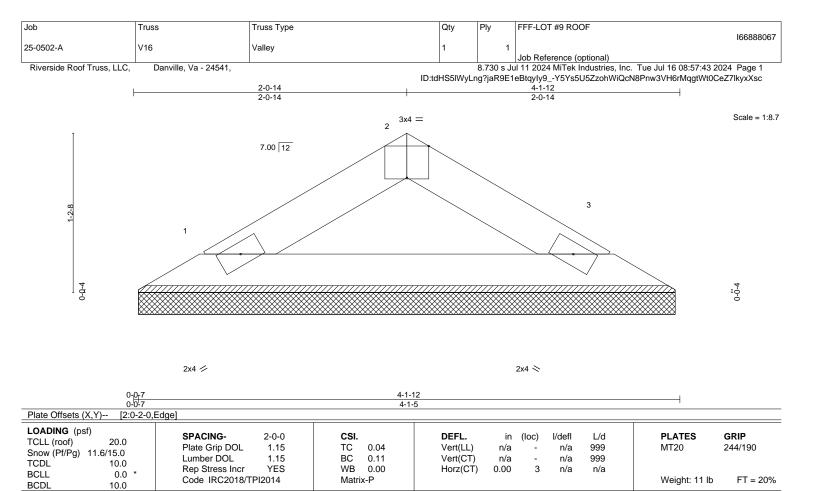
- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 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 and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)





BRACING-

TOP CHORD

BOT CHORD

LUMBER-

REACTIONS.

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

1=4-0-14, 3=4-0-14 (size) Max Horz 1=-18(LC 14) Max Uplift 1=-7(LC 16), 3=-7(LC 16) Max Grav 1=123(LC 2), 3=123(LC 2)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * 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, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Structural wood sheathing directly applied or 4-1-12 oc purlins.

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

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Symbols

PLATE LOCATION AND ORIENTATION



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



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

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

* Plate location details available in MiTek software or upon request

PLATE SIZE

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

LATERAL BRACING LOCATION



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

BEARING



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

ANSI/TPI1: Industry Standards: National Design Specification for Metal

DSB-22:

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

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-1988, ESR-2362, ESR-2685, ESR-3282 ESR-4722, ESL-1388

Design General Notes

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

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

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MiTek



MiTek Engineering Reference Sheet: MII-7473 rev. 1/2/2023

General Safety Notes

Damage or Personal Injury Failure to Follow Could Cause Property

- Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI
- Ņ 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.
- Never exceed the design loading shown and never stack materials on inadequately braced trusses.
- Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
- Cut members to bear tightly against each other

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- joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1. Place plates on each face of truss at each
- Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
- Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.

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