

Trenco

818 Soundside Rd
Edenton, NC 27932

Re: 25-4377-A
RGA 466 ROOF

The truss drawing(s) referenced below have been prepared by Truss Engineering Co. under my direct supervision based on the parameters provided by Riverside Roof Truss.

Pages or sheets covered by this seal: I75244243 thru I75244275

My license renewal date for the state of North Carolina is December 31, 2025.

North Carolina COA: C-0844



July 31, 2025

Gilbert, Eric

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

Job	Truss	Truss Type	Qty	Ply	RG A 466 ROOF
25-4377-A	G01	Common Girder	1	2	175244243

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

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ID:bvA_Tz0lty19PgKiShYYglyupVV-Z1D09dEYPVwufDPFTdMkwkPeZBHSZMSr2Cw2pSyTESI

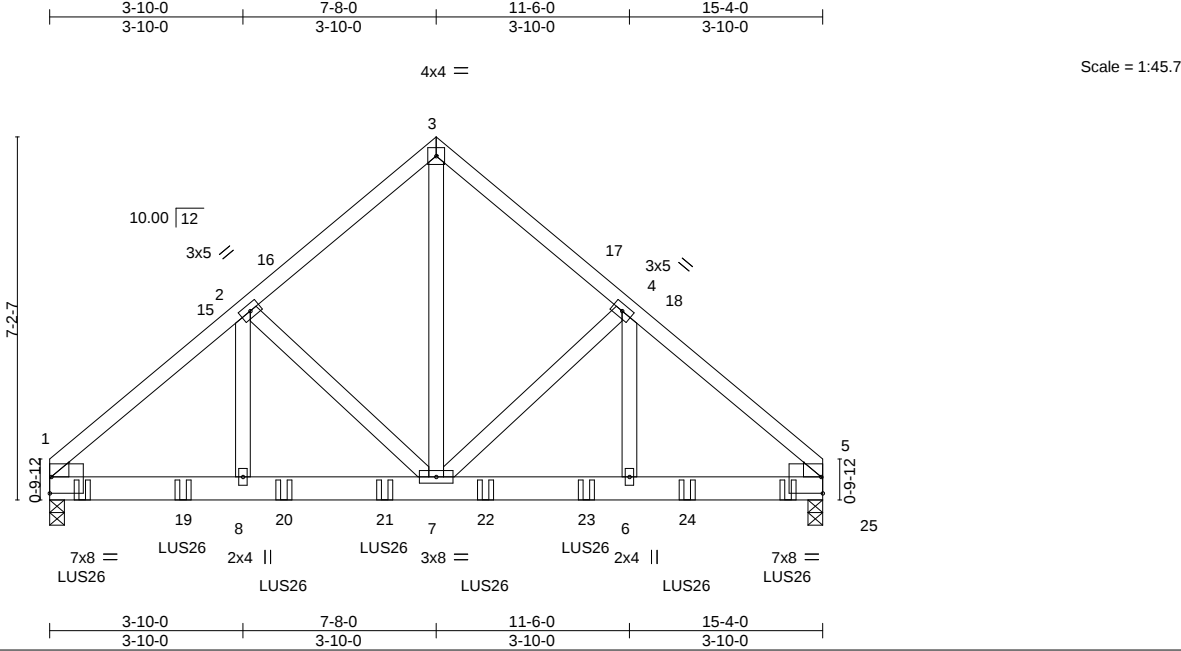


Plate Offsets (X,Y)-- [1:Edge,0-3-14], [5:Edge,0-3-14]							
LOADING (psf)		SPACING-		CSI.		DEFL.	
TCLL (roof)	30.0	2-0-0		TC	0.24	in (loc)	l/defl
Snow (Pf/Pg)	23.1/30.0	Plate Grip DOL	1.15	BC	0.47	7-8	>999
TCDL	10.0	Lumber DOL	1.15	WB	0.52	7-8	>999
BCLL	0.0 *	Rep Stress Incr	NO	Matrix-MS		5	n/a
BCDL	10.0	Code IRC2021/TPI2014					n/a
						PLATES	
						MT20	
						GRIP	
						244/190	
						Weight: 202 lb	
						FT = 20%	

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

REACTIONS. (size) 1=0-3-8, 5=0-3-8
Max Horz 1=-150(LC 43)
Max Uplift 1=-146(LC 16), 5=-145(LC 17)
Max Grav 1=3010(LC 2), 5=2978(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-3147/224, 2-3=-2317/234, 3-4=-2317/234, 4-5=-3183/225
BOT CHORD 1-8=-168/2337, 7-8=-168/2337, 6-7=-110/2367, 5-6=-110/2367
WEBS 3-7=-194/2524, 4-7=-926/171, 4-6=-20/920, 2-7=-884/169, 2-8=-17/872

- NOTES-**
- 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc.
Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
 - All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
 - Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 7-8-0, Exterior(2R) 7-8-0 to 10-8-0, Interior(1) 10-8-0 to 15-4-0 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 1=146, 5=145.
 - Use Simpson Strong-Tie LUS26 (4-10d Girder, 3-10d Truss) or equivalent spaced at 2-0-0 oc max. starting at 0-7-12 from the left end to 14-7-12 to connect truss(es) to back face of bottom chord.
 - Fill all nail holes where hanger is in contact with lumber.



July 31,2025

COMMON CASE(S) Standard			
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.sbcacompnents.com)		ENGINEERING BY TRENCO A MiTek Affiliate 818 Soundside Road Edenton, NC 27932	

Job	Truss	Truss Type	Qty	Ply	RG4 466 ROOF	I75244243
25-4377-A	G01	Common Girder	1	2	Job Reference (optional)	

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:38 2025 Page 2
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LOAD CASE(S) Standard

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

Uniform Loads (plf)

Vert: 1-3=-66, 3-5=-66, 9-12=-20

Concentrated Loads (lb)

Vert: 11=-520(B) 19=-517(B) 20=-517(B) 21=-517(B) 22=-517(B) 23=-517(B) 24=-517(B) 25=-520(B)

Eric Gilbert



July 31,2025

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ENGINEERING BY

TRENCO

A MiTek Affiliate

818 Soundside Road
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	J01	Jack-Closed	8	1		175244244

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

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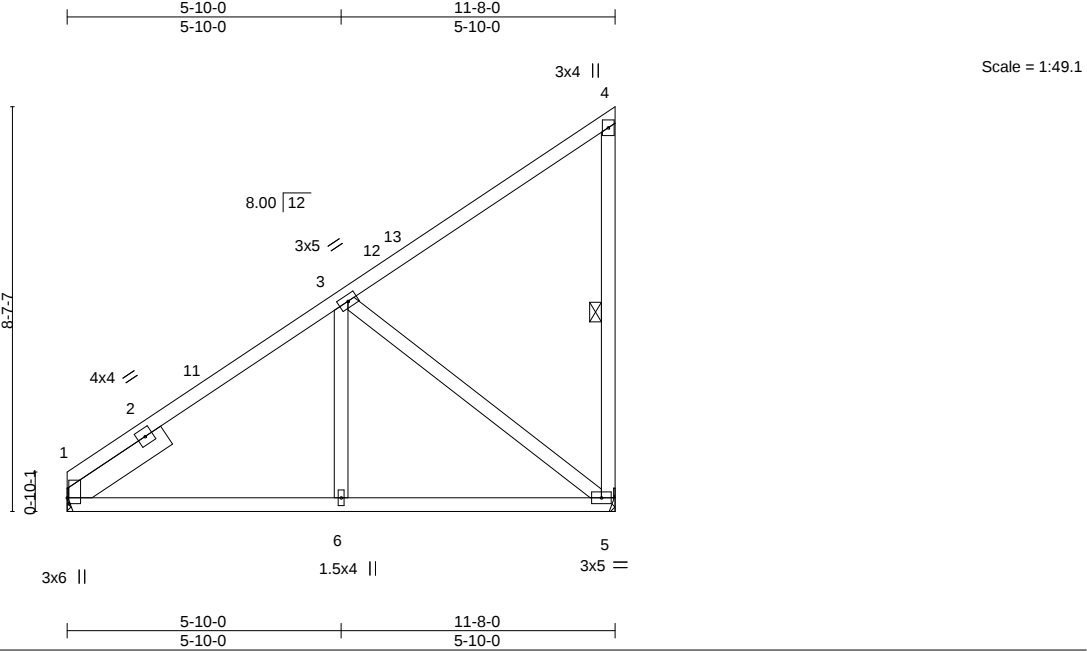


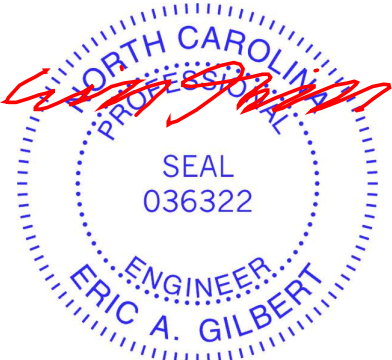
Plate Offsets (X,Y)-- [1:0-1-8,0-0-7]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.80	Vert(LL)	-0.03 5-6 >999 360	MT20	244/190
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.32	Vert(CT)	-0.06 5-6 >999 240		
TCDL	10.0	Rep Stress Incr	YES	WB	0.56	Horz(CT)	-0.01 1 n/a n/a		
BCLL	0.0 *	Code IRC2021/TPI2014		Matrix-MS					
BCDL	10.0							Weight: 73 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 6'-0-0 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10'-0-0 oc bracing.
WEBS	2x4 SP No.3	WEBS	1 Row at midpt 4-5
SLIDER	Left 2x6 SP No.2 2-6-0		

REACTIONS. (size) 1=Mechanical, 5=Mechanical
Max Horz 1=288(LC 15)
Max Uplift 1=-14(LC 16), 5=-86(LC 13)
Max Grav 1=576(LC 2), 5=653(LC 22)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-547/113, 4-5=-259/154
BOT CHORD 1-6=-240/486, 5-6=-240/486
WEBS 3-6=0/256, 3-5=-569/184

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 11-6-4 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
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3'-6-0 tall by 2'-0-0 wide will fit between the bottom chord and any other members.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5.

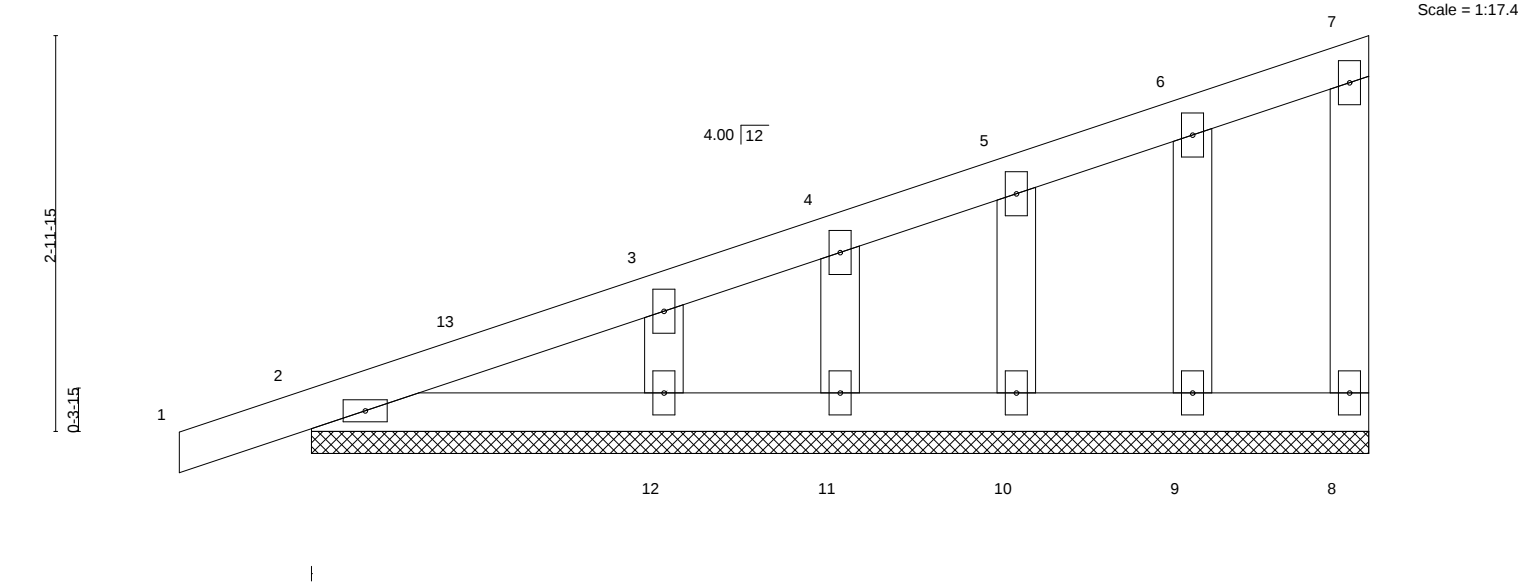


July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF	175244245
25-4377-A	M01	GABLE	1	1	Job Reference (optional)	

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

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ID:bvA_Tz0lty19PgKiShYYglyupVV-1DnOMzFBAp2IHN_R0KuzSyxqwbk9lx1_HsfbLuytESk
8-0-0
8-0-0



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.13	Vert(LL) 0.00	1	n/r	180	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.05	Vert(CT) 0.00	1	n/r	120		
TCDL 10.0	Lumber DOL 1.15	WB 0.05	Horz(CT) 0.00	8	n/a	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-P						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 38 lb	FT = 20%

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

REACTIONS. All bearings 8-0-0.
(lb) - Max Horz 2=112(LC 13)
Max Uplift All uplift 100 lb or less at joint(s) 8, 2, 9, 10, 11, 12
Max Grav All reactions 250 lb or less at joint(s) 8, 2, 9, 10, 11 except 12=270(LC 23)

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

NOTES-

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-0-0 to 2-0-0, Exterior(2N) 2-0-0 to 7-10-4 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
- 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 1-4-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 2, 9, 10, 11, 12.



July 31,2025

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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ENGINEERING BY
TRENCO
A MiTek Affiliate

818 Soundside Road
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF	175244246
25-4377-A	M02	Monopitch	10	1	Job Reference (optional)	

Riverside Roof Truss, LLC, Danville, Va - 24541, 8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:39 2025 Page 1
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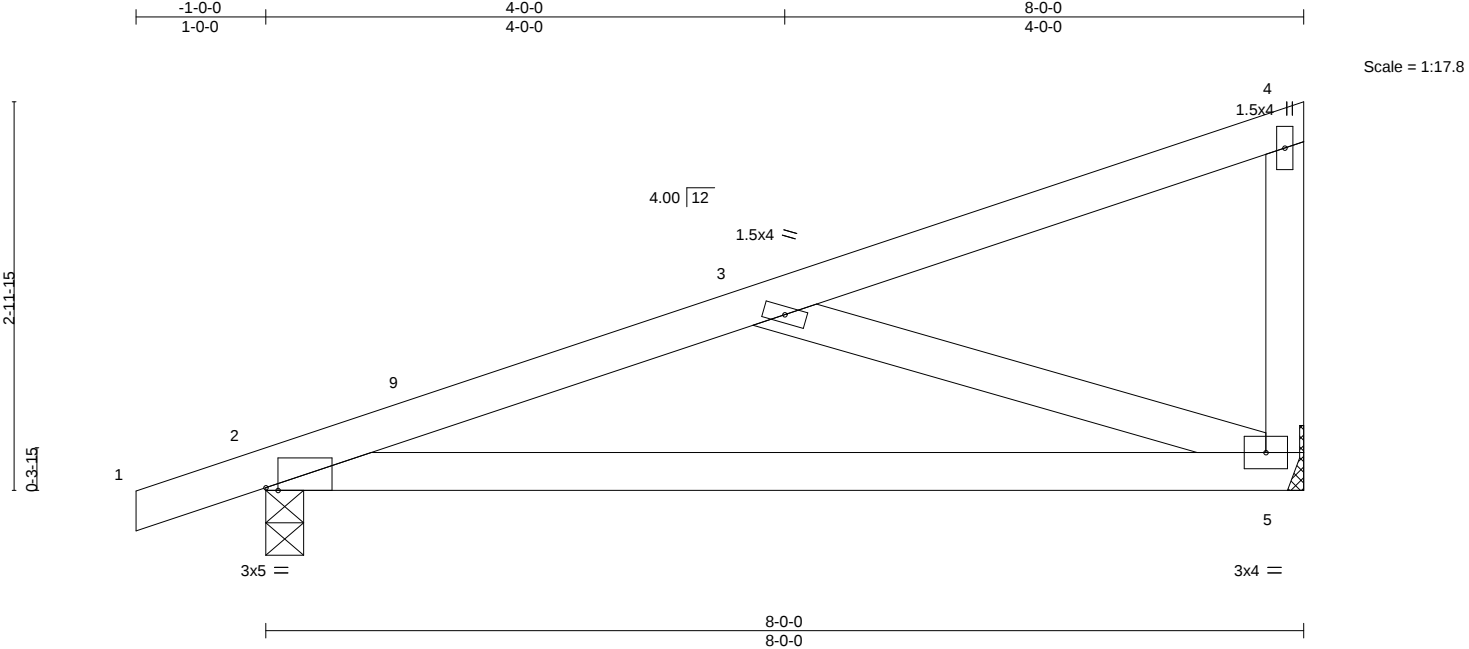


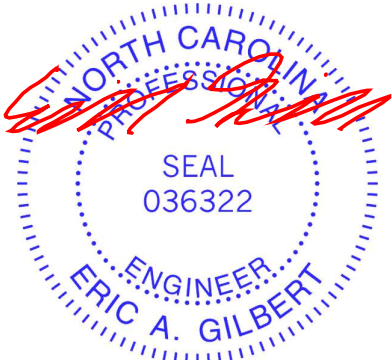
Plate Offsets (X,Y)-- [2:0-1-2,Edge]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.50	Vert(LL)	-0.10 5-8 >956 360	MT20	244/190
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.53	Vert(CT)	-0.20 5-8 >466 240		
TCDL	10.0	Rep Stress Incr	YES	WB	0.29	Horz(CT)	0.01 5 n/a n/a		
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MP				Weight: 36 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, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 9-5-9 oc bracing.
WEBS	2x4 SP No.3		

REACTIONS. (size) 2=0-3-8, 5=Mechanical
Max Horz 2=112(LC 15)
Max Uplift 2=-82(LC 12), 5=-57(LC 16)
Max Grav 2=492(LC 23), 5=448(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-784/294
BOT CHORD 2-5=-376/740
WEBS 3-5=-775/360

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 7-10-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCCL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 5.



