

Trenco 818 Soundside Rd Edenton, NC 27932

Re: 24-3341-A

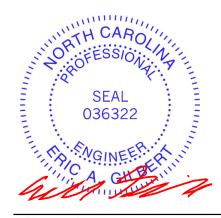
RVF-LOT #11 ROOF

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: I66008039 thru I66008066

My license renewal date for the state of North Carolina is December 31, 2024.

North Carolina COA: C-0844



June 5,2024

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 RVF-LOT #11 ROOF 166008039 24-3341-A GE01 COMMON SUPPORTED GAB Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:51 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-hG1pEPHz9AShhU6SY4pyhZSXBpAyLKnjs6Dq4sz9iao 12-6-0 -0-11-0 0-11-0 5-9-8 5-9-8 0-11-0 Scale = 1:27.3 4x4 = 5 7.00 12 3 3x5 > 3x5 / 1-1-13 16 15 13 12 11 10 3x4 =3x4 =11-7-0 11-7-0 LOADING (psf) SPACING-DEFL. L/d **PLATES GRIP** 2-0-0 CSI. (loc) I/defl TCLL (roof) 20.0 Vert(LL) 244/190 Plate Grip DOL 1.15 TC 0.08 -0.00 9 n/r 120 MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.03 Vert(CT) -0.00 9 120 n/r TCDI 10.0

LUMBER-

BCLL

BCDL

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

0.0

10.0

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

Horz(CT)

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

n/a

n/a

except end verticals.

0.00

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

10

REACTIONS. All bearings 11-7-0.

Max Horz 16=-108(LC 14) (lb) -

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

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

Rep Stress Incr

Code IRC2018/TPI2014

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; B=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 1-9-8, Exterior(2N) 1-9-8 to 5-9-8, Corner(3R) 5-9-8 to 8-9-8, Exterior(2N) 8-9-8 to 12-6-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

YES

WB

Matrix-S

0.04

- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 10) Gable studs spaced at 2-0-0 oc.
- 11) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 16, 10, 14, 15, 12 11
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



Weight: 66 lb

FT = 20%

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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building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TP11 Quality Criteria and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008040 24-3341-A M01 MONOPITCH 6 Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:51 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-hG1pEPHz9AShhU6SY4pyhZSSHp5?LDUjs6Dq4sz9iao 0-11-0 5-10-0 5-10-0 Scale = 1:25.0 4.00 12 3x4 = 12 7 6 3x4 = 2x4 || 3x4 || 5-10-0 Plate Offsets (X,Y)-- [2:0-2-5,0-0-5] LOADING (psf) SPACING-2-0-0 CSI. (loc) I/defl L/d **PLATES** GRIP TCLL (roof) 20.0 Plate Grip DOL 1.15 TC 0.39 Vert(LL) -0.03 6-7 >999 240 244/190 MT20 Snow (Pf/Pg) 11.6/15.0 0.34

TCDL **BCLL**

10.0

10.0

Lumber DOL Rep Stress Incr 0.0 *

1.15 BC YES WB 0.51 Code IRC2018/TPI2014 Matrix-MS

Vert(CT) -0.06 6-7 >999 180 Horz(CT) 0.01 6 n/a n/a

Weight: 58 lb

FT = 20%

LUMBER-

BCDL

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

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

BOT CHORD

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

except end verticals.

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

REACTIONS.

(size) 2=0-3-8, 6=Mechanical

Max Horz 2=148(LC 15)

Max Uplift 2=-53(LC 16), 6=-32(LC 16) Max Grav 2=518(LC 2), 6=459(LC 2)

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

TOP CHORD 2-4=-661/180

2-7=-274/668, 6-7=-274/668 BOT CHORD

WEBS 4-6=-700/233

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



June 5,2024

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building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TP11 Quality Criteria and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008041 24-3341-A M01GE MONOPITCH SUPPORTED Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:52 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-ASbBRlHcwUaYlehe6nLBEn?gLDVU4ngs4mzOcJz9ian

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

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

except end verticals.

11-8-0 0-11-0 11-8-0 Scale = 1:23.3 4.00 12 15 5 4x8 = 10 14 13 12 3x4 II

Plate Offsets (X,Y) [2:0-1-8,0-0-5]									
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 *	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES	CSI. TC 0.24 BC 0.07 WB 0.05	DEFL. in (loc) l/defl L/d Vert(LL) 0.00 1 n/r 120 Vert(CT) -0.00 1 n/r 120 Horz(CT) 0.00 9 n/a n/a	PLATES GRIP MT20 244/190					
BCDL 10.0	Code IRC2018/TPI2014	Matrix-S		Weight: 60 lb FT = 20%					

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

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

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

SLIDER Left 2x4 SP No.3 1-7-8

REACTIONS. All bearings 11-8-0. Max Horz 2=146(LC 13) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 9, 2, 10, 11, 12, 13, 14 Max Grav All reactions 250 lb or less at joint(s) 9, 2, 10, 11, 12, 13, 14

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

TOP CHORD 2-3=-342/173, 3-4=-261/141

NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; B=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 2-1-0, Exterior(2N) 2-1-0 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
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) All plates are 2x4 MT20 unless otherwise indicated.
- 7) Gable requires continuous bottom chord bearing.
- 8) Gable studs spaced at 2-0-0 oc.
- 9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 10) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 9, 2, 10, 11, 12, 13, 14
- 12) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008042 24-3341-A M02 HALF HIP 3 Job Reference (optional)
8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:52 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-ASbBRlHcwUaYlehe6nLBEn?hNDVX4nvs4mzOcJz9ian 0-11-0 2-8-0 1-0-0 Scale = 1:10.5 3 2x4 ∐ 4.00 12 2x4. 2 6 2x4 || 4x4 = 3x4 =3-8-0 1-0-0 LOADING (psf) SPACING-2-0-0 DEFL. L/d **PLATES GRIP** CSI. (loc) I/defl TCLL (roof) 20.0 Plate Grip DOL Vert(LL) -0.00 240 244/190 1.15 TC 0.18 10 >999 MT20 Snow (Pf/Pg) 16.5/15.0 Lumber DOL 1.15 ВС 0.07 Vert(CT) -0.00 >999 180 TCDI 10.0 Rep Stress Incr NO WB 0.05 Horz(CT) 0.00 2 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-MF Weight: 19 lb FT = 20% **BCDL** 10.0 LUMBER-BRACING-TOP CHORD 2x4 SP No.2 Structural wood sheathing directly applied or 3-8-0 oc purlins, TOP CHORD **BOT CHORD** except end verticals, and 2-0-0 oc purlins: 4-7, 4-5.

BOT CHORD

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

2x6 SP No.2

WEBS 2x4 SP No.3

REACTIONS.

(size) 2=0-3-8, 6=Mechanical Max Horz 2=42(LC 13) Max Uplift 2=-5(LC 16)

Max Grav 2=256(LC 36), 6=326(LC 3)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 3-6-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=16.5 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10, Lu=50-0-0; Min. flat roof snow load governs. Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) Provide adequate drainage to prevent water ponding.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 9) Refer to girder(s) for truss to truss connections.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2.
- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 12) Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.
- 13) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

LOAD CASE(S) Standard

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

Vert: 1-3=-43, 6-8=-20, 4-5=-83



June 5,2024

Continued on page 2



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Joh Truss Truss Type Qty RVF-LOT #11 ROOF 166008042 24-3341-A M02 HALF HIP 3 Job Reference (optional)

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:52 2024 Page 2 ID:Bxl2MwYau_NHkbraGCmHloyOvst-ASbBRlHcwUaYlehe6nLBEn?hNDVX4nvs4mzOcJz9ian

Riverside Roof Truss, LLC, Danville, Va - 24541, LOAD CASE(S) Standard Concentrated Loads (lb) Vert: 12=-160 2) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-60, 6-8=-20, 4-5=-90 Concentrated Loads (lb) Vert: 12=-160 3) Dead + 0.75 Roof Live (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-50, 6-8=-20, 4-5=-139 Concentrated Loads (lb) Vert: 12=-160 4) Dead + 0.75 Snow (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-37, 6-8=-20, 4-5=-133 Concentrated Loads (lb) Vert: 12=-160 5) Dead + 0.75 Snow (Unbal. Left) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-42, 6-8=-20, 4-5=-114 Concentrated Loads (lb) Vert: 12=-160 6) Dead + 0.75 Snow (Unbal. Right) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf) Vert: 1-3=-25, 6-8=-20, 4-5=-135 Concentrated Loads (lb) Vert: 12=-160 7) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25 Uniform Loads (plf) Vert: 1-3=-20, 6-8=-40, 4-5=-50 Concentrated Loads (lb) Vert: 12=-160 8) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf) Vert: 1-2=60, 2-11=50, 3-11=34, 6-8=-12, 4-5=16 Horz: 1-2=-72, 2-11=-62, 3-11=-46, 3-4=10, 5-6=38 Concentrated Loads (lb) Vert: 12=-160 9) Dead + 0.6 C-C Wind (Pos. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf) Vert: 1-2=45, 2-3=50, 6-8=-12, 4-5=32 Horz: 1-2=-57, 2-3=-62, 3-4=-51, 5-6=-24 Concentrated Loads (lb) Vert: 12=-160 10) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf) Vert: 1-2=1, 2-3=-46, 6-8=-20, 4-5=-64 Horz: 1-2=-21, 2-3=26, 3-4=-30, 5-6=-35 Concentrated Loads (lb) Vert: 12=-160 11) Dead + 0.6 C-C Wind (Neg. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf) Vert: 1-2=-41, 2-3=-46, 6-8=-20, 4-5=-64 Horz: 1-2=21, 2-3=26, 3-4=31, 5-6=27 Concentrated Loads (lb) Vert: 12=-160 12) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf) Vert: 1-2=28, 2-3=13, 6-8=-12, 4-5=8 Horz: 1-2=-40, 2-3=-25, 3-4=-11, 5-6=18 Concentrated Loads (lb) Vert: 12=-160 13) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=3, 2-3=8, 6-8=-12, 4-5=8

Horz: 1-2=-15, 2-3=-20, 3-4=-26, 5-6=-15

Concentrated Loads (lb)

Vert: 12=-160

14) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 6-8=-20, 4-5=-39

Horz: 1-2=-4, 2-3=1, 3-4=31, 5-6=7

Concentrated Loads (lb) Vert: 12=-160

15) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60

Continued on page 3







Joh Truss Truss Type Qty RVF-LOT #11 ROOF 166008042 24-3341-A M02 HALF HIP 3 Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:52 2024 Page 3 ID:Bxl2MwYau_NHkbraGCmHloyOvst-ASbBRlHcwUaYlehe6nLBEn?hNDVX4nvs4mzOcJz9ian

LOAD CASE(S) Standard

Uniform Loads (plf)

