

Carter Sanford Component Plant 298 Harvey Faulk Rd Sanford, NC 27332

Phone #:919-775-1450

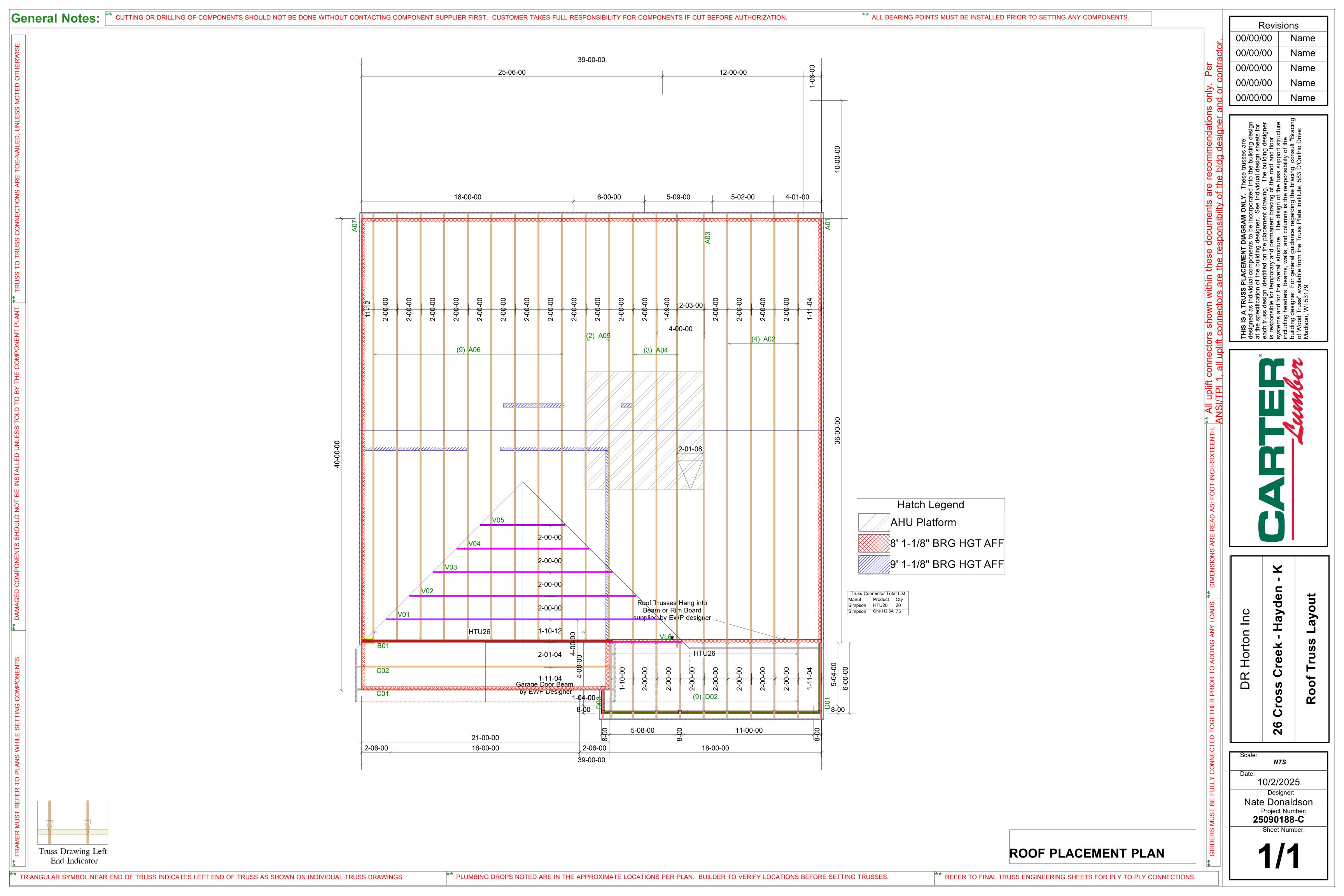
Builder: DR Horton Inc 26 Cross Creek -Model: Hayden - K



THE PLACEMENT PLAN NOTES:

- 1. The Placement Plan is a diagram for truss installation. It is not an engineered drawing and has not been reviewed by an engineer. The Owner/Building Designer is responsible for obtaining an engineer's review if one is required by the local jurisdiction.
- 2. The responsibilities of the Owner, Contractor, Building Designer, Component Designer and Component Manufacturer shall be as set forth in ANSI/TPI 1. Capitalized terms shall be as defined in ANSI/TP 1 unless otherwise indicated.
- 3. Each Component is designed as an individual component utilizing information provided by others. The Owner/Building Designer is responsible for reviewing all Component Submittal Packages and individual Component Design Drawings for compliance with the Construction Documents and compatibility with the overall Building design.
- 4. Contractor will not proceed with component installation until the Owner/Building Designer has reviewed the Component Submittal Package. Questions on the suitability of any Component will be resolved by the Building Designer.
- 5. The Building Designer and Contractor are responsible for all temporary and permanent bracing.
- 6. The Placement Plan assumes the building is dimensionally correct, structurally sound, and in a suitable condition to support each Component during installation and thereafter, including but not limited to installation of all bearing points. Proper design and construction of all structural components, including foundations, headers, beams, walls and columns are the responsibility of the Owner, Building Designer and Contractor.
- 7. Do not cut, drill, or modify any Component without first consulting the Component Manufacturer or Building Designer. Damaged Components shall not be installed unless directed by the Building Designer or approved by the Component Manufacturer.
- 8. Components must be handled and installed following all applicable safety standards and best practices, including but not limited to BCSI, OSHA, TPI and local codes. Failure to properly handle, brace or otherwise install Component can result in serious injury or death.
- 9. All uplift connectors shown within these documents are recommendations only. Per ANSI/TPI 1, all uplift connectors are the responsibility of the building designer and or contractor.