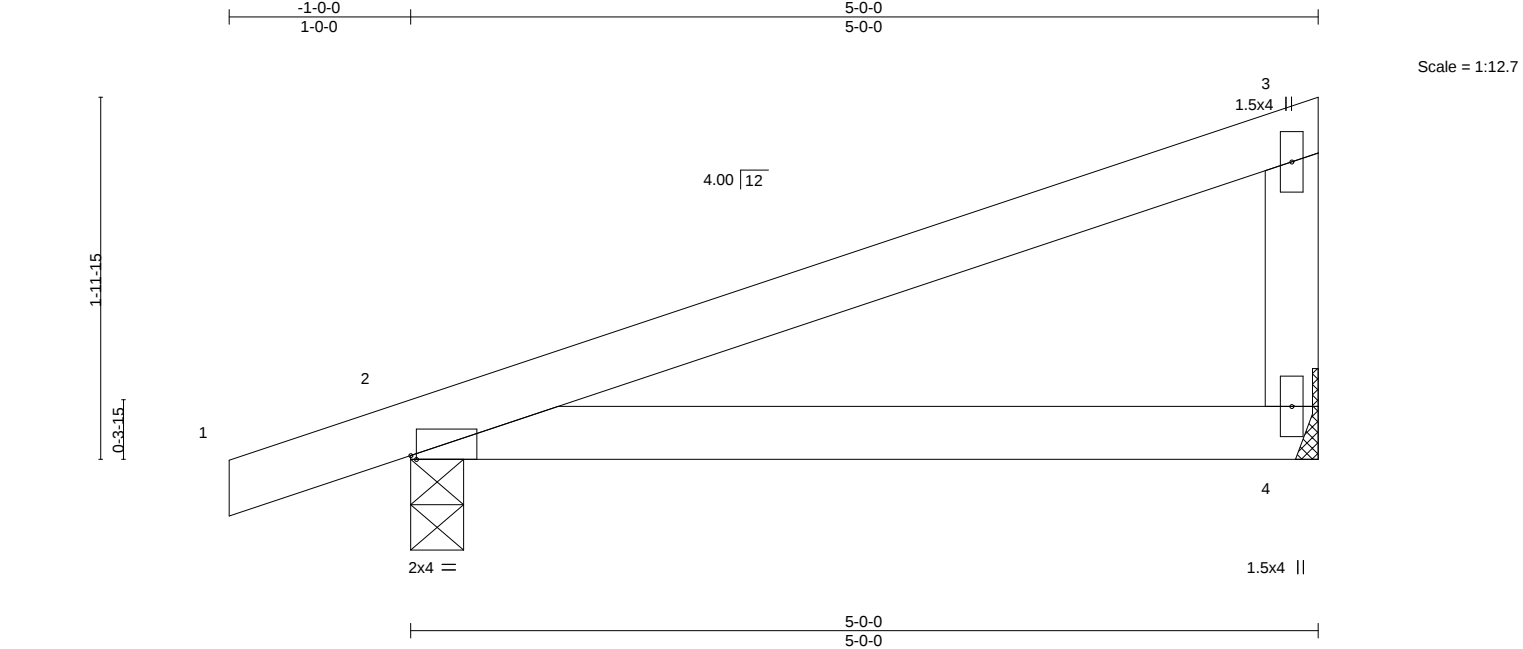
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	M03	Monopitch	8	1	175244247

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

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ID:bvA_Tz0lty19PgKiShYYglyupVV-1DnOMzFBAp2IHn_R0KuzSyxIObehlxs_HsfbLuytESk



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.49	Vert(LL)	-0.05	MT20		244/190	
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.40	Vert(CT)	-0.08				
TCDL	10.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00				
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MP							
BCDL	10.0										

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 5'-0'-0" oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10'-0'-0" oc bracing.
WEBS	2x4 SP No.3		

REACTIONS. (size) 4=Mechanical, 2=0-3-8
Max Horz 2=72(LC 15)
Max Uplift 4=-34(LC 16), 2=-67(LC 12)
Max Grav 4=271(LC 23), 2=387(LC 23)

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1'-0'-0" to 2'-0'-0", Interior(1) 2'-0'-0" to 4'-10'-4" zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCCL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3'-6"-0" tall by 2'-0'-0" wide will fit between the bottom chord and any other members.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG 466 ROOF	175244248
25-4377-A	M04	Monopitch	4	1	Job Reference (optional)	

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

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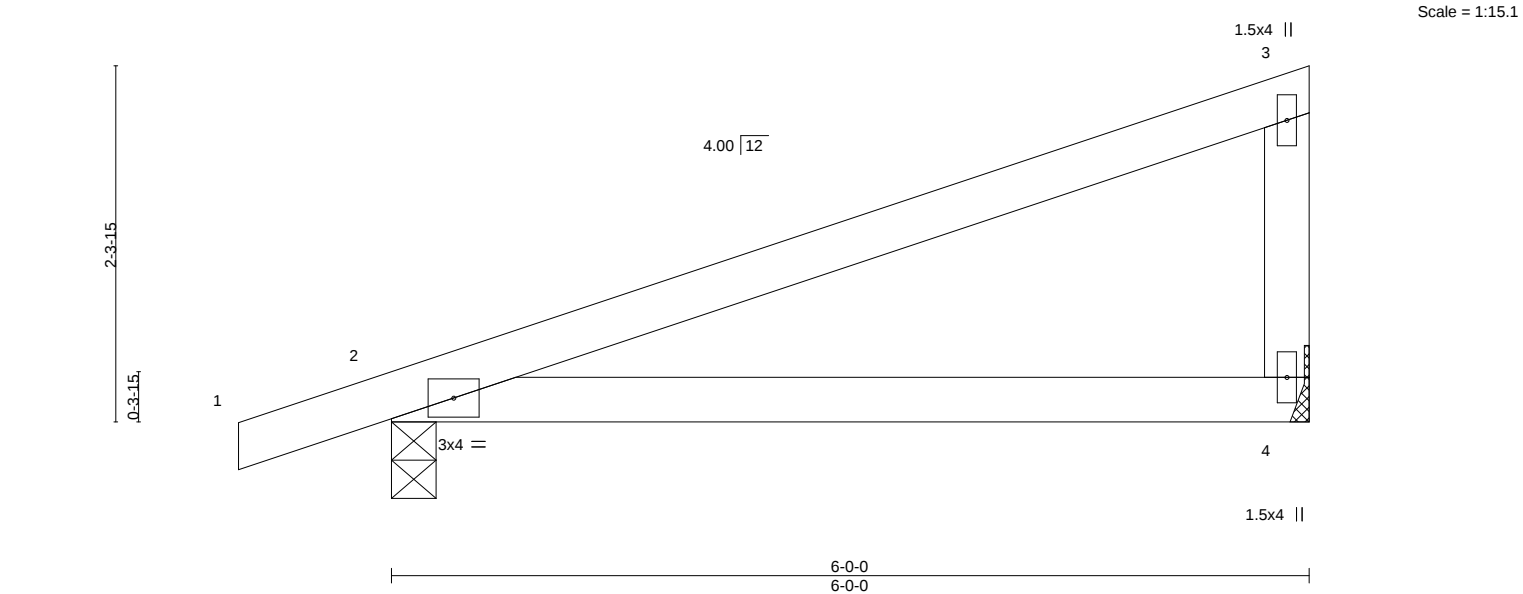
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-1-0-0

1-0-0

6-0-0

6-0-0



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.76	Vert(LL)	-0.10	4-7	>702	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.60	Vert(CT)	-0.17	4-7	>418		
TCDL 10.0	Lumber DOL 1.15	WB 0.00	Horz(CT)	0.00	2	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-MP						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 23 lb	FT = 20%

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

REACTIONS. (size) 4=Mechanical, 2=0-3-8
 Max Horz 2=85(LC 15)
 Max Uplift 4=-42(LC 16), 2=-72(LC 12)
 Max Grav 4=331(LC 23), 2=443(LC 23)

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 5-10-4 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.



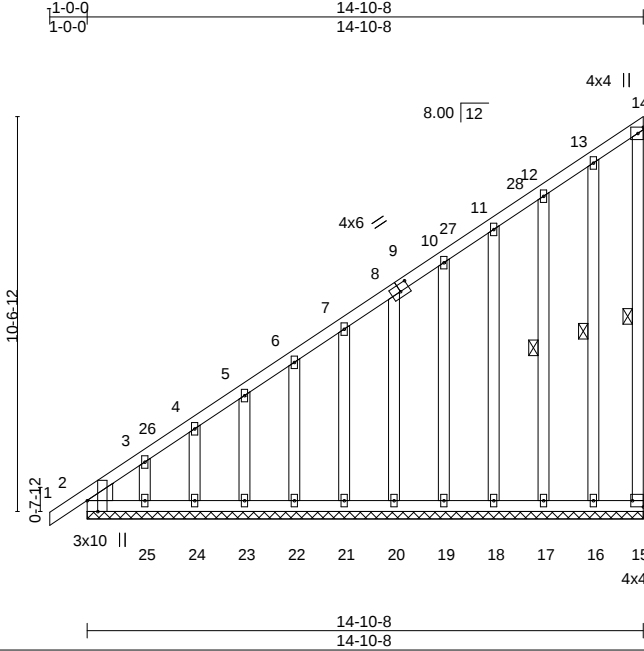
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	M05	GABLE	1	1		175244249

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:41 2025 Page 1

ID:bvA_Tz0lty19PgKiShYYglyupVV-zcv9nfGRiQITWh7q8lwRYN11XPKhmoyHIA8iQnytESi



Scale = 1:61.6

Plate Offsets (X,Y)-- [2:0-3-8,Edge], [9:0-3-0,0-2-4], [15:Edge,0-3-8]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.77	Vert(LL)	-0.00 1 n/r 180	MT20	GRIP 244/190
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.37	Vert(CT)	-0.00 1 n/r 120		
TCDL	10.0	Rep Stress Incr	YES	WB	0.15	Horz(CT)	0.00 15 n/a n/a		
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-S				Weight: 143 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, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.2	WEBS	1 Row at midpt 14-15, 13-16, 12-17
OTHERS	2x4 SP No.3		
WEDGE			
Left: 2x6 SP No.2			

REACTIONS. All bearings 14-10-8.
(lb) - Max Horz 2=369(LC 13)
Max Uplift All uplift 100 lb or less at joint(s) 15, 16, 17, 18, 19, 20, 21, 2, 22, 23, 24, 25
Max Grav All reactions 250 lb or less at joint(s) 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25 except 2=271(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-722/483, 3-4=-600/406, 4-5=-550/383, 5-6=-504/360, 6-7=-456/337, 7-8=-409/314, 8-10=-361/291, 10-11=-314/268, 11-12=-268/247

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-0-0 to 2-0-0, Exterior(2N) 2-0-0 to 14-8-12 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 15, 16, 17, 18, 19, 20, 21, 2, 22, 23, 24, 25.
 - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2.



July 31,2025

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)

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

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	M06	Monopitch	10	1	175244250

Riverside Roof Truss, LLC, Danville, Va - 24541, 8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:41 2025 Page 1
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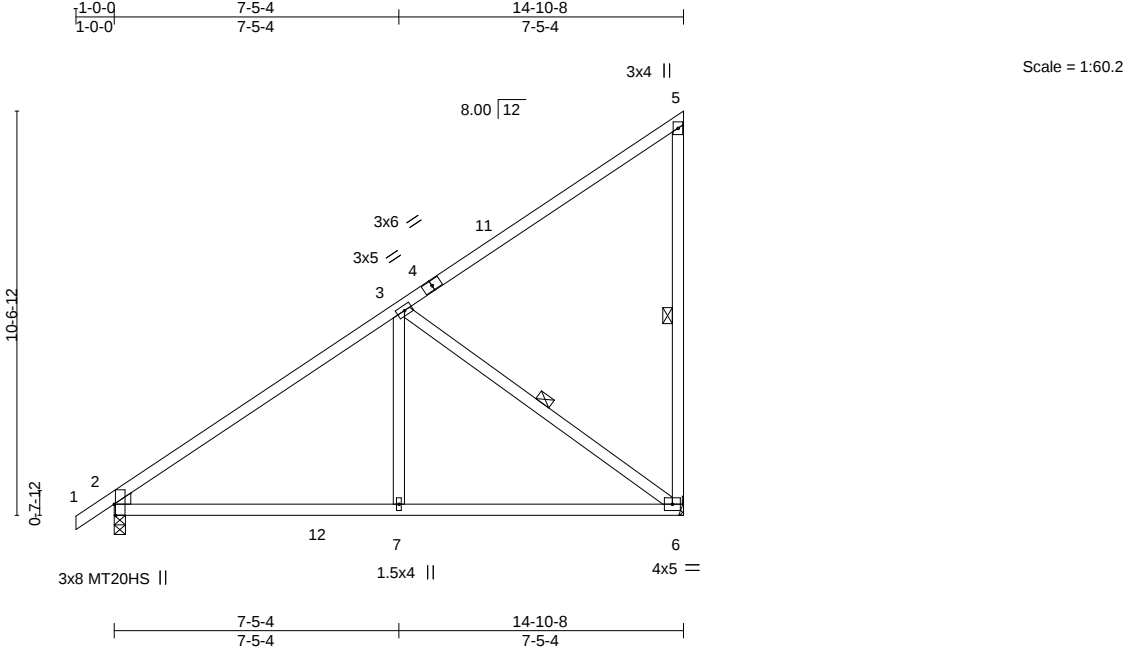


Plate Offsets (X,Y)-- [2:0-3-8,Edge]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	2-0-0		TC	0.89	in (loc)	l/defl	MT20	GRIP
Snow (Pf/Pg)	23.1/30.0	Plate Grip DOL	1.15	BC	0.62	Vert(LL)	-0.08 7-10 >999	MT20HS	244/190
TCDL	10.0	Lumber DOL	1.15	WB	0.37	Vert(CT)	-0.14 6-7 >999		187/143
BCLL	0.0 *	Rep Stress Incr	YES	Matrix-MS		Horz(CT)	0.02 2 n/a		
BCDL	10.0	Code IRC2021/TPI2014						Weight: 87 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2 *Except* 1-4: 2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3 *Except* 5-6: 2x4 SP No.2	WEBS	1 Row at midpt 5-6, 3-6
WEDGE			
Left: 2x4 SP No.3			

REACTIONS. (size) 6=Mechanical, 2=0-3-8
Max Horz 2=370(LC 15)
Max Uplift 6=-158(LC 16), 2=-48(LC 16)
Max Grav 6=879(LC 30), 2=847(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-976/127, 3-5=-294/204, 5-6=-316/159
BOT CHORD 2-7=-272/773, 6-7=-272/773
WEBS 3-7=0/376, 3-6=-897/236

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 14-8-12 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 6=158.