Vert: 1-2=-5, 2-3=-10, 6-8=-20, 4-5=-39 Horz: 1-2=-15, 2-3=-10, 3-4=-4, 5-6=-25

Concentrated Loads (lb)

Vert: 12=-160

16) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=32, 2-3=17, 6-8=-12, 4-5=-1 Horz: 1-2=-44, 2-3=-29, 3-4=-34, 5-6=23

Concentrated Loads (lb)

Vert: 12=-160

17) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=21, 2-3=6, 6-8=-12, 4-5=-12 Horz: 1-2=-33, 2-3=-18, 3-4=-24, 5-6=23

Concentrated Loads (lb)

Vert: 12=-160

18) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 6-8=-20, 4-5=-39 Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 12=-160

19) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 6-8=-20, 4-5=-39 Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 12=-160

20) Dead + Snow on Overhangs: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-2=-43, 2-3=-20, 6-8=-20, 4-5=-50

Concentrated Loads (lb)

Vert: 12=-160

21) Dead + Snow (Unbal. Left): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-49, 6-8=-20, 4-5=-57

Concentrated Loads (lb) Vert: 12=-160

22) Dead + Snow (Unbal. Right): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-3=-27, 6-8=-20, 4-5=-85

Concentrated Loads (lb) Vert: 12=-160

23) Dead: Lumber Increase=0.90. Plate Increase=0.90 Plt. metal=0.90

Uniform Loads (plf)

Vert: 1-3=-20, 6-8=-20, 4-5=-50

Concentrated Loads (lb)

Vert: 12=-160

24) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60

Vert: 1-2=-34, 2-3=-38, 6-8=-20, 4-5=-124

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 12=-160

25) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-26, 2-3=-30, 6-8=-20, 4-5=-124

Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 12=-160

26) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate

Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 6-8=-20, 4-5=-124 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 12=-160 27) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate

Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 6-8=-20, 4-5=-124

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 12=-160

Continued on page 4





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LOAD CASE(S) Standard

28) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47 2-3=-51 6-8=-20 4-5=-129

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 12=-160

29) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-39, 2-3=-43, 6-8=-20, 4-5=-129 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 12=-160

30) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 6-8=-20, 4-5=-129 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 12=-160

31) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 6-8=-20, 4-5=-129

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 12=-160

32) Dead + Minimum Snow: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 6-8=-20, 4-5=-80

Concentrated Loads (lb)

Vert: 12=-160

33) Dead + 0.6 C-C Wind Min. Down: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=4, 2-3=-28, 6-8=-12, 4-5=-46

Horz: 1-2=-16, 2-3=16, 3-4=-16, 5-6=-16 Concentrated Loads (lb)

Vert: 12=-160

34) Dead + 0.6 C-C Wind Min. Upward: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-3=4, 6-8=-12, 4-5=-14

Horz: 1-3=-16, 3-4=16, 5-6=16

Concentrated Loads (lb) Vert: 12=-160

35) 3rd Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 6-8=-20, 4-5=-100

Concentrated Loads (lb)

Vert: 12=-160

36) 4th Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-70, 6-8=-20, 4-5=-57

Concentrated Loads (lb)

Vert: 12=-160

37) 5th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-25, 6-8=-20, 4-5=-146

Concentrated Loads (lb)

Vert: 12=-160

38) 6th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-57, 6-8=-20, 4-5=-114

Concentrated Loads (lb) Vert: 12=-160

Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 6-8=-20, 4-5=-137 Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 12=-160

40) 8th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60,

39) 7th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60,

Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 6-8=-20, 4-5=-105

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 12=-160

Continued on page 5



Job	Truss	Truss Type	Qty	Ply	RVF-LOT #11 ROOF	
				_		166008042
24-3341-A	M02	HALF HIP	3	1	Job Reference (optional)	

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:52 2024 Page 5 ID:Bxl2MwYau_NHkbraGCmHloyOvst-ASbBRlHcwUaYlehe6nLBEn?hNDVX4nvs4mzOcJz9ian

LOAD CASE(S) Standard 41) 9th Unbal Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-14, 2-3=-18, 6-8=-20, 4-5=-137 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb) Vert: 12=-160

42) 10th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-46, 2-3=-50, 6-8=-20, 4-5=-105 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb) Vert: 12=-160

43) 11th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 6-8=-20, 4-5=-137 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 12=-160

44) 12th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Vert: 1-2=-54, 2-3=-58, 6-8=-20, 4-5=-105 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 12=-160

45) 13th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 6-8=-20, 4-5=-137 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 12=-160

46) 14th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 6-8=-20, 4-5=-105 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 12=-160

47) 15th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-3=-27, 6-8=-20, 4-5=-100

Concentrated Loads (lb)

Vert: 12=-160

48) 16th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-3=-70, 6-8=-20, 4-5=-57

Concentrated Loads (lb) Vert: 12=-160

49) 1st Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-3=-60, 6-8=-20, 4-5=-50

Concentrated Loads (lb)

Vert: 12=-160

50) 2nd Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 6-8=-20, 4-5=-90

Concentrated Loads (lb)

Vert: 12=-160

51) 3rd Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-50, 6-8=-20, 4-5=-109

Concentrated Loads (lb)

Vert: 12=-160

52) 4th Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 6-8=-20, 4-5=-139

Concentrated Loads (lb) Vert: 12=-160



Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008043 24-3341-A M03 MONOPITCH 6 Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:53 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-ef9Zf5IEhniPwoGrfVsQm_XsmdrhpEu0JQix8lz9iam 3-8-0 0-11-0 3-8-0 Scale = 1:12.3 3 2x4 J 4.00 12 4 2x4 || 3-8-0

Snow (Pf/Pg) 11.6/15.0 TCDI 10.0 **BCLL** 0.0 **BCDL** 10.0

LOADING (psf)

TCLL (roof)

LUMBER-

2x4 SP No.2

20.0

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

TOP CHORD

Structural wood sheathing directly applied or 3-8-0 oc purlins, except end verticals.

I/defl

>999

>999

n/a

L/d

240

180

n/a

PLATES

Weight: 18 lb

MT20

GRIP

244/190

FT = 20%

BOT CHORD

DEFL.

Vert(LL)

Vert(CT)

Horz(CT)

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

(loc)

4-7

4-7

2

-0.00

-0.01

0.00

REACTIONS.

4=Mechanical, 2=0-3-8 (size) Max Horz 2=53(LC 15) Max Uplift 4=-7(LC 16), 2=-39(LC 16) Max Grav 4=137(LC 21), 2=208(LC 21)

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

SPACING-

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 3-6-4 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
- 2) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

2-0-0

1.15

1.15

YES

CSI.

TC

ВС

WB

Matrix-MF

0.14

0.07

0.00

- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008044 24-3341-A M03GE MONOPITCH SUPPORTED

Riverside Roof Truss, LLC,

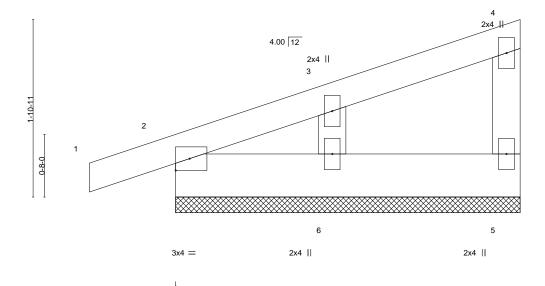
Danville, Va - 24541,

0-11-0

Job Reference (optional)
8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:53 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-ef9Zf5IEhniPwoGrfVsQm_XtrdsepEz0JQix8lz9iam

3-8-0

Scale = 1:12.3



LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES	CSI. TC 0.07 BC 0.01 WB 0.06	DEFL. Vert(LL) Vert(CT) Horz(CT)	in 0.00 -0.00 0.00	(loc) 1 1 5	l/defl n/r n/r n/a	L/d 120 120 n/a	PLATES MT20	GRIP 244/190
BCLL 0.0 * BCDL 10.0	Code IRC2018/TPI2014	Matrix-P	, ,					Weight: 18 lb	FT = 20%

LUMBER-

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

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

TOP CHORD Structural wood sheathing directly applied or 3-8-0 oc purlins,

except end verticals.

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

REACTIONS. (size) 5=3-8-0, 2=3-8-0, 6=3-8-0

Max Horz 2=51(LC 13)

Max Uplift 5=-2(LC 13), 2=-34(LC 16), 6=-10(LC 16) Max Grav 5=62(LC 21), 2=126(LC 21), 6=157(LC 21)

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

NOTES-

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



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)



Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008045 HALF HIP 24-3341-A M04 3 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4sE08bYgd9Y4SUhBz9ial 7-8-0 0-11-0 6-8-0 1-0-0 Scale = 1:18.2 3 2x4_H 4.00 12 2-10-11 3x6 =1-2-0 1-2-0 0-8-0 3x5 =

> 7-8-0 0-6-8 1-0-0

> > **BOT CHORD**

LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 16.5/15.0 TCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15	CSI. TC 0.86 BC 0.29	DEFL. in (loc) l/defl L/d Vert(LL) -0.03 7-12 >999 240 Vert(CT) -0.06 7-12 >999 180	PLATES GRIP MT20 244/190
BCLL 0.0 * BCDL 10.0	Rep Stress Incr NO Code IRC2018/TPI2014	WB 0.10 Matrix-MP	Horz(CT) 0.01 2 n/a n/a	Weight: 38 lb FT = 20%

LUMBER-BRACING-

3x8 ||

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

WEBS 2x4 SP No.3 WEDGE

Left: 2x4 SP No.3

REACTIONS. (size) 6=Mechanical, 2=0-3-0

Max Horz 2=115(LC 16) Max Uplift 2=-13(LC 16)

Max Grav 6=467(LC 28), 2=449(LC 36)

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

BOT CHORD 6-7=-138/385 **WEBS** 4-6=-488/165

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- C-C wind load user defined
- 4) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=16.5 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10, Lu=50-0-0; Min. flat roof snow load governs. Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) Provide adequate drainage to prevent water ponding.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- Refer to girder(s) for truss to truss connections.
- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2.
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 13) Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.
- 14) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 15) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

Continued on page 2 LOAD CASE(S)

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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6

4x4 =

2x4 II

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

except end verticals, and 2-0-0 oc purlins: 4-7, 4-5.