Approved By:	Date:
Approved by:	





RE: 25090188

26 Cross Creek - Hayden K - Roof

Trenco 818 Soundside Rd Edenton, NC 27932

Site Information:

Customer: DR Horton Inc Project Name: 25090188 Lot/Block: 26 Model: H Model: Hayden K

Address: Subdivision: Cross Creek

City: State:

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

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

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

This package includes 19 individual, dated Truss Design Drawings and 0 Additional Drawings.

No.	Seal#	Truss Name	Date
1	169125629	A01	10/25/2024
2	169125630	A02	10/25/2024
3	169125631	A03	10/25/2024
4	169125632	A04	10/25/2024
5	169125633	A05	10/25/2024
6	169125634	A06	10/25/2024
7	169125635	A07	10/25/2024
8	169125636	B01	10/25/2024
9	169125637	C01	10/25/2024
10	169125638	C02	10/25/2024
11	169125639	D01	10/25/2024
12	169125640	D02	10/25/2024
13	169125641	D03	10/25/2024
14	169125642	V01	10/25/2024
15	169125643	V02	10/25/2024
16	169125644	V03	10/25/2024
17	169125645	V04	10/25/2024
18	169125646	V05	10/25/2024
19	169125647	VL6	10/25/2024

The truss drawing(s) referenced above have been prepared by

Truss Engineering Co. under my direct supervision

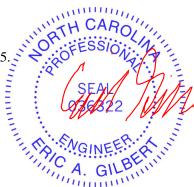
based on the parameters provided by Carter Components (Sanford, NC)).

Truss Design Engineer's Name: Gilbert, Eric

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

North Carolina COA: C-0844

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



October 25, 2024

Job Truss Truss Type Qty Ply 26 Cross Creek - Hayden K - Roof 25090188 A01 Common Supported Gable Job Reference (optional)

Carter Components (Sanford, NC), Sanford, NC - 27332,

Run: 8.73 E May 9 2024 Print: 8.730 E May 9 2024 MiTek Industries, Inc. Thu Oct 24 16:45:14 ID:vF2b2QneXVJP9E5leL0lSzzyU_5-Roo3Pb89Fl0GbVw?_9qUKZYKtZjSWT8jlsPX3dyQ9QZ

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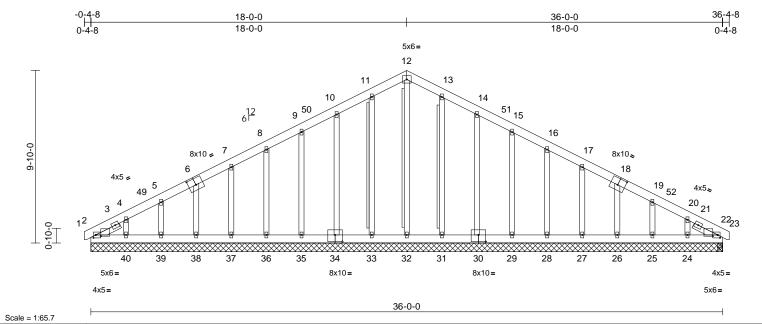


Plate Offsets (X, Y): [2:0-1-9,0-2-0], [2:0-3-7,0-0-13], [6:0-5-0,0-4-8], [18:0-5-0,0-4-8], [22:0-1-9,0-2-0], [22:0-3-7,0-0-13], [30:0-5-0,0-4-8], [34:0-5-0,0-4-8], [30:0-5-0,0

Loading	(psf)	Spacing	1-11-4	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.05	Vert(LL)	0.00	43	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	0.00	43	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.18	Horz(CT)	0.01	22	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 304 lb	FT = 20%

LUMBER

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

OTHERS 2x4 SP No.3 *Except* 0-0,0-0,0-0:2x4 SP No.2(flat)

SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

BRACING

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

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

bracing.

WEBS T-Brace: 2x4 SP No.2 - 12-32, 11-33, 13-31

> Fasten (2X) T and I braces to narrow edge of web with 10d (0.131"x3") nails, 6in o.c., with 3in minimum end distance.

Brace must cover 90% of web length.

REACTIONS All bearings 36-0-0.

(lb) - Max Horiz 2=141 (LC 14), 41=141 (LC 14) Max Uplift All uplift 100 (lb) or less at joint(s) 2, 24, 25, 26, 27, 28, 29, 30, 31, 33, 34, 35, 36, 37, 38, 39, 40, 41

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

40, 41, 45

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

TOP CHORD 11-12=-102/253, 12-13=-102/253

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; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) -0-3-14 to 3-3-4, Exterior(2N) 3-3-4 to 14-4-15, Corner(3R) 14-4-15 to 21-7-2, Exterior(2N) 21-7-2 to 32-8-12. Corner(3E) 32-8-12 to 36-3-14 zone: cantilever left and right exposed; end vertical left and right exposed C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- 6) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- 11) One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 2, 33, 34, 35, 36, 37, 38, 39, 40, 31, 30, 29, 28, 27, 26, 25, and 24. This connection is for uplift only and does not consider lateral forces.