July 31,2025

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

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	M07	Monopitch	8	1	175244251

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:42 2025 Page 1

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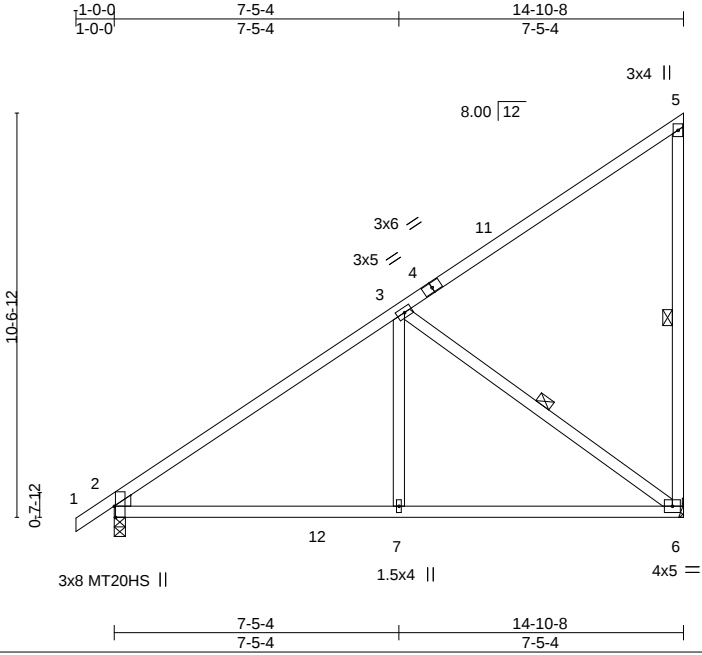
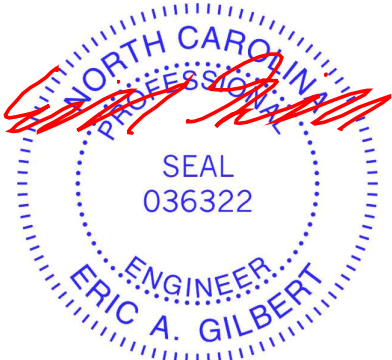


Plate Offsets (X,Y)-- [2:0-3-8,Edge]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	2-0-0		TC	0.89	in (loc)	l/defl	L/d	GRIP
Snow (Pf/Pg)	23.1/30.0	Plate Grip DOL	1.15	BC	0.62	Vert(LL)	-0.08 7-10	>999 360	MT20 244/190
TCDL	10.0	Lumber DOL	1.15	WB	0.37	Vert(CT)	-0.14 6-7	>999 240	MT20HS 187/143
BCLL	0.0 *	Rep Stress Incr	YES	Matrix-MS		Horz(CT)	0.02 2	n/a n/a	Weight: 87 lb FT = 20%
BCDL	10.0	Code IRC2021/TPI2014							

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2 *Except* 1-4: 2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3 *Except* 5-6: 2x4 SP No.2	WEBS	1 Row at midpt 5-6, 3-6
WEDGE Left: 2x4 SP No.3			
REACTIONS. (size) 6=Mechanical, 2=0-3-8 Max Horz 2=370(LC 15) Max Uplift 6=-158(LC 16), 2=-48(LC 16) Max Grav 6=879(LC 30), 2=847(LC 31)			
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.			
TOP CHORD	2-3=-976/127, 3-5=-294/204, 5-6=-316/159		
BOT CHORD	2-7=-272/773, 6-7=-272/773		
WEBS	3-7=0/376, 3-6=-897/236		

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 14-8-12 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are MT20 plates unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 6=158.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	M08	GABLE	1	1	175244252

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:42 2025 Page 1

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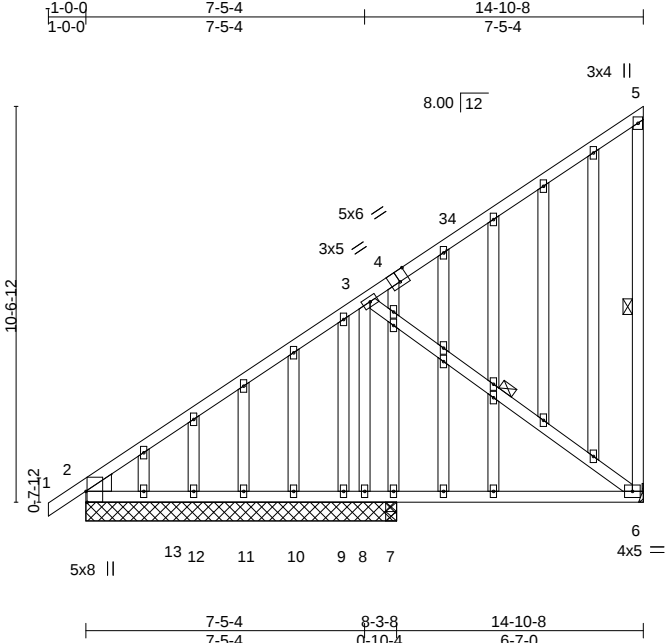


Plate Offsets (X,Y)-- [2:0-3-8,Edge], [4:0-3-0,Edge]									
LOADING (psf)		SPACING-	2-0-0	CSI.	DEFL.			PLATES	GRIP
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC 0.91	in	(loc)	l/defl	L/d	
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC 0.42	Vert(LL)	-0.05	6-7	>999	360
TCDL	10.0	Rep Stress Incr	YES	WB 0.25	Vert(CT)	-0.09	6-7	>866	240
BCLL	0.0 *	Code IRC2021/TPI2014		Matrix-MS	Horz(CT)	0.00	6	n/a	n/a
BCDL	10.0								
								Weight: 159 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2 *Except* 1-4: 2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3 *Except* 5-6: 2x4 SP No.2	WEBS	1 Row at midpt 5-6, 3-6
OTHERS	2x4 SP No.3		
WEDGE			
Left: 2x6 SP No.2			

REACTIONS. All bearings 8-3-8 except (jt=length) 6=Mechanical.

(lb) - Max Horz 2=370(LC 15)

Max Uplift All uplift 100 lb or less at joint(s) 2, 11, 12 except 8=294(LC 25), 6=132(LC 16), 13=205(LC 16)

Max Grav All reactions 250 lb or less at joint(s) 7, 9, 10, 11, 12, 2 except 8=276(LC 23), 6=470(LC 30), 2=331(LC 31), 7=499(LC 27), 13=369(LC 30)

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

TOP CHORD 2-3=-410/214, 3-5=-292/206, 5-6=-317/162

BOT CHORD 2-13=-238/266, 12-13=-238/266, 11-12=-238/266, 10-11=-238/266, 9-10=-238/266, 8-9=-238/266, 7-8=-238/266, 6-7=-238/266

WEBS 3-8=-459/131

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 14-8-12 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.

Connector on gable(s) for truss to truss connections.



July 31,2025

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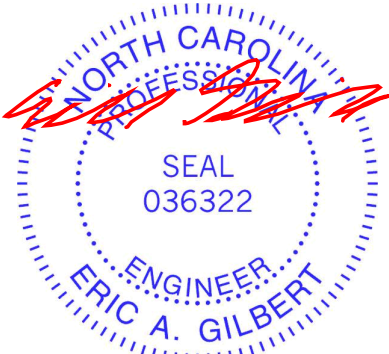
818 Soundside Road
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	M08	GABLE	1	1	175244252

Riverside Roof Truss, LLC,
Danville, Va - 24541,
8.830 s Jun 11 2025
MiTek Industries, Inc.
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Page 2
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NOTES-

12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 11, 12, 2 except (jt=lb) 8=294, 6=132, 13=205.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T01	Common	1	1	175244253

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:43 2025 Page 1

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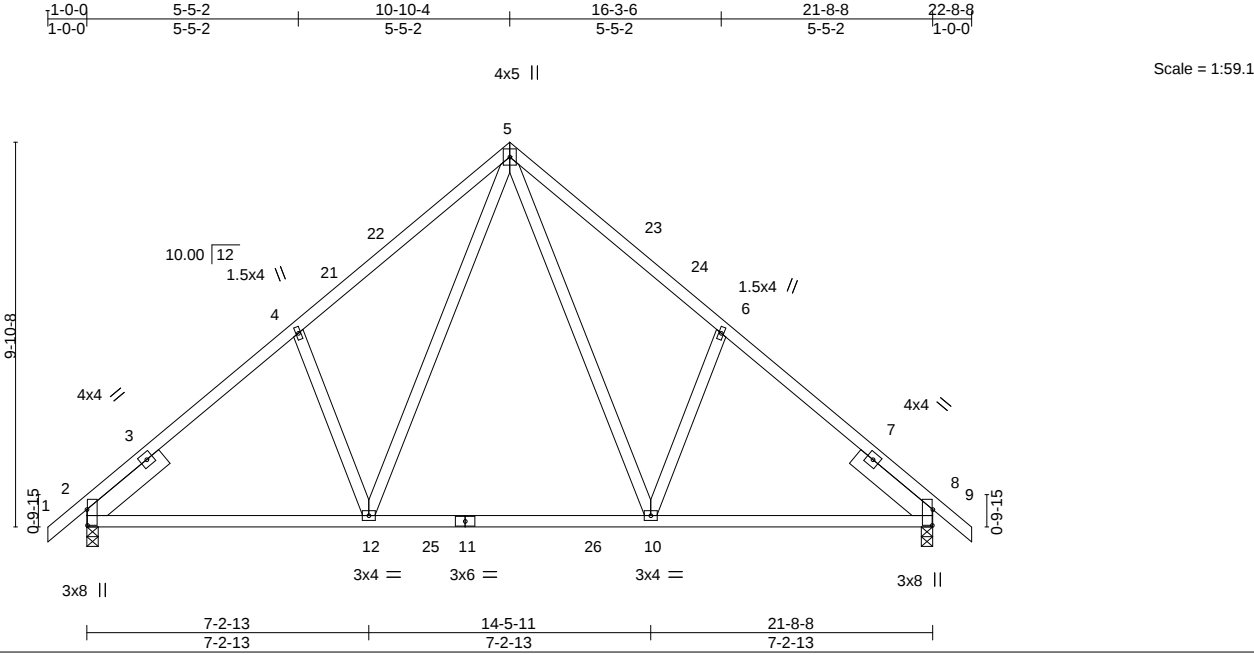


Plate Offsets (X,Y)-- [2:0-4-14,0-0-3], [8:0-4-14,0-0-3]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.81	in (loc)	l/defl	L/d	GRIP
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.58	Vert(LL)	-0.13 10-12	>999	244/190
TCDL	10.0	Rep Stress Incr	YES	WB	0.32	Vert(CT)	-0.19 10-12	>999	
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MS		Horz(CT)	0.03 8	n/a	
BCDL	10.0								
								Weight: 135 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-9-12 oc purlins.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3		
SLIDER	Left 2x6 SP No.2 2-6-0, Right 2x6 SP No.2 2-6-0		

REACTIONS. (size) 2=0-3-8, 8=0-3-8
Max Horz 2=232(LC 15)
Max Uplift 2=-81(LC 16), 8=-81(LC 17)
Max Grav 2=1211(LC 30), 8=1211(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1306/126, 4-5=-1253/224, 5-6=-1253/225, 6-8=-1306/126
BOT CHORD 2-12=-115/1093, 10-12=0/735, 8-10=-11/977
WEBS 5-10=-161/661, 6-10=-356/243, 5-12=-161/661, 4-12=-356/243

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 10-10-4 to 13-10-4, Interior(1) 13-10-4 to 22-8-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 8.



July 31,2025

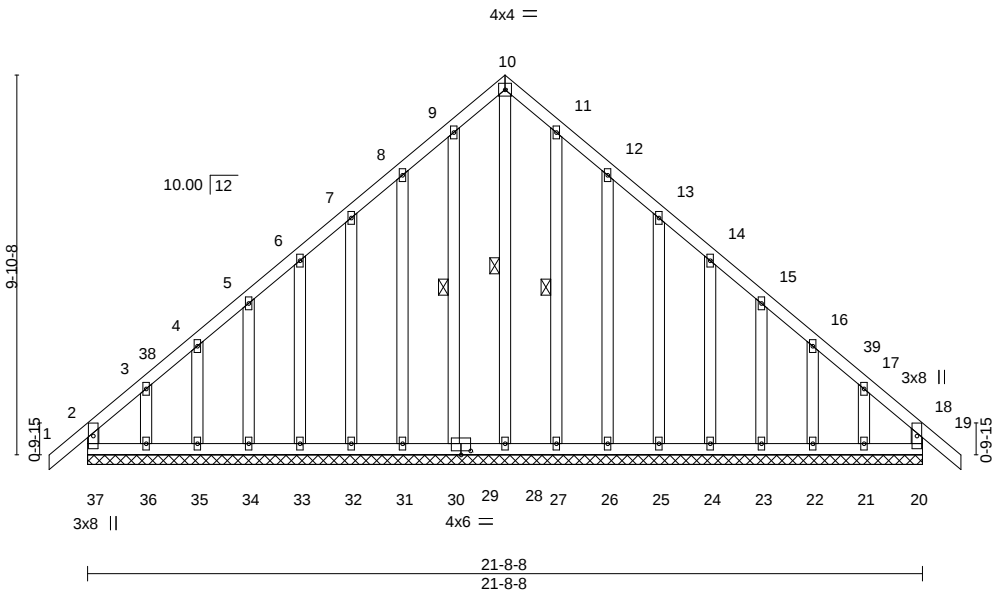
Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	T01GE	GABLE	1	1		175244254

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:44 2025 Page 1

ID:bvA_Tz0lty19PgKiShYYglyupVV-NBaHPhJJ_Lg2N8sPpuT89?fh8cQmz9djR8NM06ytESf

21-8-8 22-8-8 10-10-4 1-0-0 1-0-0 1-0-0



LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES		GRIP	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.17	Vert(LL)	-0.01 19 n/r 180	MT20		244/190	
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.09	Vert(CT)	-0.01 19 n/r 120				
TCDL	10.0	Rep Stress Incr	YES	WB	0.16	Horz(CT)	0.01 20 n/a n/a				
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-R							
BCDL	10.0										

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS	2x4 SP No.3	WEBS	1 Row at midpt 10-28, 9-30, 11-27
OTHERS	2x4 SP No.3		

REACTIONS. All bearings 21-8-8.
(lb) - Max Horz 37=-253(LC 14)
Max Uplift All uplift 100 lb or less at joint(s) 20, 30, 31, 32, 33, 34, 35, 27, 26, 25, 24, 23, 22 except 37=-120(LC 12), 36=-153(LC 16), 21=-139(LC 17)
Max Grav All reactions 250 lb or less at joint(s) 20, 28, 30, 31, 32, 33, 34, 35, 36, 27, 26, 25, 24, 23, 22, 21 except 37=258(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 9-10=-149/275, 10-11=-149/275
WEBS 10-28=-279/113

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-0-0 to 2-0-0, Exterior(2N) 2-0-0 to 10-10-4, Corner(3R) 10-10-4 to 13-10-4, Exterior(2N) 13-10-4 to 22-8-8 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 20, 30, 31, 32, 33, 34, 35, 27, 26, 25, 24, 23, 22 except (jt=lb) 37=120, 36=153, 21=139.