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



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8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 2 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4sE08bYgd9Y4SUhBz9ial

LOAD CASE(S)

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

Uniform Loads (plf)

Vert: 1-3=-43, 4-5=-83(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

2) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-60, 4-5=-90(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

3) Dead + 0.75 Roof Live (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-50, 4-5=-139(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

4) Dead + 0.75 Snow (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-37, 4-5=-133(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

5) Dead + 0.75 Snow (Unbal. Left) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-14=-37, 3-14=-42, 4-5=-114(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

6) Dead + 0.75 Snow (Unbal. Right) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-25, 4-5=-137(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

7) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-50(F=-30), 6-8=-40

Concentrated Loads (lb)

Vert: 15=-160 8) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=58, 2-13=45, 3-13=34, 4-5=16(F=-18), 6-8=-12

Horz: 1-2=-70, 2-13=-57, 3-13=-46, 3-4=7, 5-6=36

Concentrated Loads (lb)

Vert: 15=-160

9) Dead + 0.6 C-C Wind (Pos. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=29, 2-13=34, 3-13=45, 4-5=27(F=-18), 6-8=-12

Horz: 1-2=-41, 2-13=-46, 3-13=-57, 3-4=-51, 5-6=-23

Concentrated Loads (lb)

Vert: 15=-160

10) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-3, 2-3=-42, 4-5=-60(F=-18), 6-8=-20

Horz: 1-2=-17, 2-3=22, 3-4=-30, 5-6=-33

Concentrated Loads (lb)

Vert: 15=-160

11) Dead + 0.6 C-C Wind (Neg. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-37, 2-3=-42, 4-5=-60(F=-18), 6-8=-20

Horz: 1-2=17, 2-3=22, 3-4=28, 5-6=25

Concentrated Loads (lb)

Vert: 15=-160

12) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=28, 2-3=13, 4-5=8(F=-18), 6-8=-12

Horz: 1-2=-40, 2-3=-25, 3-4=-11, 5-6=18

Concentrated Loads (lb)

Vert: 15=-160

13) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=3, 2-3=8, 4-5=8(F=-18), 6-8=-12

Horz: 1-2=-15, 2-3=-20, 3-4=-26, 5-6=-15

Concentrated Loads (lb)

Vert: 15=-160

14) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60

Vert: 1-2=-16, 2-3=-21, 4-5=-39(F=-18), 6-8=-20

Horz: 1-2=-4, 2-3=1, 3-4=31, 5-6=7

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LOAD CASE(S)

Concentrated Loads (lb)

Vert: 15=-160

15) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-5, 2-3=-10, 4-5=-39(F=-18), 6-8=-20

Horz: 1-2=-15, 2-3=-10, 3-4=-4, 5-6=-25

Concentrated Loads (lb)

Vert: 15=-160

16) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=32, 2-3=17, 4-5=-1(F=-18), 6-8=-12

Horz: 1-2=-44, 2-3=-29, 3-4=-34, 5-6=23

Concentrated Loads (lb)

Vert: 15=-160

17) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=21, 2-3=6, 4-5=-12(F=-18), 6-8=-12

Horz: 1-2=-33, 2-3=-18, 3-4=-24, 5-6=23

Concentrated Loads (lb)

Vert: 15=-160

18) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 4-5=-39(F=-18), 6-8=-20

Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 15=-160

19) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 4-5=-39(F=-18), 6-8=-20

Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 15=-160

20) Dead + Snow on Overhangs: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-2=-43, 2-3=-20, 4-5=-50(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

21) Dead + Snow (Unbal. Left): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-14=-43, 3-14=-49, 4-5=-57(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160 22) Dead + Snow (Unbal. Right): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-88(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

23) Dead: Lumber Increase=0.90, Plate Increase=0.90 Plt. metal=0.90

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-50(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

24) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 15=-160

25) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75 (0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-26, 2-3=-30, 4-5=-124(F=-79), 6-8=-20

Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 15=-160

26) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate

Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

27) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

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LOAD CASE(S)

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

28) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 15=-160

29) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-39, 2-3=-43, 4-5=-129(F=-79), 6-8=-20 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 15=-160

30) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

31) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

32) Dead + Minimum Snow: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-80(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

33) Dead + 0.6 C-C Wind Min. Down: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=4, 2-3=-28, 4-5=-46(F=-18), 6-8=-12

Horz: 1-2=-16, 2-3=16, 3-4=-16, 5-6=-16

Concentrated Loads (lb)

Vert: 15=-160

34) Dead + 0.6 C-C Wind Min. Upward: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-3=4, 4-5=-14(F=-18), 6-8=-12

Horz: 1-3=-16, 3-4=16, 5-6=16

Concentrated Loads (lb)

Vert: 15=-160

35) 3rd Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-100(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

36) 4th Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-70, 4-5=-57(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

37) 5th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-25, 4-5=-146(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

38) 6th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-57, 4-5=-114(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

39) 7th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60,

Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 4-5=-137(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 15=-160

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Job	Truss	Truss Type	Qty	Ply	RVF-LOT #11 ROOF	
24-3341-A	M04	HALF HIP	3	1		166008045
24-3341-A	10104	TIALI TIIF	٦	'	Job Reference (optional)	

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ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4sE08bYgd9Y4SUhBz9ial

LOAD CASE(S)

40) 8th Unbai. Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 15=-160

41) 9th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-14, 2-3=-18, 4-5=-137(F=-79), 6-8=-20

Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19 Concentrated Loads (lb)

Vert: 15=-160

42) 10th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-46, 2-3=-50, 4-5=-105(F=-79), 6-8=-20

Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 15=-160

43) 11th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Vert: 1-2=-22, 2-3=-26, 4-5=-137(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

44) 12th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

45) 13th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 4-5=-137(F=-79), 6-8=-20 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 15=-160

46) 14th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105(F=-79), 6-8=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 15=-160

47) 15th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-100(F=-30), 6-8=-20

Concentrated Loads (lb) Vert: 15=-160

48) 16th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-70, 4-5=-57(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

49) 1st Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-60, 4-5=-50(F=-30), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

50) 2nd Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-90(F=-30), 6-8=-20

Concentrated Loads (lb) Vert: 15=-160

51) 3rd Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15 Uniform Loads (plf)

Vert: 1-3=-50, 4-5=-109(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160

52) 4th Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-139(F=-89), 6-8=-20

Concentrated Loads (lb)

Vert: 15=-160



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)

Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008046 24-3341-A M04SGE **GABLE** Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4xZ081Yhe9Y4SUhBz9ial 7-8-0 0-11-0 6-8-0 1-0-0 Scale = 1:18.2 3 2x4_H 2x4 || 4.00 12 2x4 | 2-10-11 1-2-0 1-2-0 0-8-0 3x6 =7 6 2x4 2x4 | 2x4 II 4x4 = 3x8 || 6-8-0 0-6-8 0-6-8 2-6-4

Plate Offsets (X,Y)-- [2:0-0-0,0-0-10], [2:0-2-1,0-9-1]

LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 16.5/15.0 TCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr NO	CSI. TC 0.52 BC 0.26 WB 0.03	DEFL. Vert(LL) -0.0 Vert(CT) -0.0 Horz(CT) 0.0)1 8-17	l/defl >999 >999 n/a	L/d 240 180 n/a	PLATES MT20	GRIP 244/190
BCLL 0.0 * BCDL 10.0	Code IRC2018/TPI2014	Matrix-MP					Weight: 41 lb	FT = 20%

TOP CHORD

BOT CHORD

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

except end verticals, and 2-0-0 oc purlins: 4-7, 4-5.

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

LUMBER-BRACING-

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

OTHERS 2x4 SP No.3 WEDGE

Left: 2x4 SP No.3

REACTIONS. (size) 6=Mechanical, 2=0-3-0, 8=0-3-8

Max Horz 2=115(LC 16)

Max Uplift 2=-25(LC 16)

Max Grav 6=337(LC 28), 2=310(LC 36), 8=289(LC 36)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- C-C wind load user defined.
- 4) 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.
- 5) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=16.5 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10, Lu=50-0-0; Min. flat roof snow load governs. Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.
- 6) Unbalanced snow loads have been considered for this design.
- 7) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 8) Provide adequate drainage to prevent water ponding.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 12) Refer to girder(s) for truss to truss connections.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2.
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 15) Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.

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

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



Edenton, NC 27932

minim

June 5,2024

ORTH

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TP11 Quality Criteria and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)

Joh Truss Truss Type Qty RVF-LOT #11 ROOF 166008046 24-3341-A M04SGE **GABLE** 1 Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 2 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4xZ081Yhe9Y4SUhBz9ial

LOAD CASE(S)

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

Uniform Loads (plf)

Vert: 1-3=-43, 4-5=-83, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

2) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-60, 4-5=-90, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

3) Dead + 0.75 Roof Live (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-50 4-5=-139 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

4) Dead + 0.75 Snow (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-37, 4-5=-133, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

5) Dead + 0.75 Snow (Unbal. Left) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-18=-37, 3-18=-42, 4-5=-114, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

6) Dead + 0.75 Snow (Unbal. Right) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-25, 4-5=-137, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

7) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-50, 6-13=-40

Concentrated Loads (lb)

Vert: 19=-160 8) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=61, 2-3=52, 4-5=34, 6-13=-12

Horz: 1-2=-73, 2-3=-64, 3-4=7, 5-6=36

Concentrated Loads (lb)

Vert: 19=-160

9) Dead + 0.6 C-C Wind (Pos. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf) Vert: 1-2=47, 2-3=52, 4-5=34, 6-13=-12

Horz: 1-2=-59, 2-3=-64, 3-4=-69, 5-6=-23

Concentrated Loads (lb) Vert: 19=-160

10) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-3, 2-3=-42, 4-5=-60, 6-13=-20

Horz: 1-2=-17, 2-3=22, 3-4=-48, 5-6=-33

Concentrated Loads (lb)

Vert: 19=-160

11) Dead + 0.6 C-C Wind (Neg. Internal) Case 2: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-37, 2-3=-42, 4-5=-60, 6-13=-20

Horz: 1-2=17, 2-3=22, 3-4=28, 5-6=25

Concentrated Loads (lb)

Vert: 19=-160

12) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=28, 2-3=13, 4-5=8, 6-13=-12

Horz: 1-2=-40, 2-3=-25, 3-4=-11, 5-6=18

Concentrated Loads (lb)

Vert: 19=-160

13) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=3, 2-3=8, 4-5=8, 6-13=-12

Horz: 1-2=-15, 2-3=-20, 3-4=-26, 5-6=-15

Concentrated Loads (lb)

Vert: 19=-160

14) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60

Vert: 1-2=-16, 2-3=-21, 4-5=-39, 6-13=-20 Horz: 1-2=-4, 2-3=1, 3-4=31, 5-6=7

Continued on page 3







Joh Truss Truss Type Qty RVF-LOT #11 ROOF 166008046 24-3341-A M04SGE **GABLE** 1 Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 3 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4xZ081Yhe9Y4SUhBz9ial

LOAD CASE(S)

Concentrated Loads (lb)

Vert: 19=-160

15) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-5, 2-3=-10, 4-5=-39, 6-13=-20

Horz: 1-2=-15, 2-3=-10, 3-4=-4, 5-6=-25

Concentrated Loads (lb)