- 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) Warning: Additional permanent and stability bracing for truss system (not part of this component design) is always required.

LOAD CASE(S) Standard



October 25,2024

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

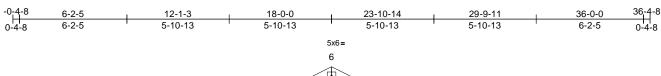
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall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

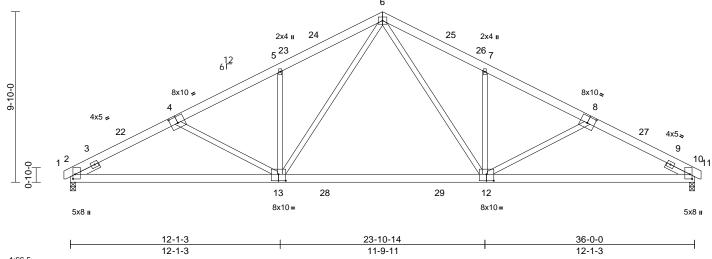




Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:51 ID:m1UPesaseHFNi6b7QPEqXNzyU0y-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f

Page: 1





Scale = 1:66.5

Plate Offsets (X, Y): [2:0-3-4,0-1-9], [4:0-5-0,0-4-8], [8:0-5-0,0-4-8], [10:0-3-4,0-1-9], [12:0-5-0,0-4-8], [13:0-5-0,0-4-8]

Loading	(psf)	Spacing	2-0-0	csı		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.34	Vert(LL)	-0.28	12-13	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.80	Vert(CT)	-0.45	12-13	>947	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.43	Horz(CT)	0.07	10	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 254 lb	FT = 20%

LUMBER

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

WEBS 2x4 SP No.3 *Except* 12-6,13-6:2x4 SP No.2 SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

BRACING

TOP CHORD Structural wood sheathing directly applied or

4-0-5 oc purlins.

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

bracing

REACTIONS (size) 2=0-3-8, 10=0-3-8

Max Horiz 2=145 (LC 14)

Max Uplift 2=-145 (LC 14), 10=-145 (LC 15)

Max Grav 2=1591 (LC 3), 10=1591 (LC 3)

FORCES (lb) - Maximum Compression/Maximum

Tension TOP CHORD 1-2=0/13, 2-5=-2924/301, 5-6=-2726/382,

6-7=-2726/382, 7-10=-2924/301, 10-11=0/13

BOT CHORD 2-10=-301/2526

WEBS 6-12=-204/1211, 7-12=-510/224,

8-12=-291/182, 6-13=-204/1211,

5-13=-510/225, 4-13=-291/181

NOTES

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 3-3-4. Interior (1) 3-3-4 to 14-4-15. Exterior(2R) 14-4-15 to 21-7-2. Interior (1) 21-7-2 to 32-8-12. Exterior(2E) 32-8-12 to 36-3-14 zone: cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 2 and 10. This connection is for uplift only and does not consider lateral forces.
- 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.

LOAD CASE(S) Standard



October 25,2024

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

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not

a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overal 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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	A03	Common	1	1	Job Reference (optional)	l69125631

6-2-5

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:51 ID:x5dHLZ07xxWiH_D17EEl8szyTqm-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f

29-9-11

23-10-14

Page: 1

36-0-0

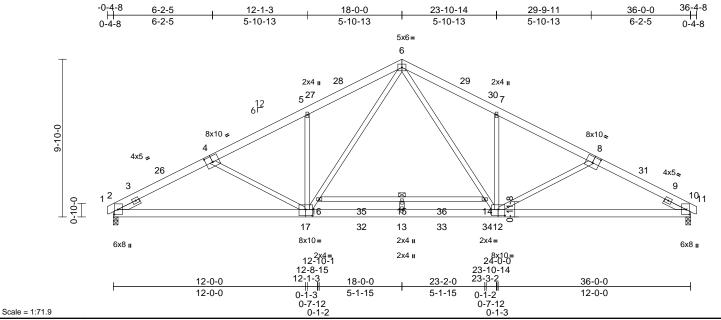


Plate Offsets (X, Y): [2:0-3-12,0-2-9], [4:0-5-0,0-4-8], [8:0-5-0,0-4-8], [10:0-3-12,0-2-9], [12:0-5-0,0-4-8], [17:0-5-0,0-4-8]

12-1-3

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.58	Vert(LL)	-0.35	15	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.59	Vert(CT)	-0.73	15	>591	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.39	Horz(CT)	0.07	10	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 271 lb	FT = 20%

LUMBER

TOP CHORD 2x6 SP No 2

2x6 SP 2400F 2.0E *Except* 16-14:2x4 SP **BOT CHORD**

No.2

WEBS 2x4 SP No.3 *Except* 12-6,17-6:2x4 SP No.2 SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

-- 1-6-0

BRACING

TOP CHORD Structural wood sheathing directly applied or

3-2-4 oc purlins

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

bracing.