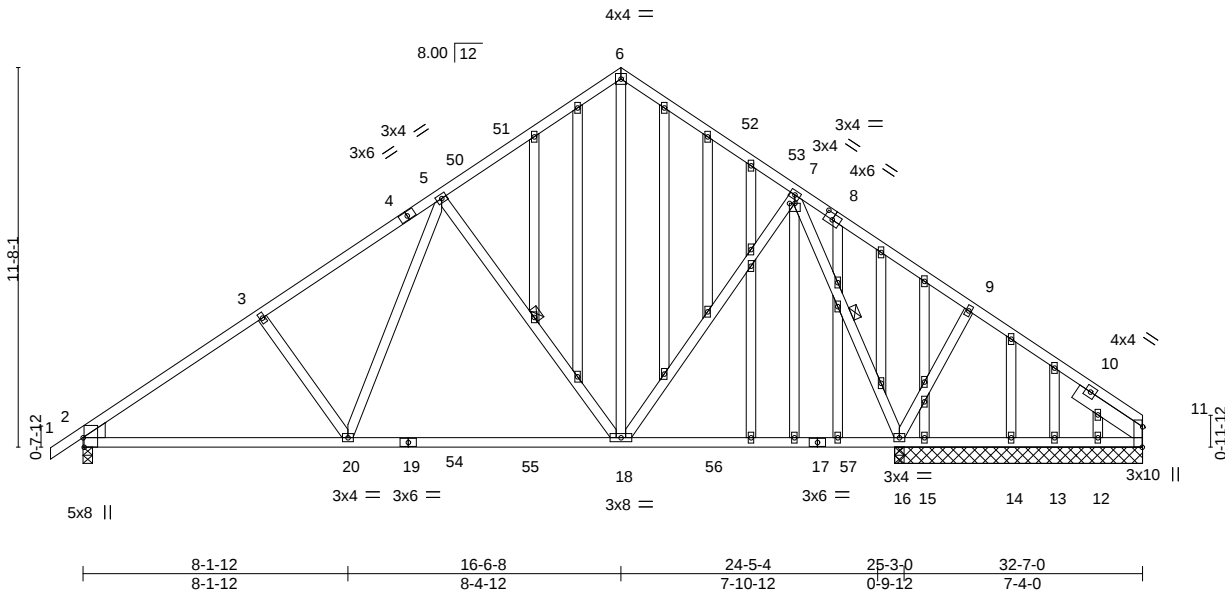


July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	T01SGE	GABLE	1	1		175244255

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:45 2025 Page 1
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Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T01SGE	GABLE	1	1	175244255

Riverside Roof Truss, LLC,
Danville, Va - 24541,
8.830 s Jun 11 2025
MiTek Industries, Inc.
Tue Jul 29 10:18:45 2025
Page 2
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NOTES-

11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 16, 13 except (jt=lb) 2=113, 11=140, 15=377, 12=120, 11=140.

Eric Gilbert



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T02	Common	4	1	175244256

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:46 2025 Page 1

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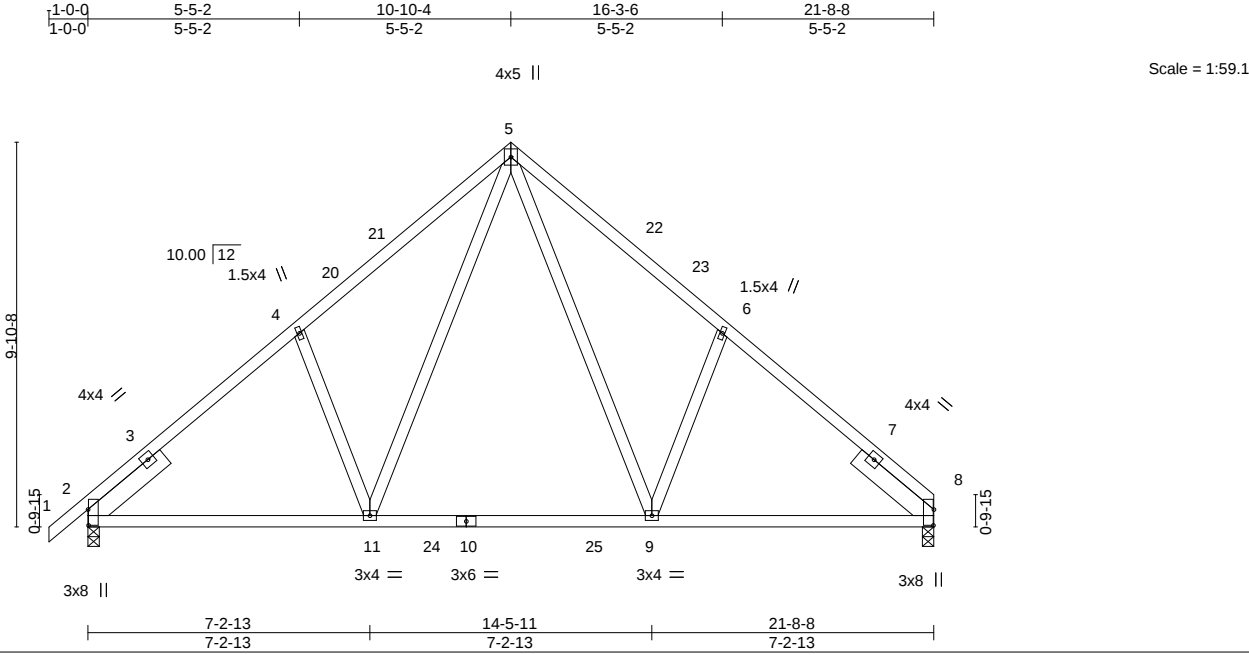


Plate Offsets (X,Y)-- [2:0-4-14,0-0-3], [8:0-4-14,0-0-3]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.81	in (loc)	l/defl	MT20	GRIP
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.59	9-11	>999		244/190
TCDL	10.0	Rep Stress Incr	YES	WB	0.33	9-11	>999		
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MS		8	n/a		
BCDL	10.0						n/a	Weight: 133 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-8-10 oc purlins.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3		
SLIDER	Left 2x6 SP No.2 2-6-0, Right 2x6 SP No.2 2-6-0		

REACTIONS. (size) 8=0-3-8, 2=0-3-8
Max Horz 2=225(LC 13)
Max Uplift 8=-62(LC 17), 2=-81(LC 16)
Max Grav 8=1138(LC 31), 2=1212(LC 30)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1308/126, 4-5=-1254/224, 5-6=-1259/226, 6-8=-1310/128
BOT CHORD 2-11=-128/1084, 9-11=0/726, 8-9=-24/972
WEBS 5-9=-162/669, 6-9=-361/244, 5-11=-161/661, 4-11=-356/243

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 10-10-4, Exterior(2R) 10-10-4 to 13-10-4, Interior(1) 13-10-4 to 21-8-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 2.



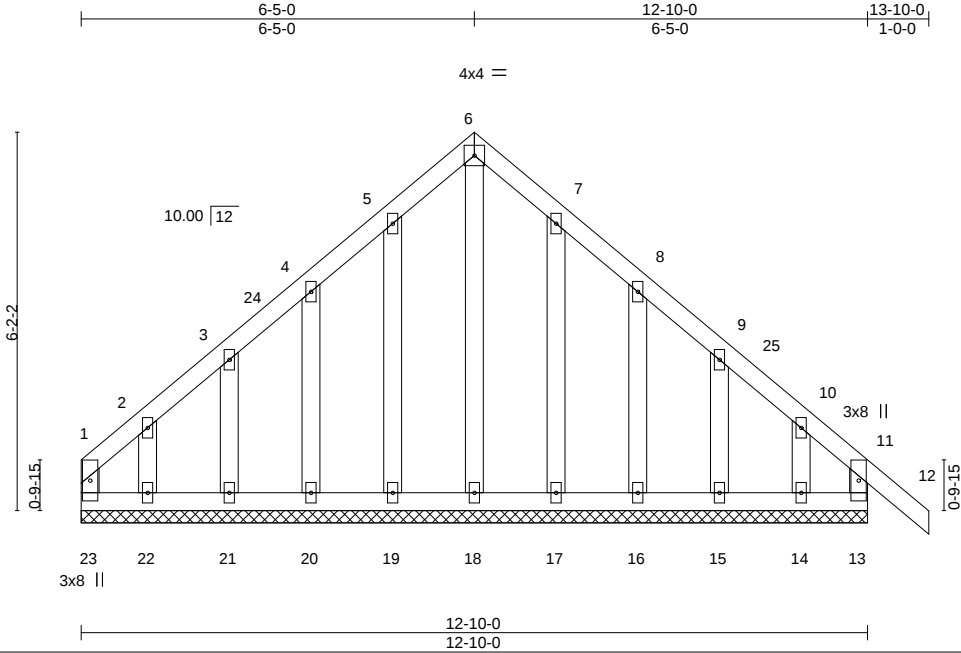
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T02GE	GABLE	1	1	175244257

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:47 2025 Page 1
ID: bvA_Tz0lty19PgKiShYYglyupVV-omGQ1iLCHG2cEcbzU01rneHCOpS0AWg976b0dRytESc



LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.17	in (loc) l/defl L/d	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.05	Vert(LL) -0.01 12 n/r 180		
TCDL 10.0	Lumber DOL 1.15	WB 0.14	Vert(CT) -0.01 12 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-R	Horz(CT) 0.00 13 n/a n/a		
BCDL 10.0	Code IRC2021/TPI2014			Weight: 90 lb	FT = 20%

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

REACTIONS. All bearings 12-10-0.
(lb) - Max Horz 23=-159(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 23, 13, 19, 20, 21, 17, 16, 15, 14 except 22=-114(LC 16)
Max Grav All reactions 250 lb or less at joint(s) 23, 13, 18, 19, 20, 21, 22, 17, 16, 15, 14

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) 0-1-12 to 3-1-12, Exterior(2N) 3-1-12 to 6-5-0, Corner(3R) 6-5-0 to 9-5-0, Exterior(2N) 9-5-0 to 13-10-0 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 23, 13, 19, 20, 21, 17, 16, 15, 14 except (jt=lb) 22=-114.



July 31,2025

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.sbcacompnents.com)

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

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T03	Common	7	1	175244258

Riverside Roof Truss, LLC, Danville, Va - 24541, 8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:47 2025 Page 1
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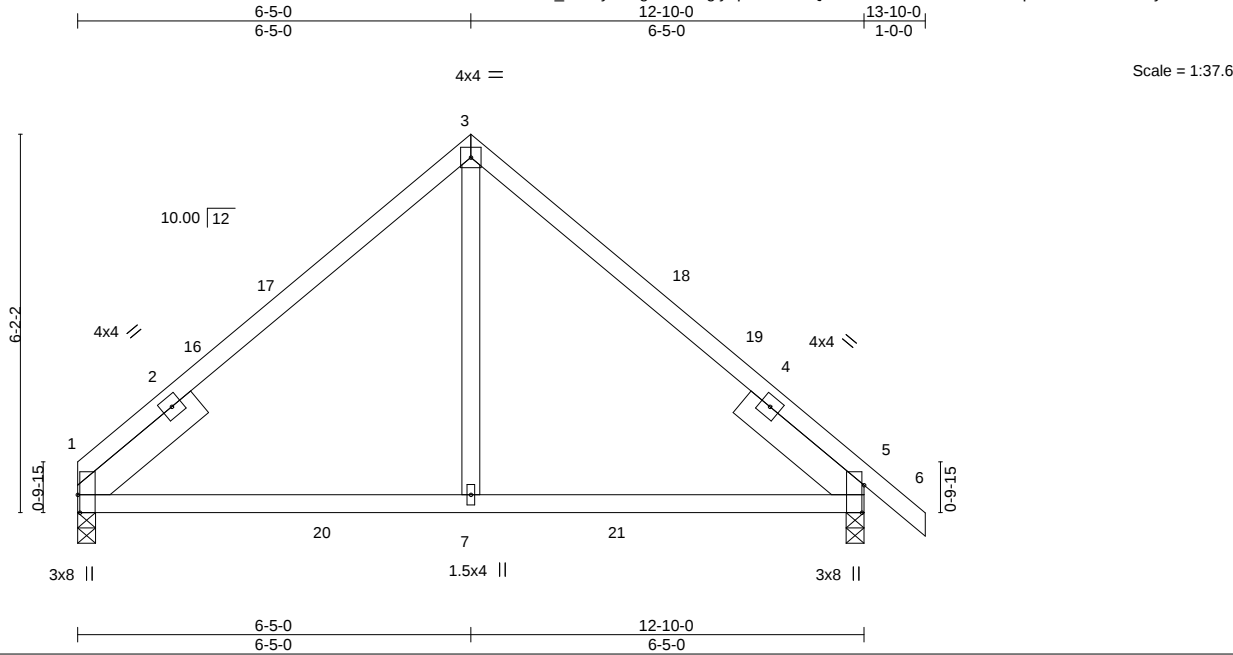


Plate Offsets (X,Y)-- [1:0-3-8,Edge], [5:0-5-6,Edge]															
LOADING (psf)		SPACING-		2-0-0		CSI.		DEFL.				PLATES		GRIP	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.84	Vert(LL)	-0.10	7-10	>999	360	MT20	244/190			
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.68	Vert(CT)	-0.14	7-10	>999	240					
TCDL	10.0	Rep Stress Incr	YES	WB	0.15	Horz(CT)	0.05	1	n/a	n/a					
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MS							Weight: 66 lb	FT = 20%			
BCDL	10.0														

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-4-4 oc purlins.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3		
SLIDER	Left 2x6 SP No.2 2-6-0, Right 2x6 SP No.2 2-6-0		

REACTIONS. (size) 1=0-3-8, 5=0-3-8
Max Horz 1=-139(LC 14)
Max Uplift 1=-35(LC 16), 5=-55(LC 17)
Max Grav 1=688(LC 30), 5=763(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-663/151, 3-5=-665/150
BOT CHORD 1-7=0/502, 5-7=0/502
WEBS 3-7=-1/366

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 6-5-0, Exterior(2R) 6-5-0 to 9-5-0, Interior(1) 9-5-0 to 13-10-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG A 466 ROOF	175244259
25-4377-A	T03GE	GABLE	1	1	Job Reference (optional)	

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:48 2025 Page 1
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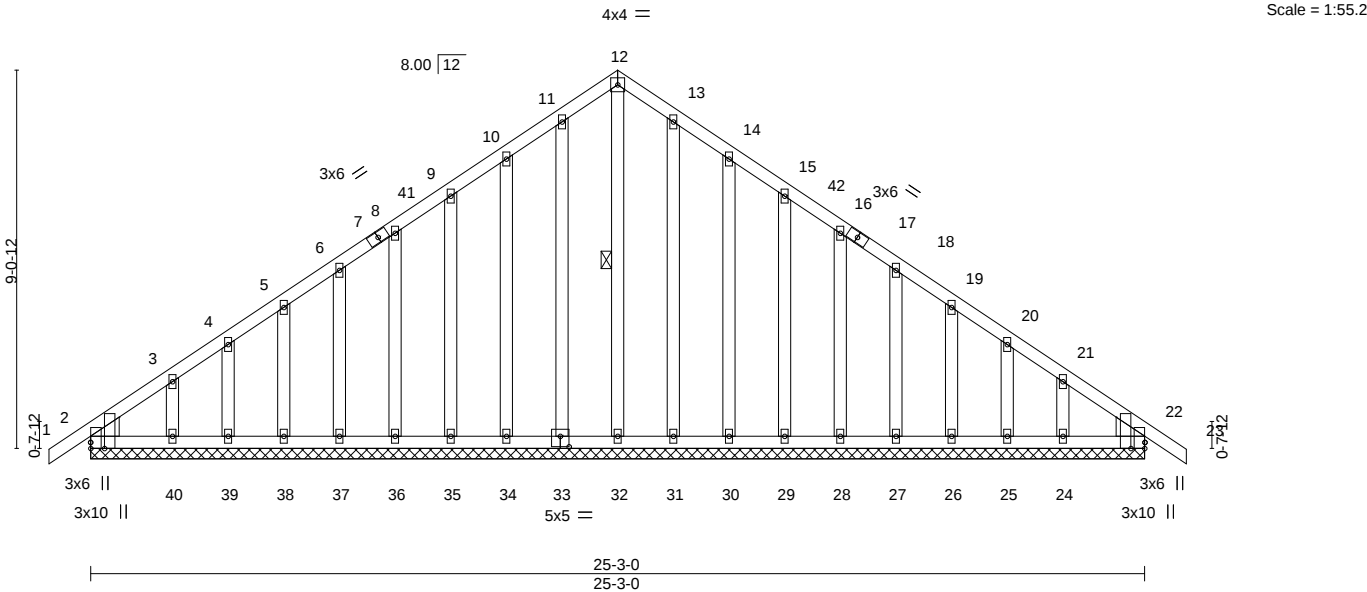


Plate Offsets (X,Y)-- [2:Edge,0-0-1], [2:0-1-12,Edge], [22:0-1-12,Edge], [22:Edge,0-0-1], [33:0-2-8,0-3-0]						
LOADING (psf)		SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof)	30.0	2-0-0	TC 0.09	in (loc) l/defl L/d	MT20	244/190
Snow (Pf/Pg)	23.1/30.0	Plate Grip DOL 1.15	BC 0.02	Vert(LL) -0.00 23 n/r 180		
TCDL	10.0	Lumber DOL 1.15	WB 0.18	Vert(CT) -0.00 23 n/r 120		
BCLL	0.0 *	Rep Stress Incr YES	Matrix-S	Horz(CT) 0.01 22 n/a n/a		
BCDL	10.0	Code IRC2021/TPI2014			Weight: 210 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x4 SP No.1	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 12-32
WEDGE	
Left: 2x6 SP No.2 , Right: 2x6 SP No.2	

REACTIONS. All bearings 25-3-0.