Vert: 19=-160

16) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=32, 2-3=17, 4-5=-1, 6-13=-12 Horz: 1-2=-44, 2-3=-29, 3-4=-34, 5-6=23

Concentrated Loads (lb)

Vert: 19=-160

17) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=21, 2-3=6, 4-5=-12, 6-13=-12

Horz: 1-2=-33, 2-3=-18, 3-4=-24, 5-6=23

Concentrated Loads (lb)

Vert: 19=-160

18) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 4-5=-39, 6-13=-20

Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 19=-160

19) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-16, 2-3=-21, 4-5=-39, 6-13=-20

Horz: 1-2=-4, 2-3=1, 3-4=6, 5-6=12

Concentrated Loads (lb)

Vert: 19=-160

20) Dead + Snow on Overhangs: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-2=-43, 2-3=-20, 4-5=-50, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

21) Dead + Snow (Unbal. Left): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-18=-43, 3-18=-49, 4-5=-57, 6-13=-20

Concentrated Loads (lb) Vert: 19=-160

22) Dead + Snow (Unbal. Right): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-88, 6-13=-20

Concentrated Loads (lb) Vert: 19=-160

23) Dead: Lumber Increase=0.90, Plate Increase=0.90 Plt. metal=0.90

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-50, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

24) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 19=-160

25) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75 (0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-26, 2-3=-30, 4-5=-124, 6-13=-20 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 19=-160

26) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate

Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

27) Dead + 0.75 Snow (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Continued on page 4



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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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)



Joh Truss Truss Type Qty RVF-LOT #11 ROOF 166008046 24-3341-A M04SGE **GABLE** 1 Job Reference (optional)

Riverside Roof Truss, LLC,

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 4 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4xZ081Yhe9Y4SUhBz9ial

LOAD CASE(S)

Uniform Loads (plf)

Vert: 1-2=-34, 2-3=-38, 4-5=-124, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

28) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 19=-160

29) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-39, 2-3=-43, 4-5=-129, 6-13=-20 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 19=-160

30) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

31) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-47, 2-3=-51, 4-5=-129, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

32) Dead + Minimum Snow: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-80, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

33) Dead + 0.6 C-C Wind Min. Down: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=4, 2-3=-28, 4-5=-46, 6-13=-12

Horz: 1-2=-16, 2-3=16, 3-4=-16, 5-6=-16

Concentrated Loads (lb)

Vert: 19=-160

34) Dead + 0.6 C-C Wind Min. Upward: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-3=4, 4-5=-14, 6-13=-12

Horz: 1-3=-16, 3-4=16, 5-6=16

Concentrated Loads (lb)

Vert: 19=-160

35) 3rd Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-100, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

36) 4th Unbal.Dead + Snow (balanced) + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-70, 4-5=-57, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

37) 5th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-25, 4-5=-146, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

38) 6th Unbal.Dead + 0.75 Snow (balanced) + 0.75 Attic Floor + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-57, 4-5=-114, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

39) 7th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60,

Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 4-5=-137, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 19=-160

Continued on page 5





Job	Truss	Truss Type	Qty	Ply	RVF-LOT #11 ROOF	
04.0044.4	M0400F	CARLE				166008046
24-3341-A	M04SGE	GABLE	1	1	Job Reference (optional)	

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:54 2024 Page 5 ID:Bxl2MwYau_NHkbraGCmHloyOvst-6rjxsRJsS5qGYxq1DCNfJC4xZ081Yhe9Y4SUhBz9ial

LOAD CASE(S)

40) 8th Unbai. Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left) + Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=23, 5-6=5

Concentrated Loads (lb)

Vert: 19=-160

41) 9th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-14, 2-3=-18, 4-5=-137, 6-13=-20 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 19=-160

42) 10th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right) + Parallel: Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-46, 2-3=-50, 4-5=-105, 6-13=-20 Horz: 1-2=-11, 2-3=-7, 3-4=-3, 5-6=-19

Concentrated Loads (lb)

Vert: 19=-160

43) 11th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 4-5=-137, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

44) 12th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60 Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

45) 13th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-22, 2-3=-26, 4-5=-137, 6-13=-20 Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb)

Vert: 19=-160

46) 14th Unbal.Dead + 0.75 Snow (unbal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-54, 2-3=-58, 4-5=-105, 6-13=-20

Horz: 1-2=-3, 2-3=1, 3-4=5, 5-6=9

Concentrated Loads (lb) Vert: 19=-160

47) 15th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-27, 4-5=-100, 6-13=-20

Concentrated Loads (lb) Vert: 19=-160

48) 16th Unbal.Dead + Minimum Snow + Parallel: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-70, 4-5=-57, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

49) 1st Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-60, 4-5=-50, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

50) 2nd Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-90, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

51) 3rd Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-50, 4-5=-109, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

52) 4th Dead + 0.75 Roof Live (unbalanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-20, 4-5=-139, 6-13=-20

Concentrated Loads (lb)

Vert: 19=-160

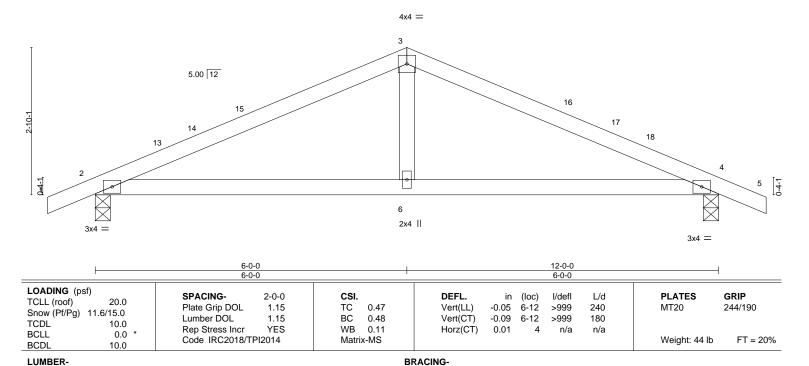






Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008047 24-3341-A T01 COMMON 5 Job Reference (optional) Riverside Roof Truss, LLC, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:55 2024 Page 1 Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-a1HJ3nKUCPy795PDnwuurPd72QRrH7jJmkB2Ddz9iak 6-0-0 6-0-0 12-11-0 0-11-0 6-0-0 0-11-0

Scale = 1:22.2



TOP CHORD

BOT CHORD

BOT CHORD WEBS REACTIONS.

TOP CHORD

(size) 2=0-3-8, 4=0-3-8 Max Horz 2=37(LC 15)

Max Uplift 2=-58(LC 16), 4=-58(LC 16) Max Grav 2=535(LC 2), 4=535(LC 2)

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

TOP CHORD 2-3=-765/237. 3-4=-765/237 **BOT CHORD** 2-6=-119/654, 4-6=-119/654

2x4 SP No.2

2x4 SP No.2

2x4 SP No.3

WEBS 3-6=0/280

NOTES-

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



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

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

June 5,2024

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

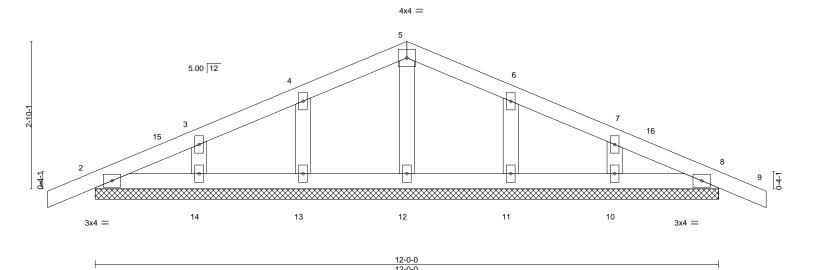
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall

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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008048 24-3341-A T01GE **GABLE** Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:55 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-a1HJ3nKUCPy795PDnwuurPdEWQYqH8rJmkB2Ddz9iak 6-0-0 6-0-0 12-0-0 12-11-0 0-11-0 6-0-0 0-11-0

Scale = 1:22.2



DEFL.

Vert(LL)

Vert(CT)

Horz(CT)

BRACING-

TOP CHORD

BOT CHORD

L/d

120

120

n/a

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

(loc)

8

9

8

-0.00

-0.00

0.00

I/defl

n/r

n/r

n/a

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

PLATES

Weight: 50 lb

MT20

GRIP

244/190

FT = 20%

LUMBER-

REACTIONS.

LOADING (psf)

Snow (Pf/Pg) 11.6/15.0

TCLL (roof)

TCDI

BCLL

BCDL

2x4 SP No 2

20.0

10.0

10.0

0.0

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

(lb) -

All bearings 12-0-0. Max Horz 2=-37(LC 14)

Max Uplift All uplift 100 lb or less at joint(s) 2, 8, 13, 14, 11, 10 Max Grav All reactions 250 lb or less at joint(s) 2, 8, 12, 13, 14, 11, 10

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

SPACING-

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 2-0-0, Exterior(2N) 2-0-0 to 6-0-0, Corner(3R) 6-0-0 to 9-0-0, Exterior(2N) 9-0-0 to 12-11-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

2-0-0

1.15

1.15

YES

CSI.

TC

ВС

WB

Matrix-S

0.06

0.03

0.03

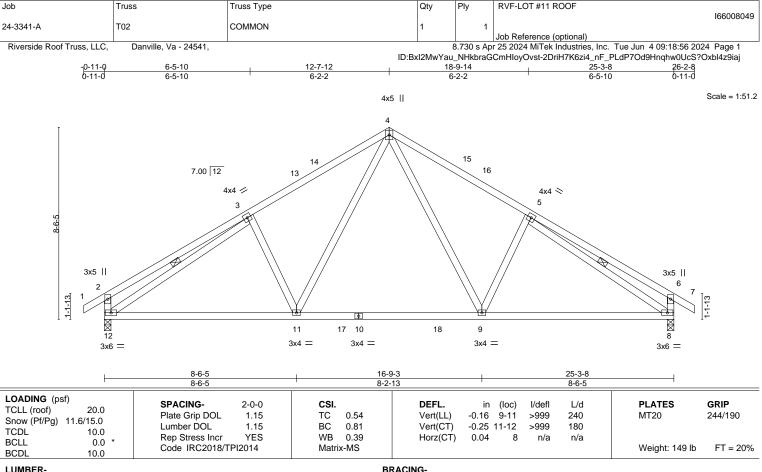
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 8, 13, 14, 11, 10.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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TOP CHORD

BOT CHORD

WEBS

RVF-LOT #11 ROOF

Structural wood sheathing directly applied or 4-7-7 oc purlins,

3-12, 5-8

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

except end verticals.