REACTIONS (size) 2=0-3-8, 10=0-3-8 Max Horiz 2=145 (LC 14)

Max Grav 2=1903 (LC 3), 10=1903 (LC 3)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/13, 2-5=-3582/0, 5-6=-3434/3, 6-7=-3435/4, 7-10=-3583/0, 10-11=0/13

BOT CHORD 2-13=-8/3091, 10-13=0/3092, 15-16=-18/97,

14-15=-18/97

WEBS 5-17=-517/214, 4-17=-238/233,

7-12=-520/216, 6-14=-3/1579,

12-14=-43/1540, 8-12=-238/235

16-17=-44/1539, 6-16=-3/1578, 13-15=-267/0

NOTES

- Unbalanced roof live loads have been considered for this design
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 3-3-4, Interior (1) 3-3-4 to 14-4-15, Exterior(2R) 14-4-15 to 21-7-2, Interior (1) 21-7-2 to 32-8-12, Exterior(2E) 32-8-12 to 36-3-14 zone; cantilever left and right exposed ;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 200.0lb AC unit load placed on the bottom chord, 18-0-0 from left end, supported at two points, 5-0-0 apart.
- 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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 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.

LOAD CASE(S) Standard



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

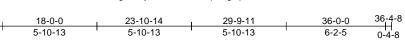
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Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	A04	Common	3	1	Job Reference (optional)	169125632

6-2-5

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:51 ID:5n1bX0l2OldsE9NkoPgROwzyTt_-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f



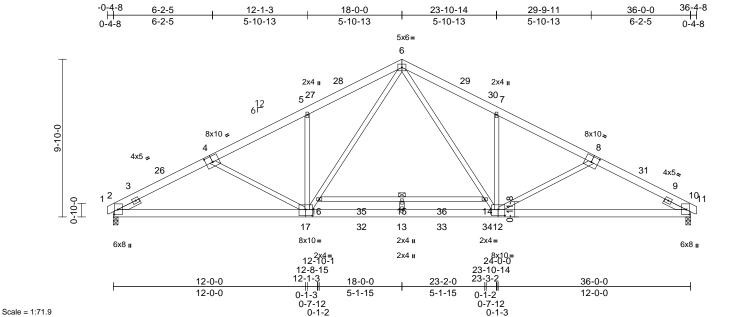


Plate Offsets (X, Y): [2:0-3-12,0-2-9], [4:0-5-0,0-4-8], [8:0-5-0,0-4-8], [10:0-3-12,0-2-9], [12:0-5-0,0-4-8], [17:0-5-0,0-4-8]

12-1-3

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.57	Vert(LL)	-0.35	15	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.59	Vert(CT)	-0.73	15	>591	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.39	Horz(CT)	0.07	10	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 271 lb	FT = 20%

LUMBER

TOP CHORD 2x6 SP No 2

BOT CHORD 2x6 SP 2400F 2.0E *Except* 16-14:2x4 SP

No.2

WEBS 2x4 SP No.3 *Except* 17-6,12-6:2x4 SP No.2 SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

-- 1-6-0

BRACING

TOP CHORD Structural wood sheathing directly applied or

3-2-5 oc purlins

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

bracing.

REACTIONS 2=0-3-8, 10=0-3-8 (size) Max Horiz 2=-145 (LC 19)

Max Grav 2=1903 (LC 3), 10=1903 (LC 3)

FORCES (lb) - Maximum Compression/Maximum Tension

TOP CHORD 1-2=0/13, 2-5=-3582/0, 5-6=-3434/3,

6-7=-3434/3, 7-10=-3582/0, 10-11=0/13

BOT CHORD 2-13=-8/3091, 10-13=0/3091, 15-16=-18/97,

14-15=-18/97

WEBS 5-17=-517/214, 16-17=-44/1539,

6-16=-2/1578, 4-17=-238/233, 6-14=-2/1578,

12-14=-43/1539, 7-12=-517/214, 8-12=-238/234, 13-15=-267/0

NOTES

- Unbalanced roof live loads have been considered for this design
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 3-3-4, Interior (1) 3-3-4 to 14-4-15, Exterior(2R) 14-4-15 to 21-7-2, Interior (1) 21-7-2 to 32-8-12, Exterior(2E) 32-8-12 to 36-3-14 zone; cantilever left and right exposed ;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- 200.0lb AC unit load placed on the bottom chord, 18-0-0 from left end, supported at two points, 5-0-0 apart.
- 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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 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.

LOAD CASE(S) Standard



Page: 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/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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	A05	Common	2	1	Job Reference (optional)	l69125633

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:51



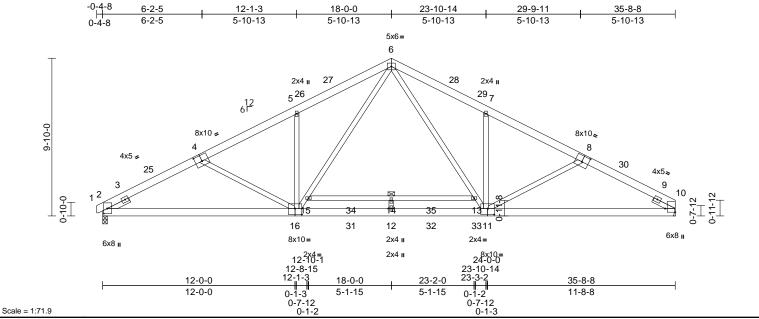


Plate Offsets (X, Y): [2:0-3-12,0-2-9], [4:0-5-0,0-4-8], [8:0-5-0,0-4-8], [10:Edge,0-7-10], [11:0-5-0,0-4-8], [16:0-5-0,0-4-8]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.69	Vert(LL)	-0.35	14	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.60	Vert(CT)	-0.73	14	>585	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.40	Horz(CT)	0.07	10	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 268 lb	FT = 20%

LUMBER

TOP CHORD 2x6 SP No 2

2x6 SP 2400F 2.0E *Except* 15-13:2x4 SP **BOT CHORD**

No.2

WEBS 2x4 SP No.3 *Except* 16-6,11-6:2x4 SP No.2 SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

-- 1-6-0

BRACING

TOP CHORD Structural wood sheathing directly applied or

2-10-2 oc purlins.