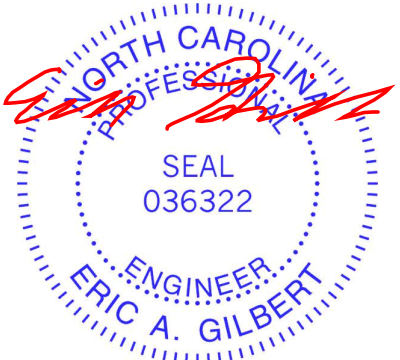
(lb) - Max Horz 2=213(LC 15)

Max Uplift All uplift 100 lb or less at joint(s) 33, 34, 35, 36, 37, 38, 39, 40, 31, 30, 2, 22, 29, 28, 27, 26, 25, 24

Max Grav All reactions 250 lb or less at joint(s) 32, 33, 34, 35, 36, 37, 38, 39, 40, 31, 30, 2, 22, 29, 28, 27, 26, 25, 24

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-0-0 to 1-11-8, Exterior(2N) 1-11-8 to 12-7-8, Corner(3R) 12-7-8 to 15-7-8, Exterior(2N) 15-7-8 to 26-3-0 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 33, 34, 35, 36, 37, 38, 39, 40, 31, 30, 2, 22, 29, 28, 27, 26, 25, 24.
 - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2, 22.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF	175244260
25-4377-A	T04	Common	4	1	Job Reference (optional)	

Riverside Roof Truss, LLC, Danville, Va - 24541, 8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:49 2025 Page 1
ID:bvA_Tz0lty19PgKiShYYglyupVV-k8OASOMSptlKTwiMcR3Js3MO0dvleKVSaQ47iJytESa
1-0-0 5-6-3 11-0-5 16-6-8 21-10-11 27-2-13 32-7-0
1-0-0 5-6-3 5-6-3 5-6-3 5-4-3 5-4-3 5-4-3

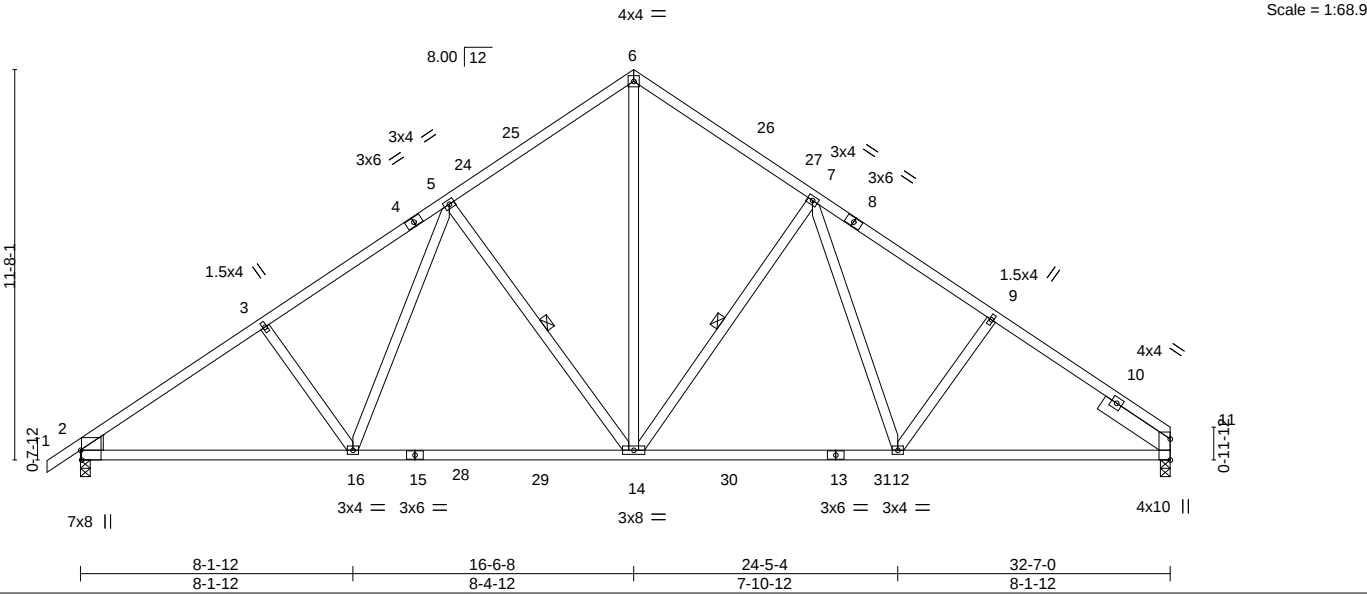


Plate Offsets (X,Y)-- [2:0-3-8,Edge]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.80	in (loc)	l/defl	MT20	GRIP
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	1.00	Vert(LL)	-0.25 14-16 >999		244/190
TCDL	10.0	Rep Stress Incr	YES	WB	0.57	Vert(CT)	-0.41 14-16 >959		
BCLL	0.0 *	Code IRC2021/TPI2014		Matrix-MS		Horz(CT)	0.11 11 n/a		
BCDL	10.0							Weight: 197 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.2 *Except* 8-11: 2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 2-2-10 oc purlins.
BOT CHORD	2x4 SP No.1 *Except* 13-15: 2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS	2x4 SP No.3	WEBS	1 Row at midpt 5-14, 7-14
WEDGE			
Left: 2x6 SP No.2			
SLIDER	Right 2x6 SP No.2 2-6-0		

REACTIONS.	
(size)	2=0-3-8, 11=0-3-8
Max Horz	2=268(LC 13)
Max Uplift	2=-132(LC 16), 11=-109(LC 17)
Max Grav	2=1817(LC 30), 11=1739(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.	
TOP CHORD	2-3=-2522/187, 3-5=-2337/222, 5-6=-1659/240, 6-7=-1658/242, 7-9=-2164/213, 9-11=-2314/180
BOT CHORD	2-16=-254/2182, 14-16=-133/1800, 12-14=-26/1644, 11-12=-75/1810
WEBS	3-16=-319/181, 5-16=-54/589, 5-14=-752/238, 6-14=-148/1386, 7-14=-692/231, 7-12=-51/447

NOTES-	
1)	Unbalanced roof live loads have been considered for this design.
2)	Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCCL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-3-2, Interior(1) 2-3-2 to 16-6-8, Exterior(2R) 16-6-8 to 19-9-10, Interior(1) 19-9-10 to 32-7-0 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 psf (Lum DOL = 1.15 Plate DOL = 1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.0; 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 23.1 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, with BCDL = 10.0psf.
8)	Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=132, 11=109.



July 31,2025

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.sbcacompnents.com)

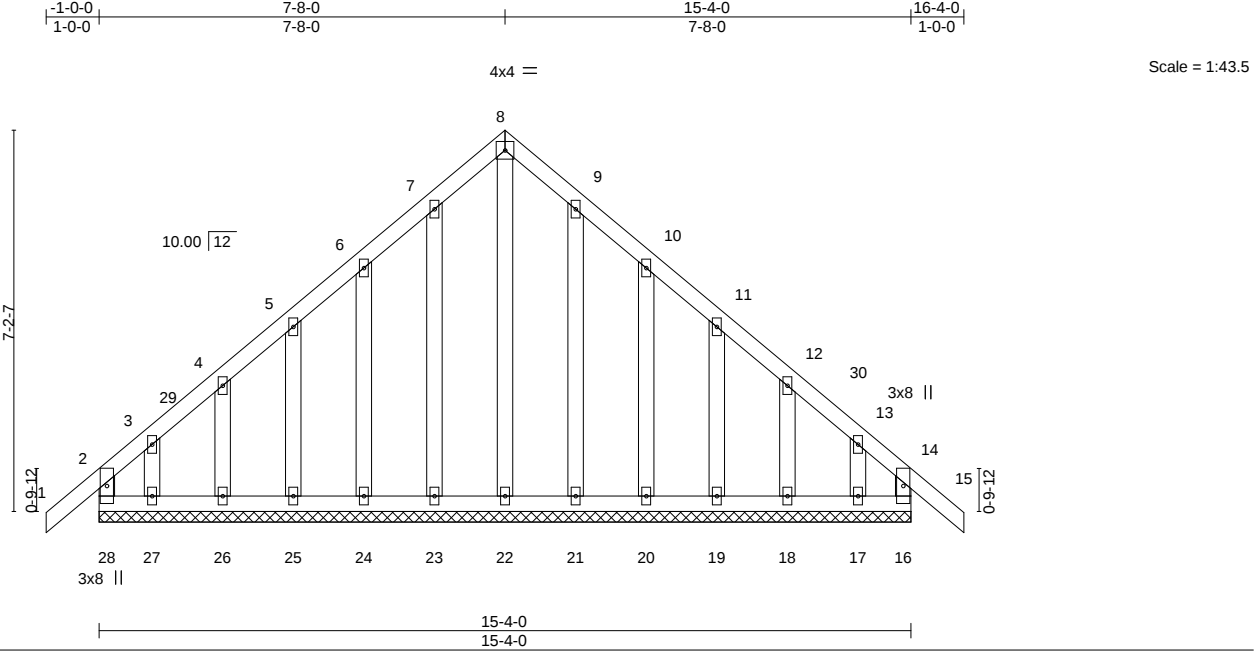
ENGINEERING BY
TRENCO
A MiTek Affiliate
818 Soundside Road
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T04GE	GABLE	1	1	175244261

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

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ID:bvA_Tz0lty19PgKiShYYglyupVV-CLxYgkN4aBQB53JYA8aZPGvj11TYNsScp4qgElytESZ



LOADING (psf)	SPACING-	CSI.	DEFL.	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.16	in (loc) l/defl L/d	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.07	Vert(LL) -0.01 15 n/r 180		
TCDL 10.0	Lumber DOL 1.15	WB 0.20	Vert(CT) -0.01 15 n/r 120		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-R	Horz(CT) 0.00 16 n/a n/a		
BCDL 10.0	Code IRC2021/TPI2014			Weight: 117 lb	FT = 20%

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

REACTIONS. All bearings 15-4-0.
(lb) - Max Horz 28=-190(LC 14)
Max Uplift All uplift 100 lb or less at joint(s) 16, 23, 24, 25, 26, 21, 20, 19, 18 except 28=-108(LC 12), 27=-127(LC 16), 17=-114(LC 17)
Max Grav All reactions 250 lb or less at joint(s) 28, 16, 22, 23, 24, 25, 26, 27, 21, 20, 19, 18, 17

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-0-0 to 2-0-0, Exterior(2N) 2-0-0 to 7-8-0, Corner(3R) 7-8-0 to 10-8-0, Exterior(2N) 10-8-0 to 16-4-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 16, 23, 24, 25, 26, 21, 20, 19, 18 except (jt=lb) 28=108, 27=127, 17=114.



July 31,2025

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)

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

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T05	Common	6	1	175244262

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

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ID:bvA_Tz0lty19PgKiShYYglyupVV-gXVwt4OiLVY2jDuljs5oyURi_Rez6i4I2kZEmCytESY

Job Reference (optional)

18-11-4 25-3-0 26-3-0

1-0-0 6-3-12 12-7-8 6-3-12 6-3-12 1-0-0

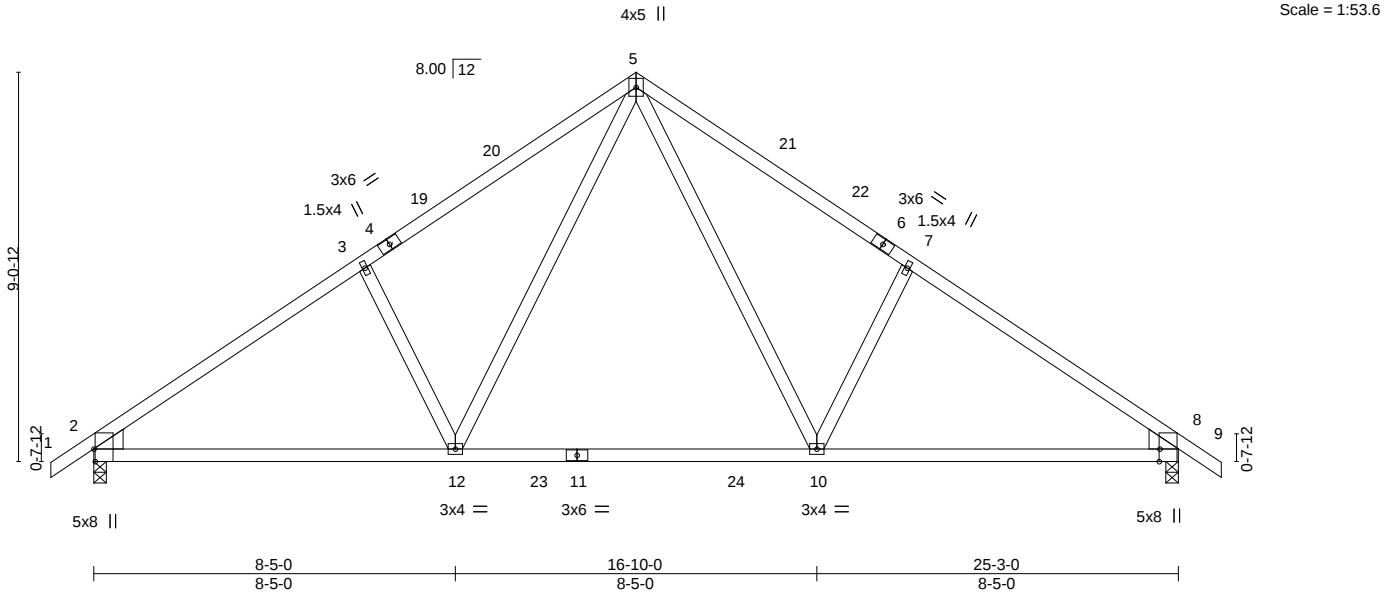


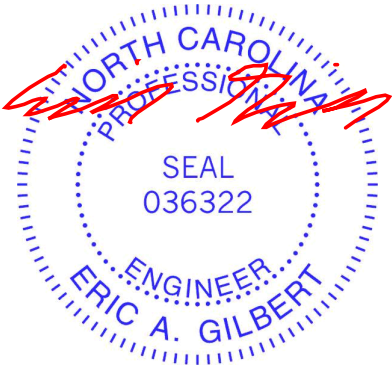
Plate Offsets (X,Y)-- [2:0-3-8,Edge], [8:0-3-8,Edge]		8-5-0 8-5-0 16-10-0 8-5-0 25-3-0 8-5-0	
LOADING (psf)		SPACING-	
TCLL (roof)	30.0	2-0-0	CSL
Snow (Pf/Pg)	23.1/30.0	Plate Grip DOL 1.15	TC 0.83
TCDL	10.0	Lumber DOL 1.15	BC 0.82
BCLL	0.0 *	Rep Stress Incr YES	WB 0.30
BCDL	10.0	Code IRC2021/TPI2014	Matrix-MS
		DEFL.	
		in (loc)	l/defl L/d
		Vert(LL)	-0.22 10-12 >999 360
		Vert(CT)	-0.33 10-12 >915 240
		Horz(CT)	0.05 8 n/a n/a
		PLATES	GRIP
		MT20	244/190
		Weight: 132 lb	FT = 20%

LUMBER-		BRACING-	
TOP CHORD	2x4 SP No.1 *Except* 1-4,6-9: 2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-2-0 oc purlins.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3		
WEDGE			
Left: 2x6 SP No.2 , Right: 2x6 SP No.2			

REACTIONS. (size) 2=0-3-8, 8=0-3-8
Max Horz 2=213(LC 15)
Max Uplift 2=-106(LC 16), 8=-106(LC 17)
Max Grav 2=1411(LC 30), 8=1411(LC 31)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1829/147, 3-5=-1679/219, 5-7=-1679/219, 7-8=-1829/147
BOT CHORD 2-12=-152/1575, 10-12=0/1035, 8-10=-25/1432
WEBS 3-12=-450/235, 5-12=-129/806, 5-10=-129/806, 7-10=-450/235

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-0-0 to 2-0-0, Interior(1) 2-0-0 to 12-7-8, Exterior(2R) 12-7-8 to 15-7-8, Interior(1) 15-7-8 to 26-3-0 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
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=106, 8=106.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	T06	GABLE	1	1		175244263