1 Row at midpt

Job

Truss

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

WEBS 2x4 SP No.3

REACTIONS. (size) 12=0-3-8, 8=0-3-8 Max Horz 12=-188(LC 14)

Max Uplift 12=-94(LC 16), 8=-94(LC 16) Max Grav 12=1181(LC 28), 8=1181(LC 29)

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

TOP CHORD 2-3=-425/126, 3-4=-1373/197, 4-5=-1373/197, 5-6=-425/126, 2-12=-406/133,

6-8=-406/133

BOT CHORD 11-12=-62/1290, 9-11=0/912, 8-9=-52/1178

WFBS 4-9=-46/616, 5-9=-267/162, 4-11=-46/616, 3-11=-267/162, 3-12=-1146/47,

5-8=-1145/47

NOTES-

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



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Job Truss Truss Type Qty Ply RVF-LOT #11 ROOF 166008050 24-3341-A T02G COMMON GIRDER 3 Job Reference (optional)

12-7-12

4-1-7

Riverside Roof Truss, LLC,

Danville, Va - 24541,

4-4-15

4-1-7

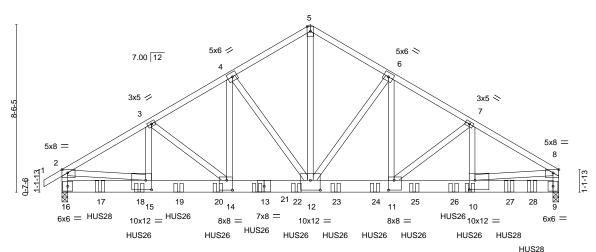
8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:57 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-WQP4UTLkk0CqPPZcuKwMxqiM3E7AlpRbE2g8HWz9iai 16-9-3 20-10-9 25-3-8 4-1-7 4-1-7 4-4-15

4x6 || Scale = 1:58.7

Structural wood sheathing directly applied or 4-4-9 oc purlins,

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

except end verticals.



12-7-12 16-9-3 4-4-15

Plate Offsets (X,Y) [2:0-3-8,	Plate Offsets (X,Y) [2:0-3-8,Edge], [8:0-3-8,Edge], [10:0-3-8,0-5-12], [11:0-3-8,0-6-0], [12:0-6-0,0-6-0], [14:0-3-8,0-6-0], [15:0-3-8,0-5-12]								
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 *	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr NO	CSI. TC 0.95 BC 0.42 WB 0.92		GRIP 244/190					
BCDL 10.0	Code IRC2018/TPI2014	Matrix-MS	Weight: 617 lb	FT = 20%					

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

2x4 SP No.2 TOP CHORD

BOT CHORD 2x8 SP DSS 2x4 SP No.3 *Except* **WEBS**

5-12: 2x4 SP No.2, 2-16,2-15,8-9,8-10: 2x4 SP No.1

REACTIONS. (size) 16=0-3-8, 9=0-3-8 Max Horz 16=180(LC 37)

Max Uplift 16=-530(LC 12), 9=-480(LC 12)

Max Grav 16=11320(LC 3), 9=13280(LC 3)

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

TOP CHORD 2-3=-15179/664, 3-4=-14142/591, 4-5=-11493/507, 5-6=-11493/506, 6-7=-14703/565,

7-8=-16962/598, 2-16=-9868/473, 8-9=-10936/395 **BOT CHORD** 15-16=-170/1826, 14-15=-507/13019, 12-14=-377/12192, 11-12=-353/12674,

10-11=-453/14572, 9-10=-83/2008

WEBS 5-12=-434/11298, 6-12=-4724/206, 6-11=-124/5232, 7-11=-2442/127, 7-10=-120/2553,

4-12=-3904/246, 4-14=-168/4283, 3-14=-1078/166, 3-15=-159/1115, 2-15=-409/11372,

8-10=-376/12765

NOTES-

1) 3-ply truss to be connected together with 10d (0.131"x3") nails as follows:

Top chords connected as follows: 2x4 - 1 row at 0-7-0 oc.

Bottom chords connected as follows: 2x8 - 3 rows staggered at 0-5-0 oc.

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

- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 3) Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=25ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 6) Unbalanced snow loads have been considered for this design.
- 7) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 10) Bearing at joint(s) 16, 9 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.





Edenton, NC 27932

June 5,2024

SEAL

036322

YORTH

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

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Job	Truss	Truss Type	Qty	Ply	RVF-LOT #11 ROOF	
24-3341-A	T02G	COMMON GIRDER	1	_		166008050
24 3041-7	1020	OOMMON GINDEN	'	3	Job Reference (optional)	

Danville, Va - 24541,

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:57 2024 Page 2 ID:Bxl2MwYau_NHkbraGCmHloyOvst-WQP4UTLkk0CqPPZcuKwMxqiM3E7AlpRbE2g8HWz9iai

- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 16=530, 9=480.
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 13) Use Simpson Strong-Tie HUS28 (22-10d Girder, 4-10d Truss, Single Ply Girder) or equivalent spaced at 20-10-0 oc max. starting at 1-11-4 from the left end to 23-11-4 to connect truss(es) to front face of bottom chord.
- 14) Use Simpson Strong-Tie HUS26 (14-10d Girder, 4-10d Truss) or equivalent spaced at 2-0-0 oc max. starting at 3-11-4 from the left end to 20-9-4 to connect truss(es) to front face of bottom chord.
- 15) Fill all nail holes where hanger is in contact with lumber.

LOAD CASE(S) Standard

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

Uniform Loads (plf)

Vert: 1-2=-43, 2-5=-43, 5-8=-43, 9-16=-20

Concentrated Loads (lb)

Vert: 10=-1259(F) 17=-1174(F) 18=-1174(F) 19=-1174(F) 20=-1259(F) 21=-1259(F) 22=-1259(F) 23=-1259(F) 24=-1259(F) 25=-1259(F) 26=-1259(F) 27=-1259(F)

28=-1174(F)



818 Soundside Road Edenton, NC 27932

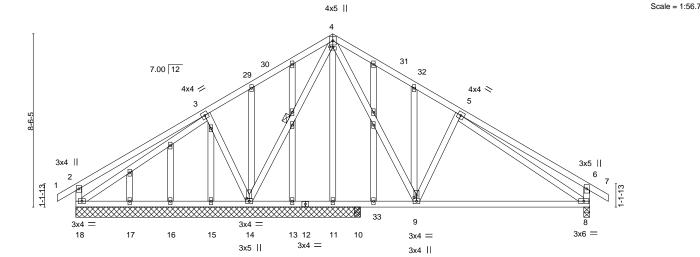
Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008051 24-3341-A T02SGE COMMON STRUCTURAL GA Job Reference (optional)
8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:58 2024 Page 1

Riverside Roof Truss, LLC,

Danville, Va - 24541,

ID:Bxl2MwYau_NHkbraGCmHloyOvst-_czSipMMVKKh0Z8oS2RbT2FeheQeUNglTiQiqyz9iah

6-5-10 6-2-2 6-2-2 6-5-10



-	8-6-5	14-0-0	16-9-3	25-3-8	1
	8-6-5	5-5-11	2-9-3	8-6-5	7
$\overline{}$	0 0 41 [0:0 4 6 0 4 0] [44:0 4 40 0 4 0]				

Plate Offsets (X,Y) [4:0-2-0,	Plate Offsets (X,Y) [4:0-2-0,0-0-4], [9:0-1-6,0-1-8], [14:0-1-10,0-1-8]					
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. TC 0.51 BC 0.60 WB 0.48 Matrix-MS	DEFL. in (loc) l/defl L/d Vert(LL) -0.13 8-9 >999 240 Vert(CT) -0.26 8-9 >528 180 Horz(CT) 0.01 8 n/a n/a	PLATES GRIP MT20 244/190 Weight: 209 lb FT = 20%		

LUMBER-

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

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

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

except end verticals.

BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing. **WEBS** 1 Row at midpt 4-14

REACTIONS. All bearings 14-0-0 except (jt=length) 8=0-3-8, 10=0-3-8.

Max Horz 18=-188(LC 14)

Max Uplift All uplift 100 lb or less at joint(s) 18, 8, 10 except 14=-123(LC 16)

4-9=-51/616, 5-9=-316/165, 4-14=-633/24, 3-14=-375/174, 5-8=-420/12

Max Grav All reactions 250 lb or less at joint(s) 11, 13, 15, 16, 17, 10 except 18=322(LC 34), 8=765(LC 29),

14=933(LC 28)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 4-5=-666/168, 5-6=-404/123, 2-18=-305/148, 6-8=-392/131 **BOT CHORD** 13-14=0/255, 11-13=0/255, 10-11=0/255, 9-10=0/255, 8-9=-21/577

WEBS NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=25ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 12-7-12, Exterior(2R) 12-7-12 to 15-7-12, Interior(1) 15-7-12 to 26-2-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable studs spaced at 2-0-0 oc.
- 9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 10) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18, 8, 10 except (jt=lb) 14=123.
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





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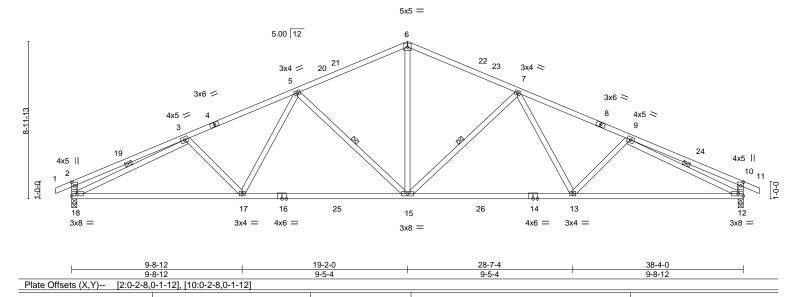
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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008052 COMMON 24-3341-A T03 6 Job Reference (optional) Riverside Roof Truss, LLC, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:59 2024 Page 1 Danville, Va - 24541,

ID:Bxl2MwYau_NHkbraGCmHloyOvst-SoWqv9N?GdSYejj_0lzq0Fnj51iKDmPuhM9FMPz9iag 12-10-8 19-2-0 25-5-8 39-3-0 0-11-0 6-7-0 6-3-8 6-3-8 6-3-8 6-3-8 6-7-0

Scale = 1:65.8



LOADING (pst)	SPACING- 2-0	0-0 CSI.	DEFL.	in (loc)
TCLL (roof) 20.0				(/
Snow (Pf/Pg) 11.6/15.0	Plate Grip DOL 1.	15 TC 0.79	Vert(LL) -0.	.29 13-15
	Lumber DOL 1.	15 BC 0.89	Vert(CT) -0.	.52 13-15
TCDL 10.0	Rep Stress Incr Y	S WB 0.77	Horz(CT) 0.	.13 12
BCLL 0.0 *	Code IRC2018/TPI201		11012(01) 0.	10 12
BCDI 10.0	Code IRC2018/191201	4 Matrix-MS		

15 >999 240 15 >885 180 12 n/a n/a

I/defl

MT20 244/190

GRIP

FT = 20% Weight: 215 lb

PLATES

LUMBER-

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

Structural wood sheathing directly applied or 3-1-4 oc purlins,

L/d

except end verticals.

BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. **WEBS** 7-15, 5-15, 3-18, 9-12 1 Row at midpt

REACTIONS.

(size) 18=0-3-8, 12=0-3-8 Max Horz 18=159(LC 15)

Max Uplift 18=-126(LC 16), 12=-126(LC 16) Max Grav 18=1739(LC 28), 12=1739(LC 29)

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

2-3=-616/102, 3-5=-2860/257, 5-6=-2123/272, 6-7=-2123/272, 7-9=-2860/257, TOP CHORD

9-10=-616/102, 2-18=-455/144, 10-12=-454/145

17-18=-189/2716, 15-17=-129/2441, 13-15=-114/2383, 12-13=-179/2622 BOT CHORD WEBS 6-15=-66/1294, 7-15=-723/136, 7-13=0/483, 5-15=-723/136, 5-17=0/483,

3-18=-2425/184, 9-12=-2425/183

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=38ft; eave=5ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-11-0, Interior(1) 2-11-0 to 19-2-0, Exterior(2R) 19-2-0 to 23-0-0, Interior(1) 23-0-0 to 39-3-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 18=126 12=126
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



June 5,2024

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

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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008053 24-3341-A T03A Common Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:18:59 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-SoWqv9N?GdSYejj_0lzq0Fnkt1iMDmXuhM9FMPz9iag -0-11-0 0-11-0 12-9-5 19-2-0 25-6-11 38-2-0

6-4-11

6-4-11

Structural wood sheathing directly applied or 3-0-15 oc purlins,

5-14, 7-14, 3-17, 9-11

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

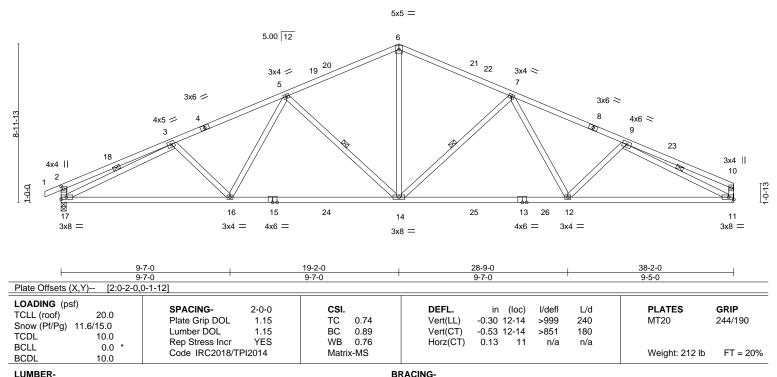
except end verticals.

1 Row at midpt

6-4-11

Scale = 1:65.4

6-2-11



TOP CHORD

BOT CHORD

WEBS

LUMBER-

TOP CHORD 2x4 SP No.2

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

REACTIONS. (size) 17=0-3-8, 11=Mechanical

6-4-11

6-4-11

Max Horz 17=160(LC 15)

Max Uplift 17=-125(LC 16), 11=-92(LC 16) Max Grav 17=1733(LC 28), 11=1678(LC 29)

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

2-3=-587/97, 3-5=-2851/255, 5-6=-2112/270, 6-7=-2111/272, 7-9=-2828/260, TOP CHORD

9-10=-428/61, 2-17=-438/140, 10-11=-302/74

16-17=-217/2696, 14-16=-159/2430, 12-14=-144/2362, 11-12=-214/2563 BOT CHORD WEBS 5-16=0/472, 5-14=-722/138, 6-14=-64/1280, 7-14=-705/137, 7-12=0/452,

3-17=-2437/189, 9-11=-2558/226

NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=38ft; eave=5ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-10-13, Interior(1) 2-10-13 to 19-2-0, Exterior(2R) 19-2-0 to 22-11-13, Interior(1) 22-11-13 to 38-0-4 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
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 8) Refer to girder(s) for truss to truss connections
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11 except (jt=lb) 17=125
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



June 5,2024

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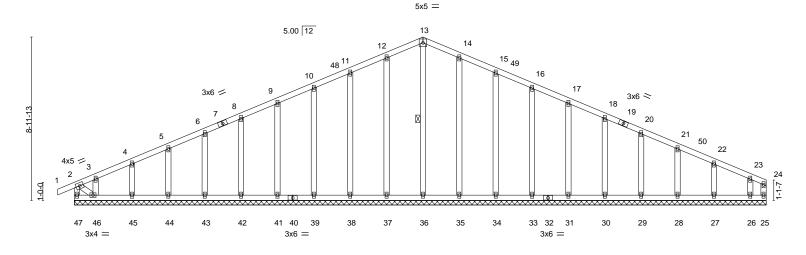


Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008054 24-3341-A T03AGE COMMON SUPPORTED GAB Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:00 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541,

ID:Bxl2MwYau_NHkbraGCmHloyOvst-x?4C7UOd1xbPGslBaTU3YTK3nRFVyMy2w0vpurz9iaf

38-0-8 0-11-0 19-2-0 18-10-8

Scale = 1:63.3



			8-0-8					
CADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. TC 0.09 BC 0.06 WB 0.17 Matrix-S	DEFL. Vert(LL) Vert(CT) Horz(CT)	-0.00 -0.00	1	defl L/d n/r 120 n/r 120 n/a n/a	PLATES MT20 Weight: 250 lb	GRIP 244/190 FT = 20%

38-0-8

LUMBER-BRACING-TOP CHORD

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

BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 46-47.

except end verticals.

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

WEBS 1 Row at midpt 13-36

REACTIONS. All bearings 38-0-8.

Max Horz 47=161(LC 15) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 47, 25, 37, 38, 39, 41, 42, 43, 44, 45, 46, 35, 34, 33, 31, 30,

29, 28, 27, 26

Max Grav All reactions 250 lb or less at joint(s) 47, 25, 36, 37, 38, 39, 41, 42, 43, 44, 45, 46, 35, 34, 33,

31, 30, 29, 28, 27, 26

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

TOP CHORD 12-13=-113/277, 13-14=-113/277

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=38ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 3-2-0, Exterior(2N) 3-2-0 to 19-2-0, Corner(3R) 19-2-0 to 23-2-0, Exterior(2N) 23-2-0 to 37-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- Gable studs spaced at 2-0-0 oc.
- 11) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 47, 25, 37, 38, 39, 41, 42, 43, 44, 45, 46, 35, 34, 33, 31, 30, 29, 28, 27, 26.
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008055 24-3341-A T03GE COMMON SUPPORTED GAB Job Reference (optional)

Riverside Roof Truss, LLC,

-0-11-0 0-11-0

Danville, Va - 24541,

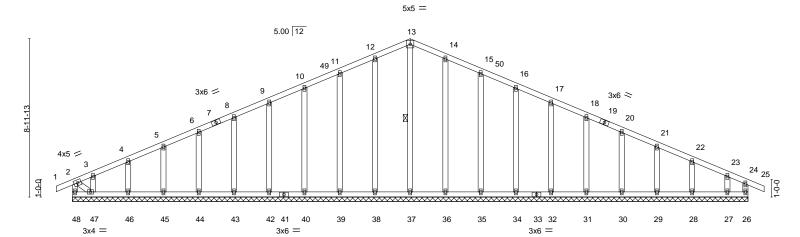
19-2-0

19-2-0

8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:01 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-PBebKqOFoFjGt0tN7A?I5gtDnrbnhpCB9geMQHz9iae

19-2-0 0-11-0

Scale = 1:65.4



		38-4	1-0						
LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0 BCLL 0.0 * BCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15 Rep Stress Incr YES Code IRC2018/TPI2014	CSI. TC 0.13 BC 0.06 WB 0.17 Matrix-S	DEFL. Vert(LL) Vert(CT) Horz(CT)	in -0.00 -0.00 0.00	(loc) 25 25 26	l/defl n/r n/r n/a	L/d 120 120 n/a	PLATES MT20 Weight: 252 lb	GRIP 244/190 FT = 20%

LUMBER-

TOP CHORD 2x4 SP No 2

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

OTHERS 2x4 SP No.3 BRACING-

BOT CHORD

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

except end verticals.

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

WEBS 1 Row at midpt 13-37

REACTIONS. All bearings 38-4-0.

Max Horz 48=-159(LC 14) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 48, 38, 39, 40, 42, 43, 44, 45, 46, 47, 36, 35, 34, 32, 31, 30, 29, 28, 27

All reactions 250 lb or less at joint(s) 48, 26, 37, 38, 39, 40, 42, 43, 44, 45, 46, 47, 36, 35, 34, Max Grav

32, 31, 30, 29, 28, 27

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

TOP CHORD 12-13=-106/276, 13-14=-106/276

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=38ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 3-2-0, Exterior(2N) 3-2-0 to 19-2-0, Corner(3R) 19-2-0 to 23-2-0, Exterior(2N) 23-2-0 to 39-3-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 4) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- Gable studs spaced at 2-0-0 oc.
- 11) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 13) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 48, 38, 39, 40, 42, 43, 44, 45, 46, 47, 36, 35, 34, 32, 31, 30, 29, 28, 27.
- 14) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008056 24-3341-A T04 Common 9 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:02 2024 Page 1

19-2-0

5-0-0

ID:Bxl2MwYau_NHkbraGCmHloyOvst-tNCzXAPtZYr7VASZhuWXduPFCFiwQ84LOKOvzkz9iad 24-2-0 38-2-0 5-0-0 7-1-0 6-11-0

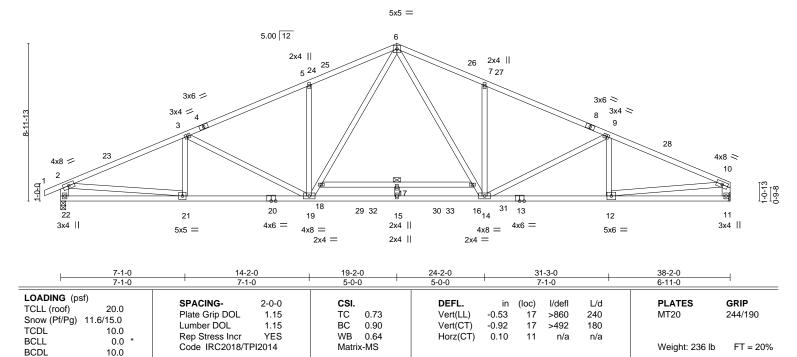
Structural wood sheathing directly applied or 2-2-0 oc purlins,

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

except end verticals.