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

bracing.

REACTIONS 2=0-3-8, 10= Mechanical (size)

Max Horiz 2=150 (LC 14)

Max Grav 2=1895 (LC 3), 10=1875 (LC 3)

FORCES (lb) - Maximum Compression/Maximum Tension

TOP CHORD 1-2=0/13, 2-5=-3567/0, 5-6=-3418/3,

6-7=-3398/5, 7-10=-3517/0

2-12=-13/3076, 10-12=0/3019, 14-15=-18/95,

13-14=-18/95

WEBS 5-16=-518/214, 7-11=-528/216,

8-11=-208/235, 15-16=-44/1543, 6-15=-2/1583, 6-13=-3/1548 11-13=-44/1507, 4-16=-238/233,

12-14=-266/0

NOTES

BOT CHORD

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; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 3-2-14, Interior (1) 3-2-14 to 14-5-4, Exterior(2R) 14-5-4 to 21-6-12, Interior (1) 21-6-12 to 32-1-12, Exterior(2E) 32-1-12 to 35-8-8 zone; cantilever left and right exposed; end vertical left exposed:C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads
- 200.0lb AC unit load placed on the bottom chord, 18-0-0 from left end, supported at two points, 5-0-0 apart.
- 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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Refer to girder(s) for truss to truss connections.
- 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.

LOAD CASE(S) Standard



October 25,2024

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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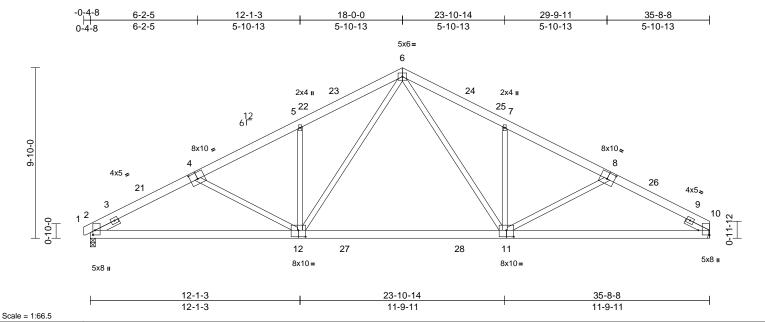


Plate Offsets (X, Y): [2:0-3-4,0-1-9], [4:0-5-0,0-4-8], [8:0-5-0,0-4-8], [10:Edge,0-7-10], [11:0-5-0,0-4-8], [12:0-5-0,0-4-8]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.43	Vert(LL)	-0.28	11-12	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.81	Vert(CT)	-0.46	11-12	>932	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.43	Horz(CT)	0.07	10	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 252 lb	FT = 20%

LUMBER

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

WEBS 2x4 SP No.3 *Except* 11-6,12-6:2x4 SP No.2 SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

BRACING

TOP CHORD

Structural wood sheathing directly applied or

3-10-15 oc purlins.

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

bracing

REACTIONS (size) 2=0-3-8, 10= Mechanical

Max Horiz 2=150 (LC 14)

Max Uplift 2=-145 (LC 14), 10=-135 (LC 15) Max Grav 2=1584 (LC 3), 10=1561 (LC 3)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/13, 2-5=-2910/299, 5-6=-2712/381,

6-7=-2695/380, 7-10=-2867/298

BOT CHORD 2-10=-306/2513

WEBS 7-11=-517/225, 5-12=-510/225,

4-12=-291/181, 6-11=-202/1185,

6-12=-204/1215, 8-11=-263/178

NOTES

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 3-2-14, Interior (1) 3-2-14 to 14-5-4, Exterior(2R) 14-5-4 to 21-6-12, Interior (1) 21-6-12 to 32-1-12, Exterior(2E) 32-1-12 to 35-8-8 zone; cantilever left and right exposed; end vertical left and right exposed: C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

- 3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 135 lb uplift at joint 10.
- 10) One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 2. This connection is for uplift only and does not consider lateral forces.
- 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.

LOAD CASE(S) Standard



October 25,2024



Job Truss Truss Type Qty Ply 26 Cross Creek - Hayden K - Roof 169125635 25090188 A07 Common Supported Gable Job Reference (optional)

Carter Components (Sanford, NC), Sanford, NC - 27332,

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:52 ID:ISAbvuJkJjelkMZSOkGIQ2zyTwq-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