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

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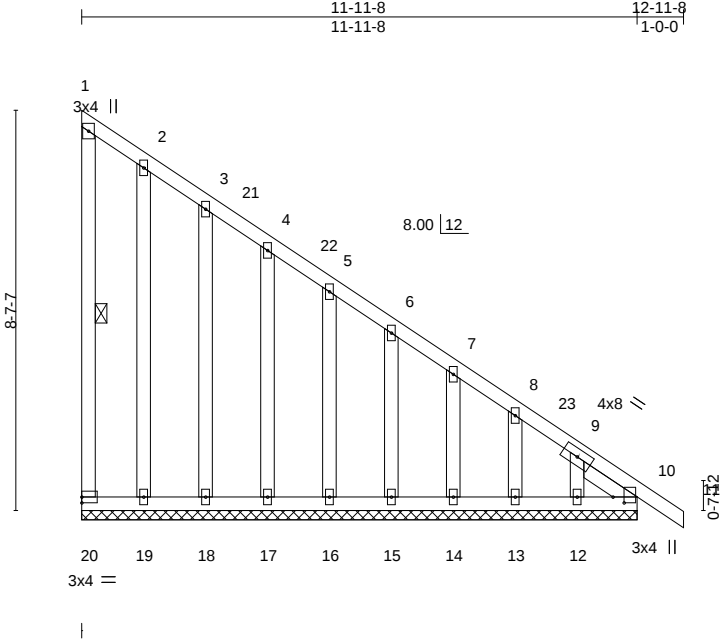


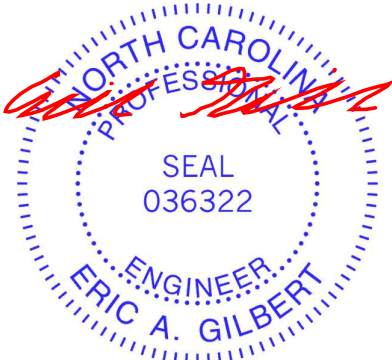
Plate Offsets (X,Y)-- [10:0-1-8,0-2-14]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.86	Vert(LL)	-0.00 11 n/r 180	MT20	GRIP 244/190
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.27	Vert(CT)	-0.00 11 n/r 120		
TCDL	10.0	Rep Stress Incr	YES	WB	0.19	Horz(CT)	0.01 10 n/a n/a		
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-S				Weight: 104 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, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 9-11-9 oc bracing.
WEBS	2x4 SP No.3	WEBS	1 Row at midpt 1-20
OTHERS	2x4 SP No.3		
SLIDER	Right 2x4 SP No.3 1-4-9		

REACTIONS. All bearings 11-11-8.
(lb) - Max Horz 20=-299(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 20, 10, 19, 18, 17, 16, 15, 14, 13, 12
Max Grav All reactions 250 lb or less at joint(s) 20, 10, 19, 18, 17, 16, 15, 14, 13, 12

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 3-4=-260/226, 4-5=-312/250, 5-6=-364/275, 6-7=-416/301, 7-8=-467/326, 8-9=-522/352, 9-10=-647/433
BOT CHORD 19-20=-319/523, 18-19=-319/523, 17-18=-319/523, 16-17=-319/523, 15-16=-319/523, 14-15=-319/523, 13-14=-319/523, 12-13=-319/523, 10-12=-319/523

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) 0-1-12 to 3-1-12, Exterior(2N) 3-1-12 to 12-11-8 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
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 20, 10, 19, 18, 17, 16, 15, 14, 13, 12.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG A 466 ROOF
25-4377-A	T07	Roof Special	10	1	175244264

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

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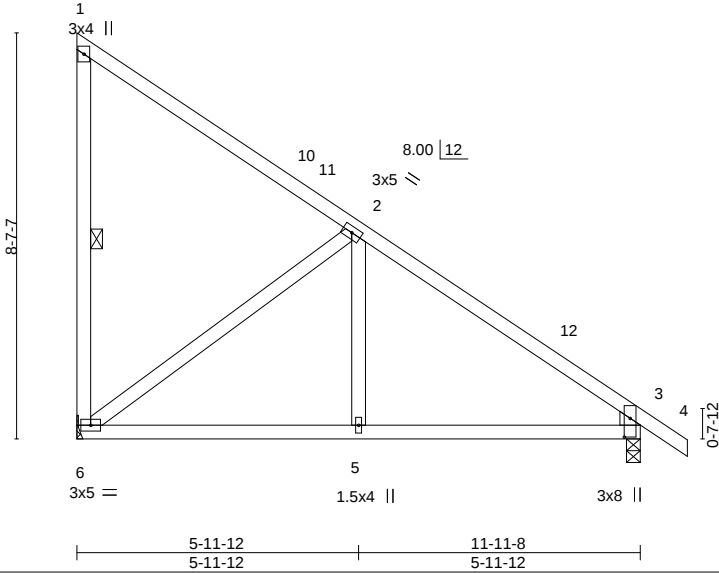


Plate Offsets (X,Y)-- [3:0-4-12,0-1-8]									
LOADING (psf)		SPACING-		CSI.		DEFL.		PLATES	
TCLL (roof)	30.0	Plate Grip DOL	1.15	TC	0.80	Vert(LL)	-0.03 5-6 >999 360	MT20	244/190
Snow (Pf/Pg)	23.1/30.0	Lumber DOL	1.15	BC	0.35	Vert(CT)	-0.06 5-6 >999 240		
TCDL	10.0	Rep Stress Incr	YES	WB	0.59	Horz(CT)	0.01 3 n/a n/a		
BCLL	0.0 *	Code	IRC2021/TPI2014	Matrix-MS				Weight: 70 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, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.3	WEBS	1 Row at midpt 1-6
WEDGE			
Right: 2x4 SP No.3			

REACTIONS. (size) 6=Mechanical, 3=0-3-8
Max Horz 6=-301(LC 14)
Max Uplift 6=-83(LC 12), 3=-37(LC 17)
Max Grav 6=664(LC 24), 3=674(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-6=-263/144, 2-3=-687/108
BOT CHORD 5-6=0/496, 3-5=0/496
WEBS 2-6=-595/167, 2-5=0/267

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-1-12 to 4-4-11, Interior(1) 4-4-11 to 12-11-8 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 23.1 psf on overhangs non-concurrent with other live loads.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6, 3.

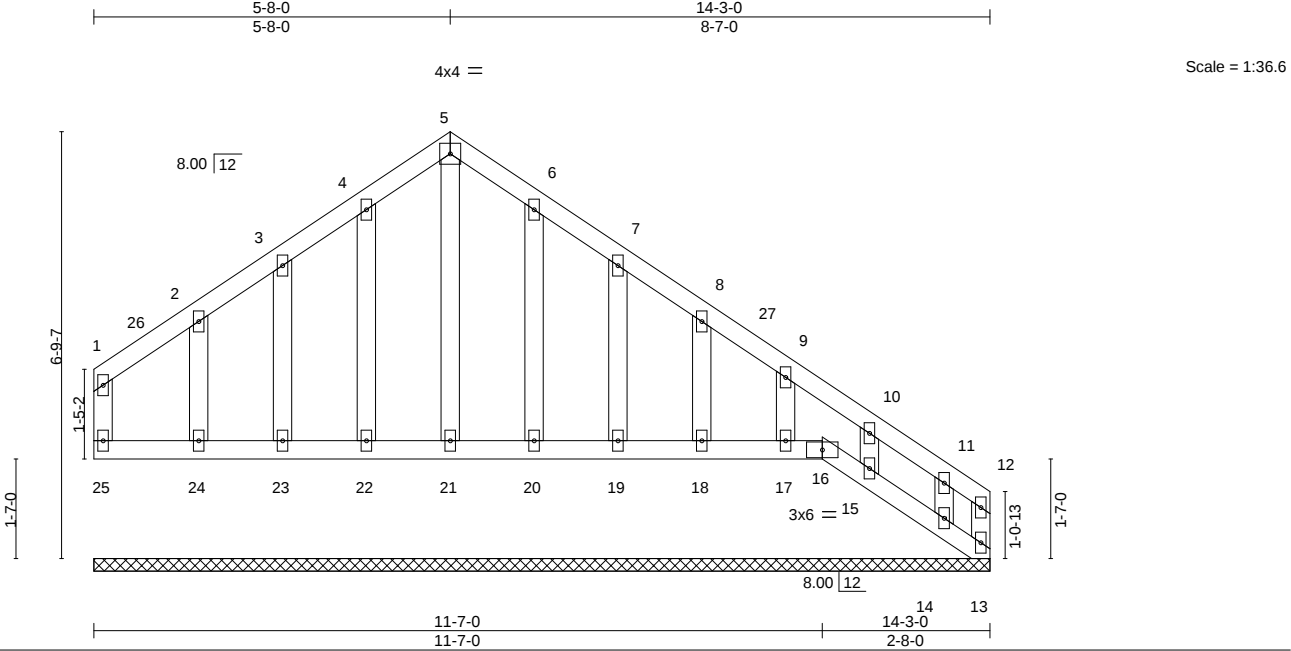


July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	T08	GABLE	2	1	175244265

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:52 2025 Page 1
ID:bvA_Tz0lty19PgKiShYYglyupVV-8j3J5QPK6ohvKNTxHZd1Uh_2aq9groruGOJnJeytESX



LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.14	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.09	Vert(CT)	n/a	-	n/a	999		
TCDL 10.0	Lumber DOL 1.15	WB 0.08	Horz(CT)	0.00	13	n/a	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-R							
BCDL 10.0	Code IRC2021/TPI2014							Weight: 87 lb	FT = 20%

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

REACTIONS. All bearings 14-3-0.
(lb) - Max Horz 25=-163(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 25, 16, 22, 23, 24, 20, 19, 18, 17, 15 except 13=-125(LC 15), 14=-193(LC 12)
Max Grav All reactions 250 lb or less at joint(s) 25, 13, 16, 21, 22, 23, 24, 20, 19, 18, 17, 15, 14

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) 0-1-12 to 3-0-0, Exterior(2N) 3-0-0 to 5-8-0, Corner(3R) 5-8-0 to 8-8-0, Exterior(2N) 8-8-0 to 14-1-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - 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=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - All plates are 2x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
 - Gable studs spaced at 1-4-0 oc.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 25, 16, 22, 23, 24, 20, 19, 18, 17, 15 except (jt=lb) 13=125, 14=193.
 - Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 25, 16, 21, 22, 23, 24, 20, 19, 18, 17, 15, 14.



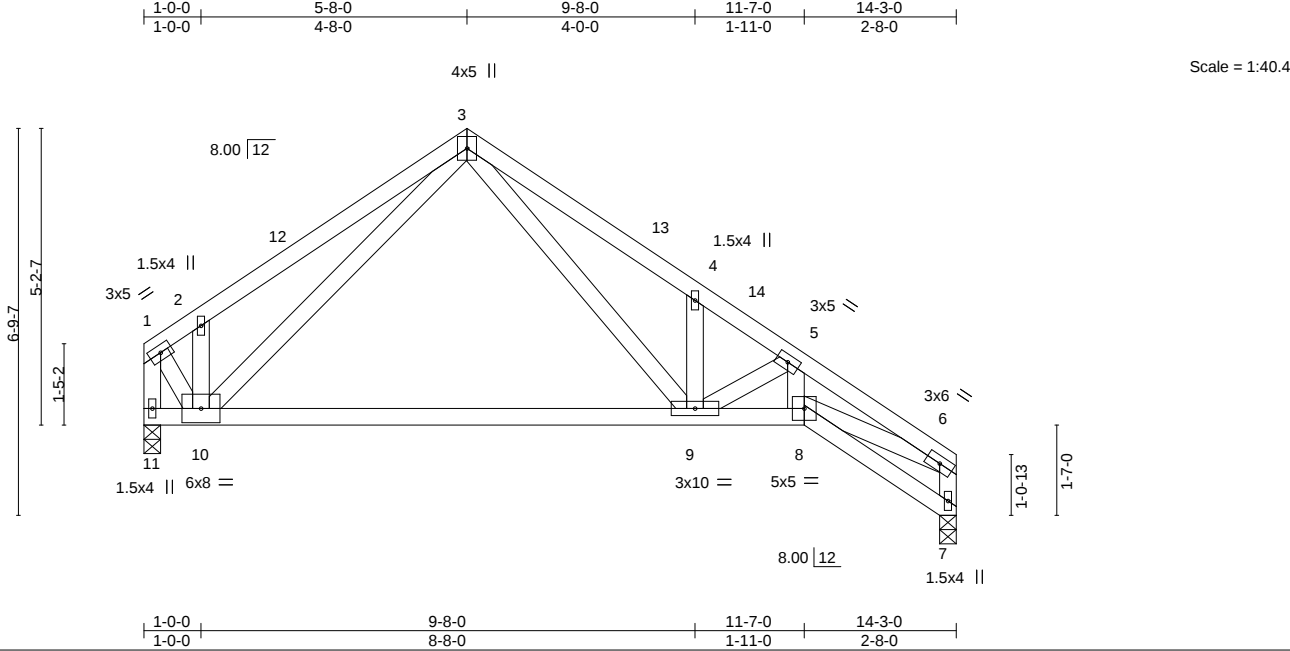
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG A 466 ROOF
25-4377-A	T09	Roof Special	18	1	175244266

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:53 2025 Page 1

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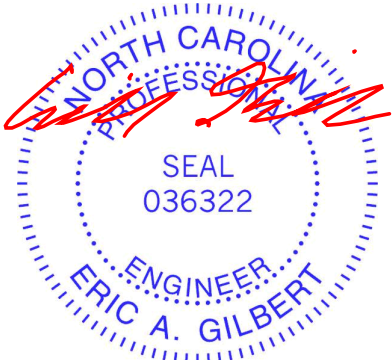
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	L/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.44	Vert(LL)	-0.11	9-10	>999	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.60	Vert(CT)	-0.23	9-10	>736		
TCDL 10.0	Lumber DOL 1.15	WB 0.59	Horz(CT)	0.06	7	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-MS						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 84 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 4-2-1 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
WEBS 2x4 SP No.3	6-0-0 oc bracing: 10-11.

REACTIONS. (size) 7=0-3-8, 11=0-3-8
Max Horz 11=-163(LC 12)
Max Uplift 7=-57(LC 17), 11=-35(LC 16)
Max Grav 7=698(LC 2), 11=698(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-477/20, 2-3=-731/163, 3-4=-1401/228, 4-5=-1262/134, 5-6=-1808/212, 6-7=-696/102, 1-11=-823/0
BOT CHORD 9-10=0/477, 8-9=-152/1388
WEBS 2-10=-546/221, 3-9=-124/972, 4-9=-397/143, 5-9=-418/110, 5-8=-62/396, 6-8=-143/1416, 1-10=-46/835

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-1-12 to 3-1-12, Interior(1) 3-1-12 to 5-8-0, Exterior(2R) 5-8-0 to 8-8-0, Interior(1) 8-8-0 to 14-1-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Bearing at joint(s) 7 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7, 11.