6-0-0 oc bracing: 16-18

Scale = 1:65.7



TOP CHORD

BOT CHORD

LUMBER-BRACING-

14-2-0

7-1-0

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

13-20: 2x4 SP DSS **WEBS** 2x4 SP No.3 *Except*

2-22,10-11: 2x6 SP No.2, 2-21,10-12: 2x4 SP No.2

REACTIONS. (size) 22=0-3-8, 11=Mechanical

Max Horz 22=161(LC 15)

Max Uplift 22=-74(LC 16), 11=-37(LC 16) Max Grav 22=1906(LC 28), 11=1847(LC 29)

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

TOP CHORD 2-3=-3274/132, 3-5=-2993/130, 5-6=-2984/213, 6-7=-2970/210, 7-9=-2982/134,

9-10=-3217/140. 2-22=-1775/169. 10-11=-1719/119

BOT CHORD 21-22=-105/561, 19-21=-95/3050, 15-19=0/2111, 14-15=0/2111, 12-14=-92/2919,

WEBS 3-19=-384/104, 5-19=-395/164, 18-19=-96/1143, 6-18=-48/1248, 6-16=-47/1224,

14-16=-94/1119, 7-14=-389/162, 9-14=-363/109, 2-21=-8/2534, 10-12=-52/2638

-0-11-0 0-11-0

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=38ft; eave=5ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-10-13, Interior(1) 2-10-13 to 19-2-0, Exterior(2R) 19-2-0 to 22-11-13, Interior(1) 22-11-13 to 37-11-4 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Refer to girder(s) for truss to truss connections.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 22, 11.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



June 5,2024

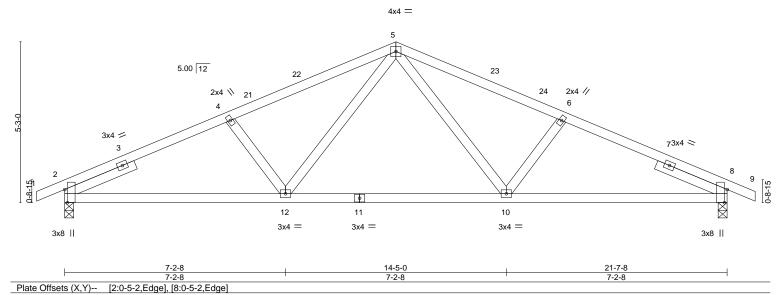
WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 1/2/2023 BEFORE USE.

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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008057 COMMON 24-3341-A T05 5 Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:03 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-LamLlWQVKsz_7K0mFb1mA5yUYf769jaUc_7TVAz9iac |-0-11-0 | 0-11-0 16-2-10 21-7-8 5-4-14 5-4-14 5-4-14 0-11-0

Scale = 1:37.6



BRACING-

TOP CHORD

BOT CHORD

LOADING (psf) SPACING-2-0-0 CSI. TCLL (roof) 20.0

Plate Grip DOL 1.15 TC 0.50 Lumber DOL 1.15 BC 0.58 Rep Stress Incr YES WB 0.18 Code IRC2018/TPI2014 Matrix-MS

DEFL (loc) I/defl L/d Vert(LL) -0.08 10-12 >999 240 Vert(CT) -0.19 10-12 >999 180 Horz(CT) 0.04 8 n/a n/a

MT20 244/190

GRIP

PLATES

Structural wood sheathing directly applied or 4-4-10 oc purlins.

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

Weight: 104 lb FT = 20%

LUMBER-

TCDL

BCLL

BCDL

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

Snow (Pf/Pg) 11.6/15.0

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

REACTIONS. (size) 2=0-3-8, 8=0-3-8 Max Horz 2=63(LC 15)

10.0

10.0

0.0 *

Max Uplift 2=-81(LC 16), 8=-81(LC 16) Max Grav 2=920(LC 2), 8=920(LC 2)

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

TOP CHORD $2-4=-1471/245,\ 4-5=-1343/240,\ 5-6=-1343/240,\ 6-8=-1471/245$ BOT CHORD

2-12=-156/1321, 10-12=-63/948, 8-10=-162/1321 **WEBS** 5-10=-32/431, 6-10=-266/139, 5-12=-32/431, 4-12=-266/139

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) -0-11-0 to 2-1-0, Interior(1) 2-1-0 to 10-9-12, Exterior(2R) 10-9-12 to 13-9-12, Interior(1) 13-9-12 to 22-6-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 8.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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

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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008058 24-3341-A T05GE COMMON SUPPORTED GAB Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:03 2024 Page 1

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

10-9-12

|-0-11-0 | 0-11-0

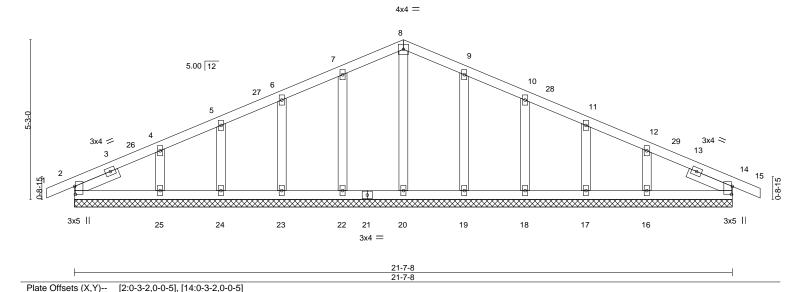
ID:Bxl2MwYau_NHkbraGCmHloyOvst-LamLlWQVKsz_7K0mFb1mA5yaMfGK9lZUc_7TVAz9iac 10-9-12

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

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

Scale = 1:37.9

= 20%



LOADING (psf) TCLL (roof) 20.0 Snow (Pf/Pg) 11.6/15.0 TCDL 10.0	SPACING- 2-0-0 Plate Grip DOL 1.15 Lumber DOL 1.15	CSI. TC 0.07 BC 0.05	DEFL. Vert(LL) Vert(CT)	in (loc) 0.00 14 0.00 14	l/defl n/r n/r	L/d 120 120	PLATES MT20	GRIP 244/190
BCLL 0.0 * BCDL 10.0	Rep Stress Incr YES Code IRC2018/TPI2014	WB 0.05 Matrix-S	Horz(CT)	0.00 14	n/a	n/a	Weight: 113 lb	FT = 20

BRACING-

TOP CHORD

BOT CHORD

LUMBER-

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

OTHERS 2x4 SP No.3 SLIDER Left 2x4 SP No.3 1-6-15, Right 2x4 SP No.3 1-6-15

REACTIONS. All bearings 21-7-8.

Max Horz 2=-63(LC 14) (lb) -

Max Uplift All uplift 100 lb or less at joint(s) 2, 22, 23, 24, 25, 19, 18, 17, 16, 14 All reactions 250 lb or less at joint(s) 2, 20, 22, 23, 24, 25, 19, 18, 17, 16, 14

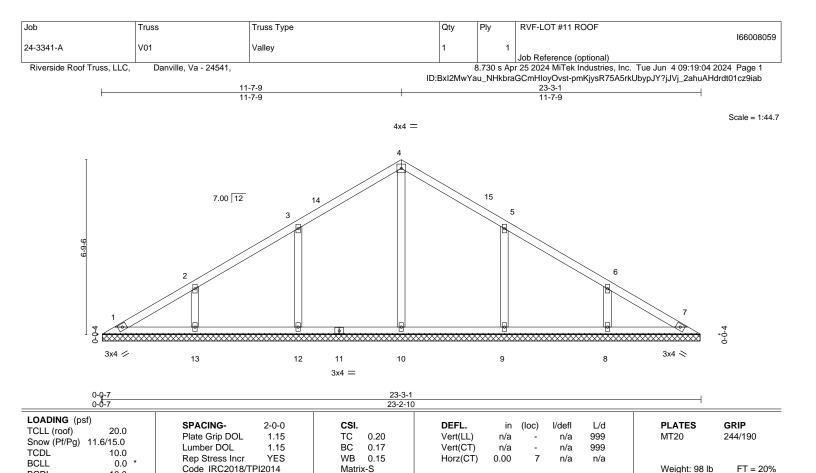
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=2ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Corner(3E) -0-11-0 to 2-1-0, Exterior(2N) 2-1-0 to 10-9-12, Corner(3R) 10-9-12 to 13-9-12, Exterior(2N) 13-9-12 to 22-6-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 5) Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
- 7) All plates are 2x4 MT20 unless otherwise indicated.
- 8) Gable requires continuous bottom chord bearing.
- 9) Gable studs spaced at 2-0-0 oc.
- 10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 12) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 22, 23, 24, 25, 19. 18. 17. 16. 14.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



June 5,2024





BRACING-

TOP CHORD

BOT CHORD

LUMBER-TOP CHORD

BCDL

2x4 SP No.2 2x4 SP No.2

10.0

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

REACTIONS. All bearings 23-2-3. Max Horz 1=129(LC 15)

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

Max Grav All reactions 250 lb or less at joint(s) 1, 7 except 10=380(LC 27), 12=431(LC 27), 13=366(LC 27),

9=430(LC 28), 8=366(LC 28)

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

3-12=-263/125, 5-9=-263/125 WEBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-7-9, Interior(1) 3-7-9 to 11-7-9, Exterior(2R) 11-7-9 to 14-7-9, Interior(1) 14-7-9 to 22-8-9 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 12, 13, 9, 8.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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

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

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Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008060 24-3341-A V02 Valley Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:05 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-Hyu5ACRIsTDiMeA8M03EFW1uiSw2de5n4HcaZ2z9iaa 10-2-6 10-2-6 10-2-6 Scale = 1:39.2 4x4 = 7.00 12 15 3x4 // 9 13 12 11 10 17 8 16 3x4 = 20-4-13

BRACING-

TOP CHORD

BOT CHORD

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

20.0 Snow (Pf/Pg) 11.6/15.0 10.0

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

CSI. TC 0.20 ВС 0.17 WB 0.11 Matrix-S

DEFL. L/d (loc) I/defl Vert(LL) n/a n/a 999 Vert(CT) 999 n/a n/a Horz(CT) 0.00 n/a n/a **PLATES** MT20

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

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

GRIP 244/190

Weight: 83 lb FT = 20%

LUMBER-

REACTIONS.