Page: 1

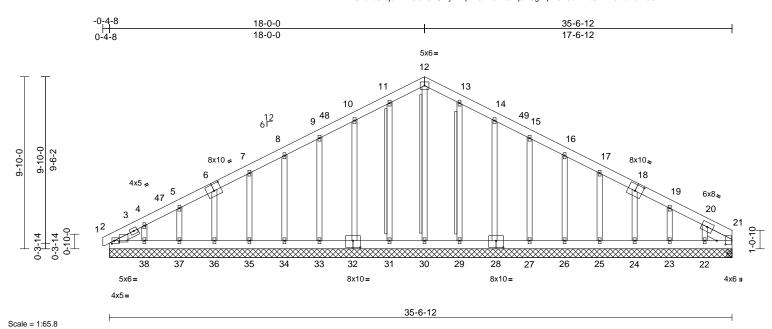


Plate Offsets (X, Y): [2:0-1-9,0-2-0], [2:0-3-7,0-0-13], [6:0-5-0,0-4-8], [18:0-5-0,0-4-8], [21:0-2-8,0-5-15], [28:0-5-0,0-4-8], [32:0-5-0,0-4-8]

Loading	(psf)	Spacing	2-0-0	csı		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.05	Vert(LL)	0.00	45	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	0.00	45	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.19	Horz(CT)	0.01	21	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 303 lb	FT = 20%

LUMBER

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

OTHERS 2x4 SP No.3 *Except* 0-0,0-0,0-0:2x4 SP

No.2(flat)

SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x6 SP No.2

-- 1-7-7

BRACING

TOP CHORD Structural wood sheathing directly applied or

6-0-0 oc purlins.

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

bracing.

WEBS T-Brace: 2x4 SP No.2 - 12-30,

11-31, 13-29

Fasten (2X) T and I braces to narrow edge of

web with 10d (0.131"x3") nails, 6in o.c., with 3in minimum end distance.

Brace must cover 90% of web length.

REACTIONS	(size)	2=35-6-12, 21=35-6-12,
		22=35-6-12, 23=35-6-12,

24=35-6-12, 25=35-6-12, 26=35-6-12, 27=35-6-12, 28=35-6-12, 29=35-6-12, 30=35-6-12, 31=35-6-12,

32=35-6-12, 33=35-6-12, 34=35-6-12, 35=35-6-12,

36=35-6-12, 37=35-6-12, 38=35-6-12, 39=35-6-12,

43=35-6-12

Max Horiz 2=152 (LC 14), 43=152 (LC 14)

Max Uplift 2=-5 (LC 10), 22=-90 (LC 15), 23=-41 (LC 15), 24=-44 (LC 15),

25=-46 (LC 15), 26=-43 (LC 15), 27=-45 (LC 15), 28=-52 (LC 15),

29=-21 (LC 15), 31=-27 (LC 14), 32=-50 (LC 14), 33=-45 (LC 14), 34=-43 (LC 14), 35=-45 (LC 14),

36=-46 (LC 14), 37=-32 (LC 14), 38=-92 (LC 14), 43=-5 (LC 10)

2=137 (LC 27), 21=104 (LC 28) 22=154 (LC 37), 23=154 (LC 37),

24=159 (LC 22), 25=164 (LC 1), 26=160 (LC 1), 27=176 (LC 22), 28=231 (LC 22), 29=238 (LC 22),

30=168 (LC 33), 31=238 (LC 21), 32=231 (LC 21), 33=176 (LC 21), 34=160 (LC 1), 35=164 (LC 1),

36=160 (LC 36), 37=151 (LC 1) 38=176 (LC 36), 39=104 (LC 28),

43=137 (LC 27)

(lb) - Maximum Compression/Maximum Tension

Max Grav

TOP CHORD 1-2=0/9, 2-4=-196/61, 4-5=-151/61 5-7=-113/88, 7-8=-68/112, 8-9=-66/135,

9-10=-78/169, 10-11=-93/218, 11-12=-105/252, 12-13=-105/252

13-14=-93/218, 14-15=-78/169, 15-16=-66/123, 16-17=-55/78, 17-19=-73/35,

19-20=-101/29, 20-21=-82/26 2-38=-42/137, 37-38=-42/137,

36-37=-42/137, 35-36=-44/140, 34-35=-44/140, 33-34=-44/140,

31-33=-44/140, 30-31=-43/139, 29-30=-43/139, 27-29=-44/140,

26-27=-44/140, 25-26=-44/140, 24-25=-44/140, 23-24=-42/137 22-23=-42/137, 21-22=-42/137

WEBS 12-30=-132/22, 11-31=-197/52,

10-32=-191/87, 9-33=-138/78, 8-34=-126/77, 7-35=-131/80, 6-36=-125/77, 5-37=-120/79, 4-38=-128/133, 13-29=-197/48,

14-28=-191/87, 15-27=-138/78, 16-26=-126/77, 17-25=-131/80,

18-24=-125/75, 19-23=-123/100, 20-22=-108/135

NOTES

- Unbalanced roof live loads have been considered for 1) this design
 - Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) -0-3-14 to 3-2-14, Exterior(2N) 3-2-14 to 14-5-4, Corner(3R) 14-5-4 to 21-6-12, Exterior (2N) 21-6-12 to 32-0-0, Corner(3E) 32-0-0 to 35-6-12 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



October 25,2024

Continued on page 2

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

FORCES

BOT CHORD

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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	A07	Common Supported Gable	1	1	Job Reference (optional)	169125635

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:52 ID:ISAbvuJkJjelkMZSOkGIQ2zyTwq-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

Truss designed for wind loads in the plane of the truss

Page: 2

- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- 11) Bearings are assumed to be: , Joint 21 User Defined .
- 12) One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 31, 32, 33, 34, 35, 36, 37, 38, 29, 28, 27, 26, 25, 24, 23, 22, and 2. This connection is for uplift only and does not consider lateral forces.
- 13) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 14) Warning: Additional permanent and stability bracing for truss system (not part of this component design) is always required.