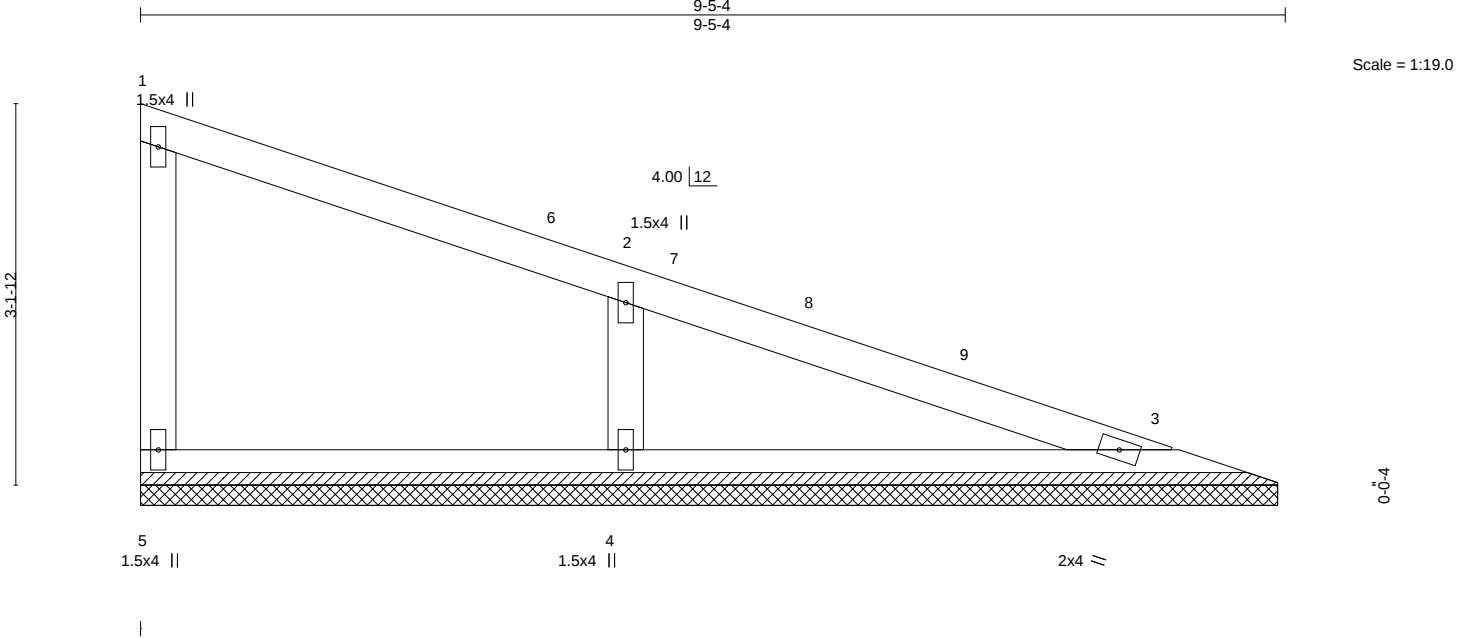


July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	V01	Valley	1	1		

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:54 2025 Page 1
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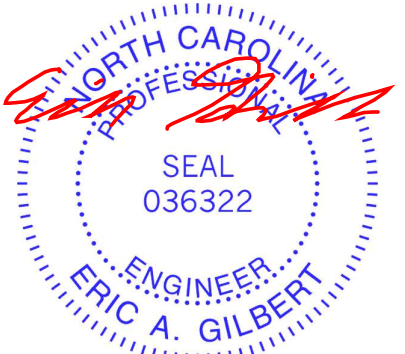
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.40	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.17	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.09	Horz(CT)	0.00	3	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 33 lb	FT = 20%

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

REACTIONS. (size) 5=9-4-8, 3=9-4-8, 4=9-4-8
Max Horz 5=-112(LC 12)
Max Uplift 5=-15(LC 13), 3=-8(LC 17), 4=-86(LC 13)
Max Grav 5=167(LC 23), 3=181(LC 2), 4=579(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-4=-467/211

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-1-12 to 4-4-11, Interior(1) 4-4-11 to 8-5-15 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
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 3, 4.



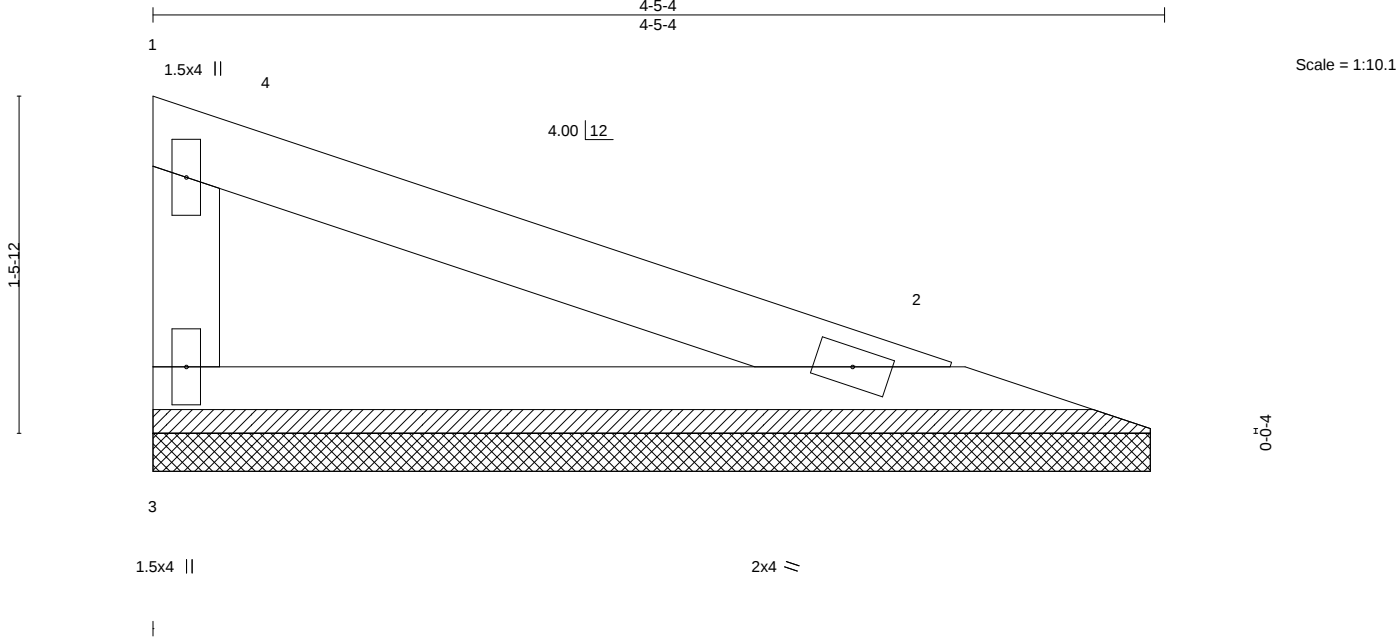
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V02	Valley	1	1	175244268

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:54 2025 Page 1

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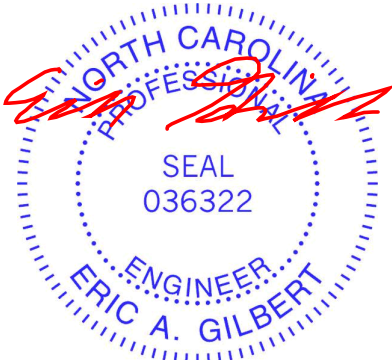
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	Plate Grip DOL	1.15	TC 0.31	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Lumber DOL	1.15	BC 0.13	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	2	n/a		
BCLL 0.0 *	Code IRC2021/TPI2014		Matrix-P					Weight: 13 lb	FT = 20%
BCDL 10.0									

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

REACTIONS. (size) 3=4-4-8, 2=4-4-8
Max Horz 3=-45(LC 12)
Max Uplift 3=-25(LC 17), 2=-18(LC 13)
Max Grav 3=185(LC 23), 2=185(LC 23)

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2.

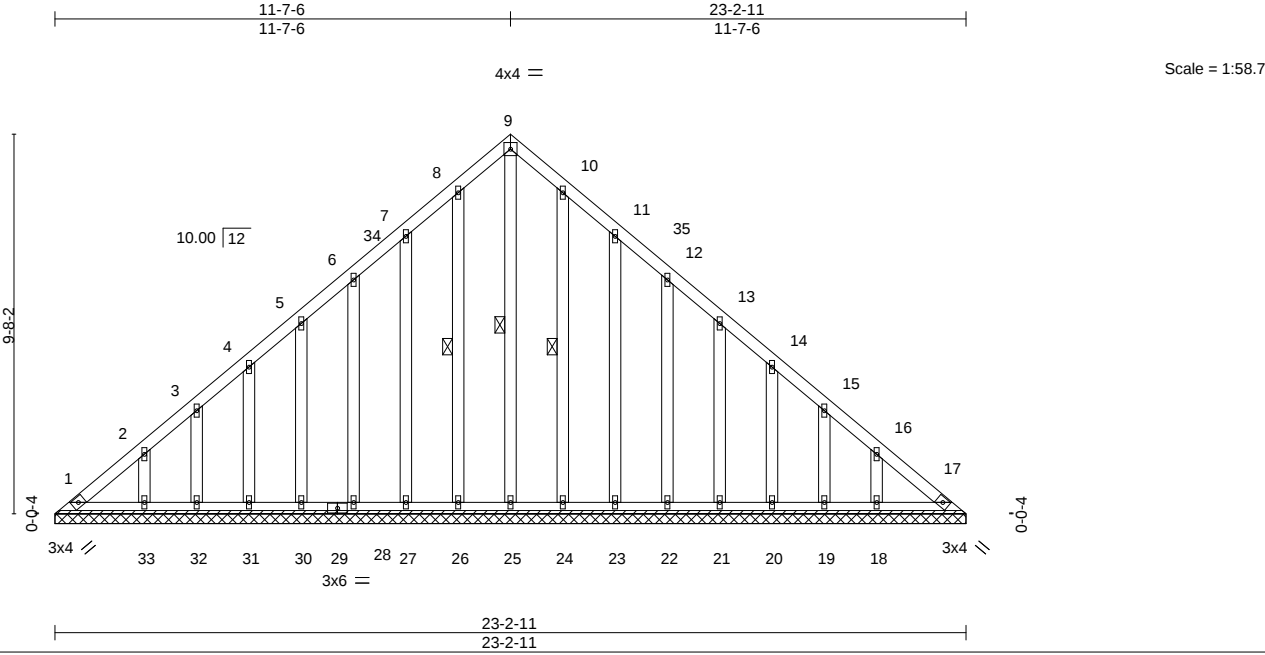


July 31, 2025

Job	Truss	Truss Type	Qty	Ply	RG A 466 ROOF
25-4377-A	V03	GABLE	1	1	175244269

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:55 2025 Page 1
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23-2-11



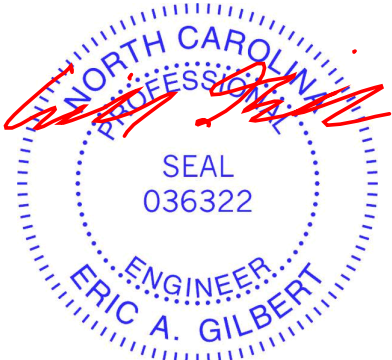
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.06	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.04	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.15	Horz(CT)	0.01	17	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 189 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	WEBS 1 Row at midpt 9-25, 8-26, 10-24

REACTIONS. All bearings 23-2-11.
(lb) - Max Horz 1=-219(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 1, 17, 26, 27, 28, 30, 31, 32, 33, 24, 23, 22, 21, 20, 19, 18
Max Grav All reactions 250 lb or less at joint(s) 1, 17, 25, 26, 27, 28, 30, 31, 32, 33, 24, 23, 22, 21, 20, 19, 18

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-258/181

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-4-13 to 3-7-6, Interior(1) 3-7-6 to 11-7-6, Exterior(2R) 11-7-6 to 14-7-6, Interior(1) 14-7-6 to 22-9-14 zone; cantilever left and right exposed; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - All plates are 1.5x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 17, 26, 27, 28, 30, 31, 32, 33, 24, 23, 22, 21, 20, 19, 18.



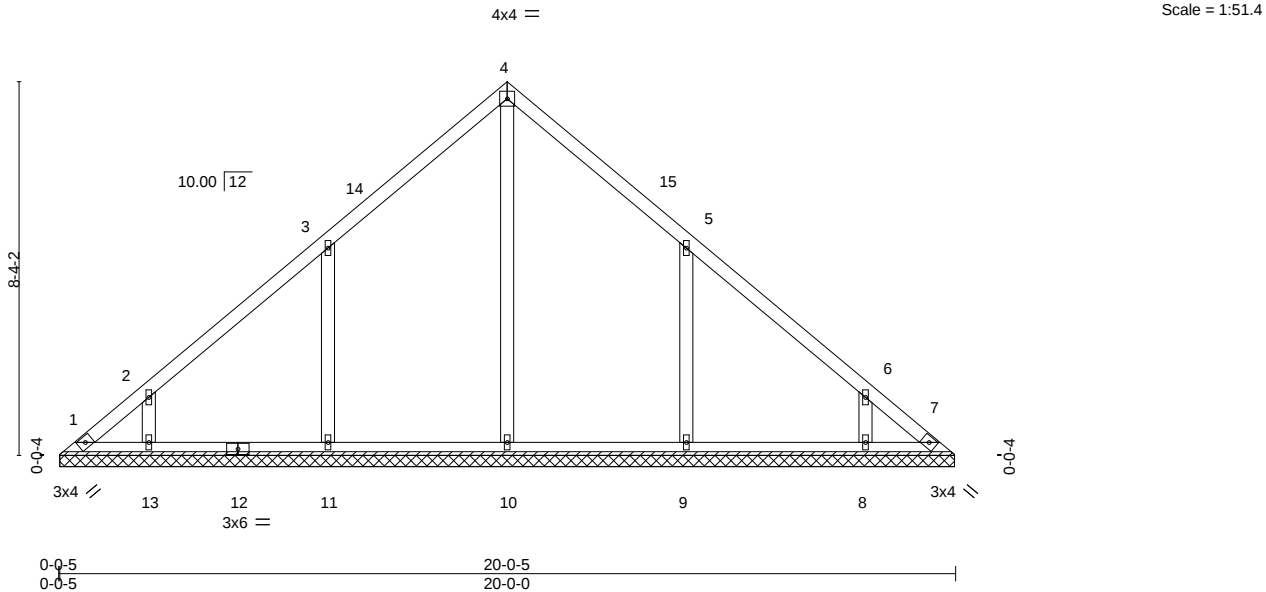
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V04	Valley	1	1	175244270

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:56 2025 Page 1
ID:bvA_Tz0lty19PgKiShYYglyupVV-1UJpwnSrA1BLp_niWPhzfX8hUSVHna5UB0H_SPytEST

10-0-2
10-0-2
20-0-5
10-0-2



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.34	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pl/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.17	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.26	Horz(CT)	0.00	7	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 95 lb	FT = 20%

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

REACTIONS. All bearings 19-11-11.
(lb) - Max Horz 1=-188(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 1, 7 except 11=-172(LC 16), 13=-122(LC 16), 9=-172(LC 17), 8=-122(LC 17)
Max Grav All reactions 250 lb or less at joint(s) 1, 7 except 10=415(LC 32), 11=536(LC 29), 13=375(LC 29), 9=536(LC 30), 8=375(LC 30)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 3-11=-409/222, 2-13=-265/164, 5-9=-409/222, 6-8=-266/164

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 10-0-2, Exterior(2R) 10-0-2 to 13-0-2, Interior(1) 13-0-2 to 19-7-7 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - All plates are 1.5x4 MT20 unless otherwise indicated.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 7 except (jt=lb) 11=172, 13=122, 9=172, 8=122.



July 31,2025

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.sbcacompnents.com)

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

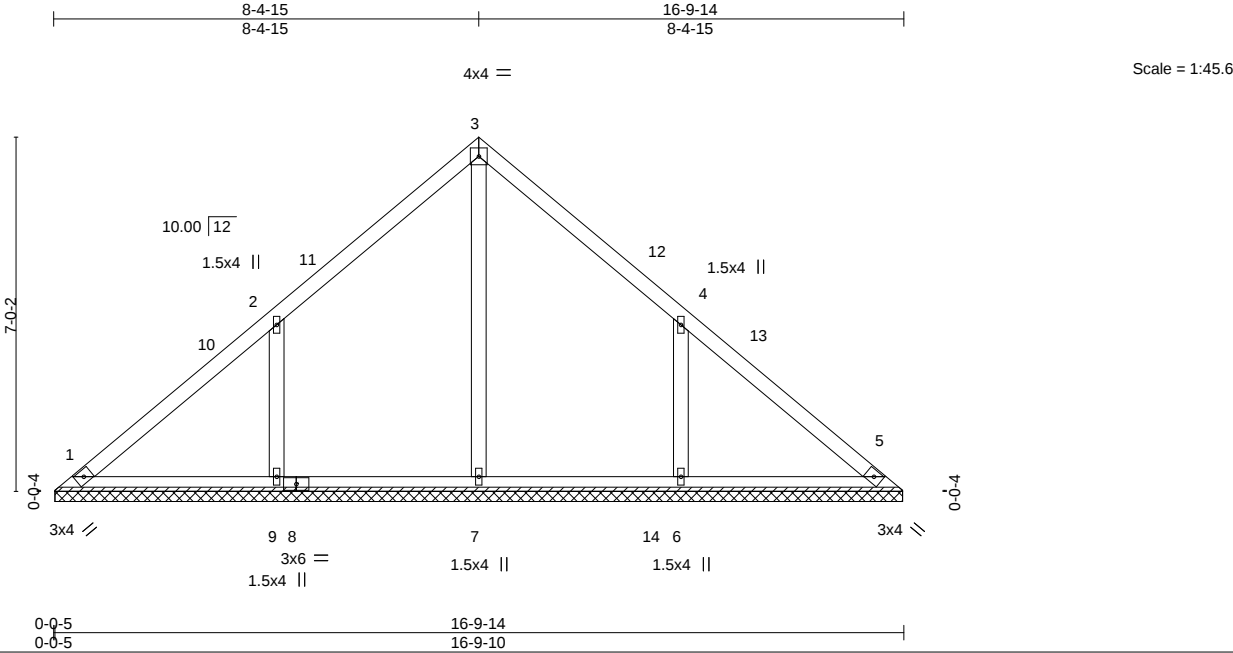
Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V05	Valley	1	1	175244271

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:56 2025 Page 1

ID: bvA_Tz0lty19PgKiShYYglyupVV-1UJpwnSrA1BLp_niWPhzfX8hiSVNnbRUB0H_SPyEST



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.35	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.17	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.17	Horz(CT)	0.00	5	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 75 lb	FT = 20%

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

REACTIONS. All bearings 16-9-5.