LOADING (psf)

TCLL (roof)

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

All bearings 20-3-15

Max Horz 1=-112(LC 14) Max Uplift All uplift 100 lb or less at joint(s) 1, 7, 12, 13, 9, 8

All reactions 250 lb or less at joint(s) 1, 7 except 10=370(LC 27), 12=429(LC 27), 13=308(LC 27), Max Grav

9=429(LC 28), 8=308(LC 28)

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

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 10-2-6, Exterior(2R) 10-2-6 to 13-2-6, Interior(1) 13-2-6 to 19-10-5 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 7, 12, 13, 9, 8.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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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166008061 24-3341-A V03 Valley Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:05 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-Hyu5ACRlsTDiMeA8M03EFW1uwSwMdedn4HcaZ2z9iaa 8-9-4 8-9-4 Scale = 1:33.8 4x4 = 3 7.00 12 2x4 || 2x4 || 13 3x4 / 3x4 <> 9 8 7 6 2x4 || 2x4 || 2x4 | 3x4 = 0-0-7 17-6-8 17-6-1 LOADING (psf) SPACING-2-0-0 DEFL. L/d **PLATES GRIP** CSI. (loc) I/defl TCLL (roof) 20.0 Plate Grip DOL TC Vert(LL) 999 244/190 1.15 0.25 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.15 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.08 Horz(CT) 0.00 5 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 68 lb FT = 20% **BCDL** 10.0 LUMBER-BRACING-

TOP CHORD

BOT CHORD

Qty

RVF-LOT #11 ROOF

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

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

TOP CHORD

Job

Truss

2x4 SP No.2 2x4 SP No.2

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

REACTIONS. All bearings 17-5-10. Max Horz 1=-96(LC 14)

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

Max Grav All reactions 250 lb or less at joint(s) 1, 5, 7 except 9=395(LC 33), 6=395(LC 34)

Truss Type

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

2-9=-294/135, 4-6=-294/135 WEBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 8-9-4, Exterior(2R) 8-9-4 to 11-9-4, Interior(1) 11-9-4 to 17-0-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 9, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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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166008062 24-3341-A V04 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:06 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-I9RUNYSOdnLZ_nlKwjbToka3UsH4M56wlxM76Vz9iaZ 14-8-3 Scale = 1:28.1 4x4 = 3 7.00 12 10 2x4 || 2x4 II 8 7 6 3x4 // 3x4 ≥ 2x4 || 2x4 || 2x4 || 14-7-13 LOADING (psf) SPACING-2-0-0 CSI. DEFL. I/defI L/d **PLATES GRIP** (loc) TCLL (roof) 20.0 Plate Grip DOL TC Vert(LL) 999 244/190 1.15 0.20 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.12 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.06 Horz(CT) 0.00 5 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 55 lb FT = 20% **BCDL** 10.0 BRACING-

TOP CHORD

BOT CHORD

Qty

RVF-LOT #11 ROOF

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

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

LUMBER-TOP CHORD

REACTIONS.

Job

2x4 SP No.2 2x4 SP No.2

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

> All bearings 14-7-6. Max Horz 1=-79(LC 14)

Truss

Truss Type

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

Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=271(LC 2), 8=324(LC 33), 6=324(LC 34)

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

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-4-2, Interior(1) 3-4-2 to 7-4-2, Exterior(2R) 7-4-2 to 10-4-2, Interior(1) 10-4-2 to 14-1-11 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 8, 6.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





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Truss Type Qty 166008063 24-3341-A V05 Valley Job Reference (optional) Riverside Roof Truss, LLC, Danville, Va - 24541, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:06 2024 Page 1 ID:Bxl2MwYau_NHkbraGCmHloyOvst-l9RUNYSOdnLZ_nlKwjbToka?VsEOM5wwlxM76Vz9iaZ 5-10-15 5-10-15 Scale = 1:23.1 4x5 = 2 7.00 12 3x4 / 3x4 > 2x4 || 11-9-15 11-9-8 LOADING (psf) SPACING-2-0-0 DEFL. I/defI L/d **PLATES GRIP** CSI. (loc) TCLL (roof) 20.0 Plate Grip DOL TC Vert(LL) 999 244/190 1.15 0.46 n/a n/a MT20 Snow (Pf/Pg) 11.6/15.0 Lumber DOL 1.15 ВС 0.29 Vert(CT) 999 n/a n/a TCDI 10.0 Rep Stress Incr YES WB 0.08 Horz(CT) 0.00 3 n/a n/a **BCLL** 0.0 Code IRC2018/TPI2014 Matrix-S Weight: 40 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. BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

RVF-LOT #11 ROOF

BOT CHORD **OTHERS**

REACTIONS.

Job

Truss

2x4 SP No.2

2x4 SP No.3

1=11-9-1, 3=11-9-1, 4=11-9-1 (size) Max Horz 1=-63(LC 14) Max Uplift 1=-26(LC 16), 3=-26(LC 16)

Max Grav 1=203(LC 2), 3=203(LC 2), 4=453(LC 2)

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

2-4=-294/106 WEBS

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; B=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 5-10-15, Exterior(2R) 5-10-15 to 8-10-15, Interior(1) 8-10-15 to 11-3-7 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
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.





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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)



Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008064 24-3341-A V06 Valley Job Reference (optional) 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:07 2024 Page 1 Riverside Roof Truss, LLC, Danville, Va - 24541, ID:Bxl2MwYau_NHkbraGCmHloyOvst-DL?sbuT0O5TQbxKXUR6iKx7CHGcg5Zf4Xb5gexz9iaY 4-5-13 4-5-13 Scale = 1:18.6 4x4 = 7.00 12 0-0-4 J-Ö-4 2x4 || 2x4 < 8-11-3 8-11-10 0-0-7 8-11-3

BCDL LUMBER-

LOADING (psf)

Snow (Pf/Pg) 11.6/15.0

TCLL (roof)

TCDI

BCLL

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

20.0

10.0

10.0

0.0

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

DEFL.

Vert(LL)

Vert(CT)

Horz(CT)

TOP CHORD BOT CHORD

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

L/d

999

999

n/a

PLATES

Weight: 30 lb

MT20

GRIP

244/190

FT = 20%

I/defI

n/a

n/a

n/a

(loc)

3

n/a

n/a

0.00

REACTIONS.

1=8-10-13, 3=8-10-13, 4=8-10-13 (size) Max Horz 1=-46(LC 14) Max Uplift 1=-27(LC 16), 3=-27(LC 16)

Max Grav 1=165(LC 2), 3=165(LC 2), 4=301(LC 2)

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

SPACING-

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; B=45ft; L=24ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional) and C-C Exterior(2E) 0-6-8 to 3-6-8, Interior(1) 3-6-8 to 4-5-13, Exterior(2R) 4-5-13 to 7-5-13, Interior(1) 7-5-13 to 8-5-2 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10

2-0-0

1.15

1.15

YES

CSI.

TC

ВС

WB

Matrix-P

0.33

0.16

0.04

- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



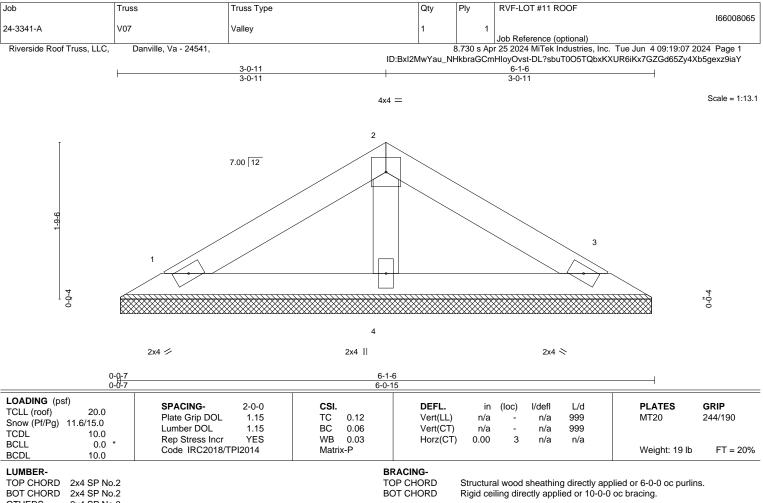
June 5,2024

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

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OTHERS 2x4 SP No.3

REACTIONS. 1=6-0-8, 3=6-0-8, 4=6-0-8 (size) Max Horz 1=29(LC 15)

Max Uplift 1=-17(LC 16), 3=-17(LC 16)

Max Grav 1=105(LC 2), 3=105(LC 2), 4=192(LC 2)

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

NOTES-

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





Job Truss Truss Type Qty RVF-LOT #11 ROOF 166008066 24-3341-A V08 Valley Job Reference (optional) Riverside Roof Truss, LLC, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 4 09:19:08 2024 Page 1 Danville, Va - 24541, ID:BxI2MwYau_NHkbraGCmHloyOvst-iXZEoEUe9ObHD5vj28dxt9fSmg_Uq0bDmFrEANz9iaX Scale = 1:7.5 3x4 = 7.00 12 3 J-0-C 0-0-4 2x4 // 2x4 < Plate Offsets (X,Y)-- [2:0-2-0,Edge]

DEFL

BRACING-

TOP CHORD

BOT CHORD

Vert(LL)

Vert(CT)

Horz(CT)

in (loc)

n/a

n/a

0.00

I/defl

3

n/a

n/a

n/a

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

L/d

999

999

n/a

Structural wood sheathing directly applied or 3-3-1 oc purlins.

PLATES

Weight: 9 lb

MT20

GRIP

244/190

FT = 20%

BCDL LUMBER-

REACTIONS.

TCLL (roof)

TCDL

BCLL

LOADING (psf)

TOP CHORD 2x4 SP No.2

Snow (Pf/Pg) 11.6/15.0

BOT CHORD 2x4 SP No.2

20.0

10.0

10.0

(size)

0.0 *

1=3-2-3, 3=3-2-3 Max Horz 1=-13(LC 14) Max Uplift 1=-5(LC 16), 3=-5(LC 16) Max Grav 1=87(LC 2), 3=87(LC 2)

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

SPACING-

Plate Grip DOL

Rep Stress Incr

Code IRC2018/TPI2014

Lumber DOL

NOTES-

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

2-0-0

1.15

1.15

YES

CSI.

0.02

0.06

0.00

TC

BC

WB

Matrix-P

- 4) Unbalanced snow loads have been considered for this design.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3.
- 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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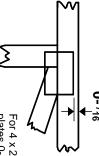


Symbols

PLATE LOCATION AND ORIENTATION



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



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

ω

တ

S

'n

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

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

PLATE SIZE

4 × 4

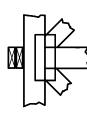
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

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.

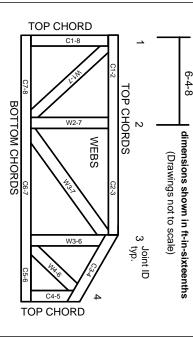
Industry Standards:

National Design Specification for Metal Plate Connected Wood Truss Construction Design Standard for Bracing.

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

ANSI/TPI1: DSB-22:

Numbering System



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

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

Product Code Approvals

ICC-ES Reports:

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

Design General Notes

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

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

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

▲ General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

- Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI
- Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
- Never exceed the design loading shown and never stack materials on inadequately braced trusses.
- Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
- Cut members to bear tightly against each other.
- Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1.
- Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
- Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.

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