LOAD CASE(S) Standard

Job Truss Truss Type Qty Ply 26 Cross Creek - Hayden K - Roof 169125636 25090188 B01 2 Common Girder Job Reference (optional)

Carter Components (Sanford, NC), Sanford, NC - 27332

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:52 ID:qdHuCSNJkkLV__VCNLN62azyTNu-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

Page: 1

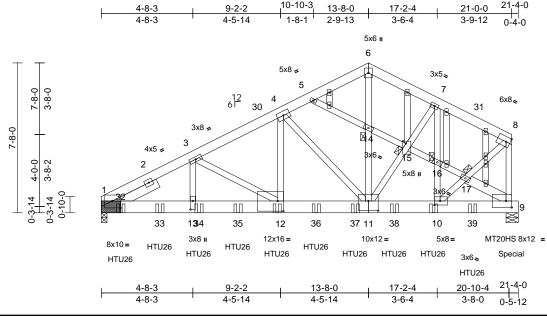


Plate Offsets (X, Y): [1:0-5-0,0-4-6], [9:0-3-8,0-4-0], [10:0-3-8,0-2-8], [11:0-6-0,0-6-0], [12:0-3-8,0-6-4], [13:0-5-4,0-1-8], [15:0-1-8,0-2-0]

Loading	(psf)	Spacing	1-11-4	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.80	Vert(LL)	-0.13	12-13	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.48	Vert(CT)	-0.24	12-13	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	NO	WB	0.84	Horz(CT)	0.05	9	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 454 lb	FT = 20%

LUMBER

Scale = 1:58.9

2x6 SP No.2 TOP CHORD BOT CHORD 2x8 SP 2400F 2.0E

WEBS 2x4 SP No.3 *Except* 12-4,11-6,10-8:2x4 SP

No.2, 17-9:2x6 SP No.2

OTHERS 2x4 SP No.3 SLIDER Left 2x6 SP No.2 -- 2-6-0

BRACING

TOP CHORD Structural wood sheathing directly applied or 3-9-1 oc purlins, except end verticals.

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

bracing.

JOINTS 1 Brace at Jt(s): 14,

15, 16, 17

REACTIONS (size) 1=(0-3-8 + bearing block), (req.

0-3-10), 9=0-7-8 Max Horiz 1=168 (LC 12)

Max Uplift 1=-784 (LC 12) Max Grav 1=8826 (LC 5), 9=10231 (LC 6)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-3=-13158/1157, 3-4=-10477/889,

4-5=-6956/560, 5-6=-5791/469,

6-7=-5593/458, 7-8=-4906/205,

8-9=-6334/263

BOT CHORD 1-13=-1134/11584, 12-13=-1134/11584,

10-12=-833/9316, 9-10=-167/1807 **WEBS** 3-13=-223/2667, 4-12=-470/5220,

11-14=-379/5187, 6-14=-379/5173, 10-16=-1295/424, 7-16=-1392/432, 3-12=-2644/348, 4-11=-3923/462, 11-15=-340/1184, 7-15=-341/1190, 5-14=-1864/192, 14-15=-1892/193, 15-16=-1941/201, 16-17=-2038/206

9-17=-2117/205. 10-17=-238/6035. 8-17=-218/5866

NOTES

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

Top chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc. 2x4 - 1 row at 0-9-0 oc. Bottom chords connected as follows: 2x8 - 2 rows staggered at 0-6-0 oc.

Web connected as follows: 2x4 - 1 row at 0-9-0 oc. Except member 4-12 2x4 - 1 row at 0-6-0 oc, member 7-10 2x4 - 1 row at 0-7-0 oc, 2x6 - 2 rows staggered at 0-9-0 oc.

- All loads are considered equally applied to all plies except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 2x8 SP 2400F 2.0E bearing block 12" long at jt. 1 attached to each face with 4 rows of 10d (0.131"x3") nails spaced 3" o.c. 16 Total fasteners per block. Bearing is assumed to be SP 2400F 2.0E.
- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed; end vertical left exposed; Lumber DOL=1.60 plate grip DOL=1.60
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable or consult qualified building designer as per ANSI/TPI 1
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- All plates are MT20 plates unless otherwise indicated.
- 10) All plates are 2x4 MT20 unless otherwise indicated.

- 11) Gable studs spaced at 2-0-0 oc.
- 12) 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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- 14) LGT2 Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 1. This connection is for uplift only and does not consider lateral forces
- 15) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- Use Simpson Strong-Tie HTU26 (10-16d Girder, 14-10dx1 1/2 Truss) or equivalent spaced at 2-0-0 oc max. starting at 1-0-0 from the left end to 17-0-0 to connect truss(es) to back face of bottom chord.



Continued on page 2

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 overal 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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	B01	Common Girder	1	2	Job Reference (optional)	169125636

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:52

Page: 2

17) Use Simpson Strong-Tie HTU26 (20-10d Girder, 14-10dx1 1/2 Truss, Single Ply Girder) or equivalent at 19-0-0 from the left end to connect truss(es) to back face of bottom chord, skewed 0.0 deg.to the left, sloping 0.0 $\,$ deg. down.