(lb) - Max Horz 1=-157(LC 14)

Max Uplift All uplift 100 lb or less at joint(s) 1 except 9=-187(LC 16), 6=-187(LC 17)

Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=384(LC 32), 9=576(LC 29), 6=573(LC 30)

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

WEBS 2-9=-424/232, 4-6=-424/232

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 8-4-15, Exterior(2R) 8-4-15 to 11-4-15, Interior(1) 11-4-15 to 16-5-1 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
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1 except (jt=lb) 9=187, 6=187.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RG	466 ROOF
25-4377-A	V06	Valley	1	1		175244272

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:57 2025 Page 1

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13-7-8

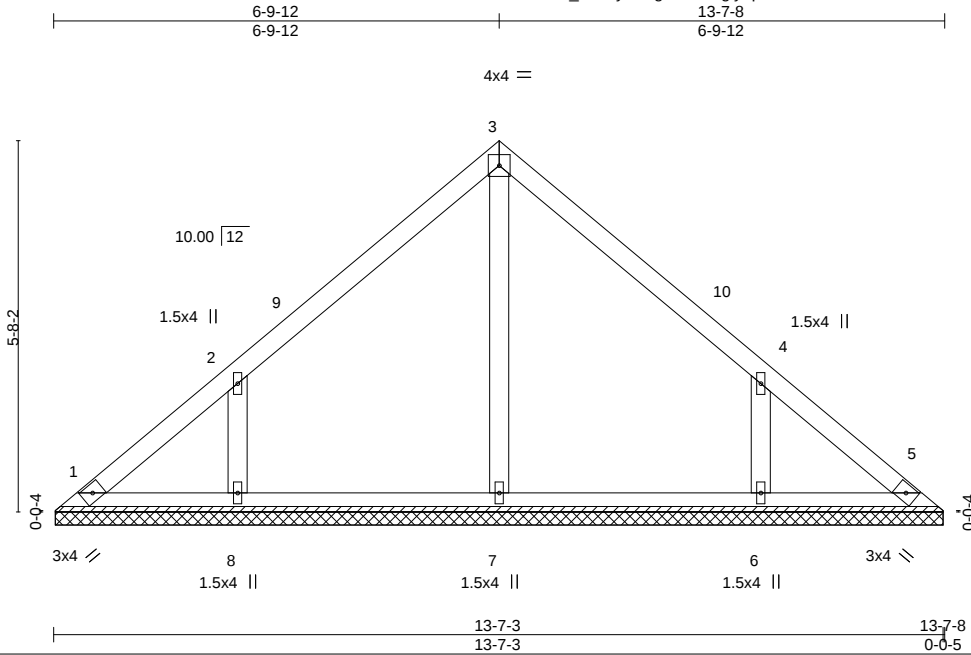
6-9-12

6-9-12

6-9-12

4x4 =

Scale = 1:35.2



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.33	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.12	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.12	Horz(CT)	0.00	5	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S					Weight: 58 lb	FT = 20%
BCDL 10.0	Code IRC2021/TPI2014							

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

REACTIONS. All bearings 13-6-14.
(lb) - Max Horz 1=-125(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 8=-155(LC 16), 6=-155(LC 17)
Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=296(LC 2), 8=455(LC 22), 6=455(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-8=-389/196, 4-6=-389/196

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 6-9-12, Exterior(2R) 6-9-12 to 9-9-12, Interior(1) 9-9-12 to 13-2-11 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
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (jt=lb) 8=155, 6=155.



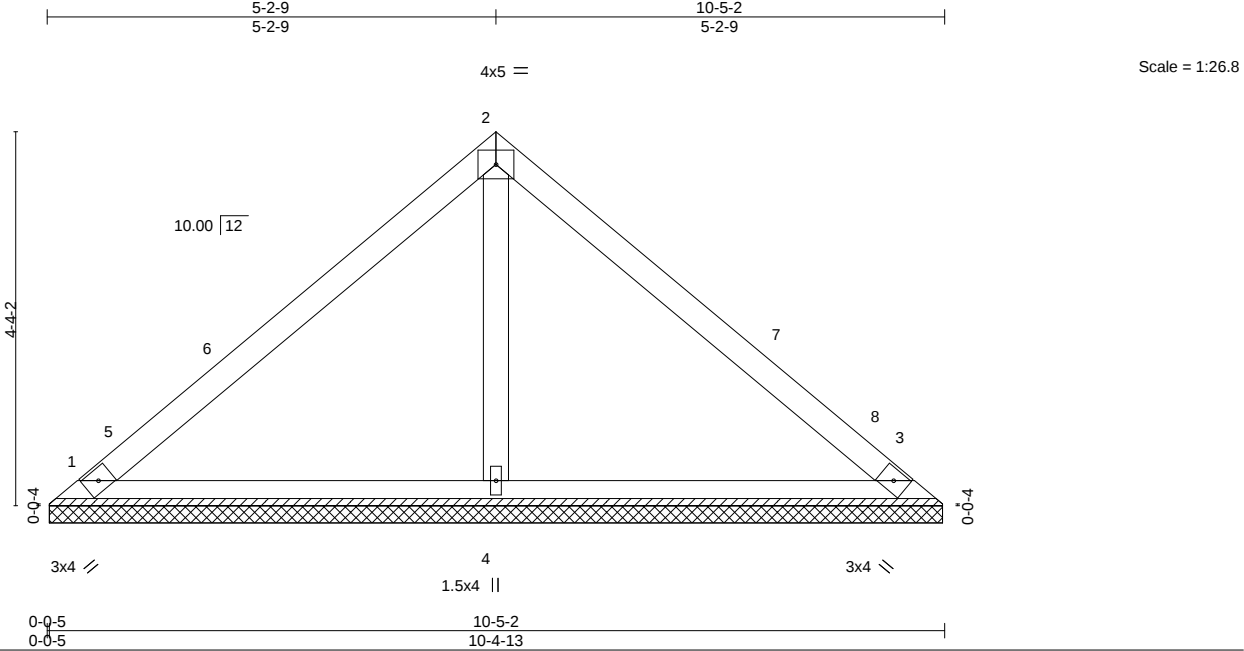
July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V07	Valley	1	1	175244273

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

8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:57 2025 Page 1

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LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.61	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.25	Vert(CT)	n/a	-	n/a	999		
TCDL 10.0	Lumber DOL 1.15	WB 0.10	Horz(CT)	0.00	3	n/a	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S							
BCDL 10.0	Code IRC2021/TPI2014							Weight: 40 lb	FT = 20%

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

REACTIONS. (size) 1=10-4-8, 3=10-4-8, 4=10-4-8
Max Horz 1=94(LC 13)
Max Uplift 1=-29(LC 17), 3=-40(LC 17)
Max Grav 1=306(LC 22), 3=306(LC 23), 4=444(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-4=-291/90

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-4-13 to 3-4-13, Interior(1) 3-4-13 to 5-2-9, Exterior(2R) 5-2-9 to 8-2-9, Interior(1) 8-2-9 to 10-0-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V08	Valley	1	1	175244274

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

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MiTek Industries, Inc.
Tue Jul 29 10:18:58 2025
Page 1
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3-7-6

3-7-6

7-2-11

3-7-6

4x4 =

2

10.00 12

3-0-2

0-0-4

1

3

2x4

1.5x4

2x4

0-0-5

7-2-11

0-0-5

7-2-6

Scale = 1:20.9

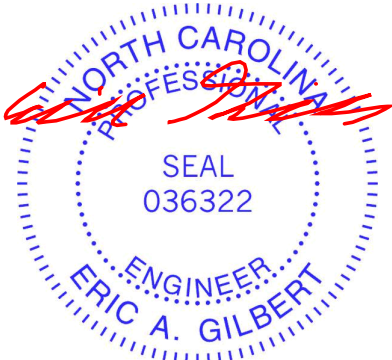
LOADING (psf)	SPACING-	CSI.	DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.34	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pl/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.10	Vert(CT)	n/a	-	n/a	999		
TCDL 10.0	Lumber DOL 1.15	WB 0.04	Horz(CT)	0.00	3	n/a	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-P							
BCDL 10.0	Code IRC2021/TPI2014							Weight: 27 lb	FT = 20%

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

REACTIONS. (size) 1=7-2-2, 3=7-2-2, 4=7-2-2
 Max Horz 1=63(LC 15)
 Max Uplift 1=-27(LC 17), 3=-35(LC 17)
 Max Grav 1=222(LC 22), 3=222(LC 23), 4=265(LC 2)

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

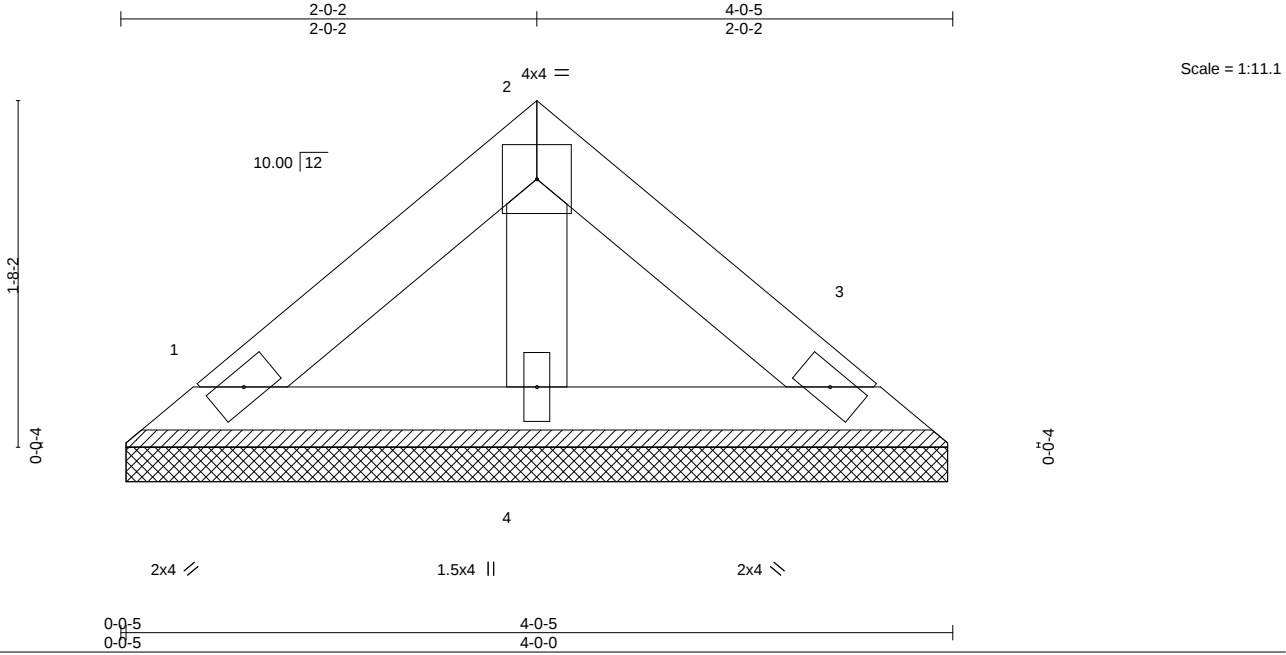
- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.



July 31,2025

Job	Truss	Truss Type	Qty	Ply	RGA 466 ROOF
25-4377-A	V09	Valley	1	1	175244275

Riverside Roof Truss, LLC, Danville, Va - 24541, 8.830 s Jun 11 2025 MiTek Industries, Inc. Tue Jul 29 10:18:58 2025 Page 1
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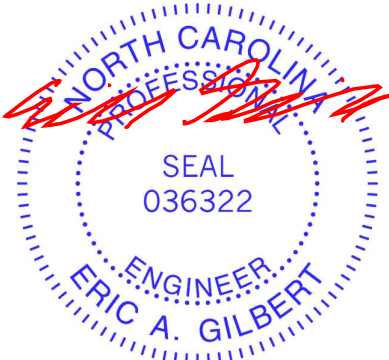
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof) 30.0	2-0-0	TC 0.07	Vert(LL)	n/a	-	n/a	MT20	244/190
Snow (Pl/Pg) 23.1/30.0	Plate Grip DOL 1.15	BC 0.03	Vert(CT)	n/a	-	n/a		
TCDL 10.0	Lumber DOL 1.15	WB 0.02	Horz(CT)	0.00	3	n/a		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-P						
BCDL 10.0	Code IRC2021/TPI2014						Weight: 14 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 4-0-5 oc purlins.
BOT CHORD 2x4 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
OTHERS 2x4 SP No.3	

REACTIONS. (size) 1=3-11-11, 3=3-11-11, 4=3-11-11
Max Horz 1=31(LC 13)
Max Uplift 1=-14(LC 17), 3=-18(LC 17)
Max Grav 1=101(LC 22), 3=101(LC 23), 4=133(LC 2)

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

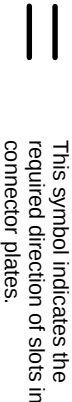
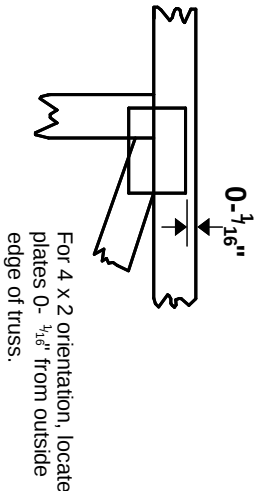
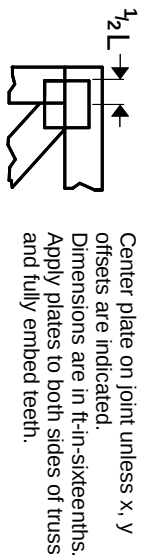
- NOTES-**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=30.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=30.0 psf; Pf=23.1 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
 - Unbalanced snow loads have been considered for this design.
 - Gable requires continuous bottom chord bearing.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.



July 31, 2025

Symbols

PLATE LOCATION AND ORIENTATION



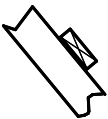
* Plate location details available in MITek software or upon request.

PLATE SIZE

4 X 4

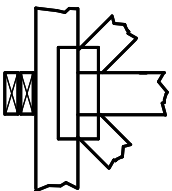
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION



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

BEARING

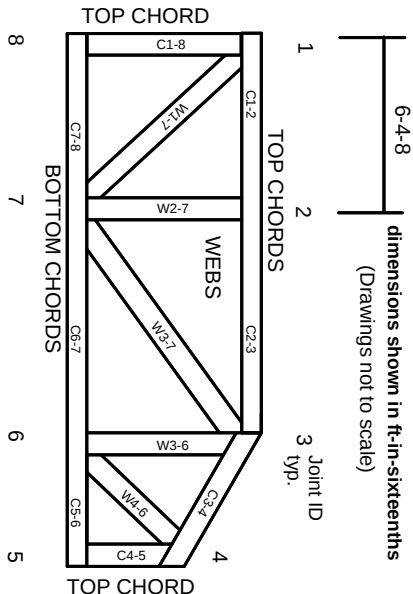


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number/letter where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TP1.1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-22: Design Standard for Bracing.
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing, Restraining & Bracing of Metal Plate Connected Wood Trusses.

Numbering System



JOINTS ARE GENERALLY NUMBERED/LETTERED C LOCKWISE 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

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

Lumber design values are in accordance with ANSI/TP1 1 section 6.3. These truss designs rely on lumber values established by others.

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General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI.
2. Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
3. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
4. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
5. Cut members to bear tightly against each other.
6. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TP1 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TP1 1.
8. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
9. Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.
10. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
11. Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
12. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
13. Top chords must be sheathed or purlins provided at spacing indicated on design.
14. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
15. Connections not shown are the responsibility of others.
16. Do not cut or alter truss member or plate without prior approval of an engineer.
17. Install and load vertically unless indicated otherwise.
18. Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
19. Review all portions of this design (front, back, words and pictures) before use. Reviewing pictures alone is not sufficient.
20. Design assumes manufacture in accordance with ANSI/TP1 1 Quality Criteria.
21. The design does not take into account any dynamic or other loads other than those expressly stated.

MITek

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A MITek Affiliate

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