- 18) Fill all nail holes where hanger is in contact with lumber.
- 19) LGT2 Hurricane ties must have two studs in line below the truss.
- 20) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1862 lb down at 20-10-4 on bottom chord. The design/ selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

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

Uniform Loads (lb/ft)

Vert: 1-6=-58, 6-8=-58, 9-26=-19

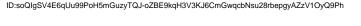
Concentrated Loads (lb)

Vert: 9=-1617 (B), 12=-1403 (B), 10=-1403 (B), 32=-1404 (B), 33=-1403 (B), 34=-1403 (B), 35=-1403 (B), 36=-1403 (B 39=-1611 (B)

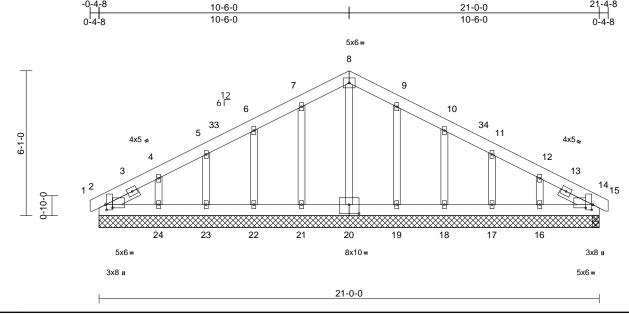
818 Soundside Road Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof			
25090188	C01	Common Supported Gable	1	1	Job Reference (optional)			

Run: 8.73 E May 9 2024 Print: 8.730 E May 9 2024 MiTek Industries. Inc. Thu Oct 24 16:46:10 ID:soQlgSV4E6qUu99PoH5mGuzyTQJ-oZBE9kqH3V3KJ6CmGwqcbNsu28rbepgyAZzV1OyQ9Ph



Page: 1



Scale = 1:48.4

Plate Offsets (X, Y): [2:0-2-10,0-0-8], [2:0-3-8,0-1-9], [14:0-2-10,0-0-8], [14:0-3-8,0-1-9], [20:0-5-0,0-4-8]

Loading	(psf)	Spacing	1-11-4	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.03	Vert(LL)	0.00	27	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	0.00	27	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.08	Horz(CT)	0.00	14	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 151 lb	FT = 20%

LUMBER

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

SLIDER Left 2x4 SP No.3 -- 1-6-0, Right 2x4 SP No.3

BRACING

TOP CHORD Structural wood sheathing directly applied or

6-0-0 oc purlins.

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

bracing.

REACTIONS All bearings 21-0-0.

(lb) - Max Horiz 2=83 (LC 14), 25=83 (LC 14)

Max Uplift All uplift 100 (lb) or less at joint(s) 2, 16, 17, 18, 19, 21, 22, 23, 24, 25

Max Grav All reactions 250 (lb) or less at joint (s) 2, 14, 16, 17, 18, 19, 20, 21, 22,

23, 24, 25, 29

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
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) -0-3-14 to 2-6-0, Exterior(2N) 2-6-0 to 7-6-0, Corner(3R) 7-6-0 to 13-6-0, Exterior(2N) 13-6-0 to 18-3-14, Corner(3E) 18-3-14 to 21-3-14 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 10) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- 11) One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 2, 21, 22, 23, 24, 19, 18, 17, and 16. This connection is for uplift only and does not consider lateral forces.
- 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.

LOAD CASE(S) Standard



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

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

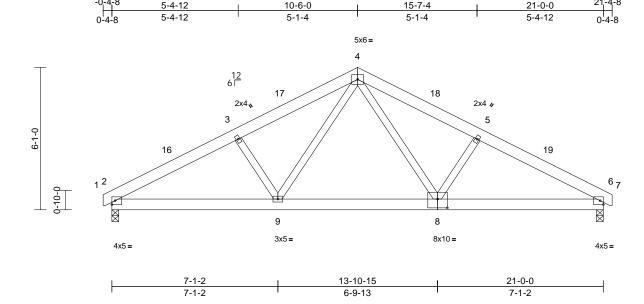
building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	C02	Common	1	1	Job Reference (optional)	169125638

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:53 ID:PzU3IBWmSwPZz4aYjwcSfbzyTP?-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

Page: 1



Scale = 1:49.2

Plate Offsets (X, Y): [8:0-5-0,0-4-8]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.25	Vert(LL)	-0.04	8-9	>999	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.34	Vert(CT)	-0.08	8-9	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.20	Horz(CT)	0.02	6	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 134 lb	FT = 20%

LUMBER

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

BRACING

TOP CHORD Structural wood sheathing directly applied or

5-11-14 oc purlins.

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

bracing.

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

Max Horiz 2=86 (LC 18)

Max Uplift 2=-86 (LC 14), 6=-86 (LC 15) Max Grav 2=902 (LC 21), 6=902 (LC 22)

(lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/9, 2-3=-1438/254, 3-4=-1274/269,

4-5=-1275/269, 5-6=-1438/254, 6-7=0/9 **BOT CHORD** 2-9=-154/1221, 6-9=-154/1221

WEBS 3-9=-350/169, 4-9=-72/484, 4-8=-73/485,

5-8=-350/169

NOTES

FORCES

- 1) Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-3-14 to 2-8-2, Interior (1) 2-8-2 to 7-6-0, Exterior(2R) 7-6-0 to 13-6-0, Interior (1) 13-6-0 to 18-3-14, Exterior(2E) 18-3-14 to 21-3-14 zone; cantilever left and right exposed; end vertical left and right exposed:C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10

- 4) Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 6 and 2. This connection is for uplift only and does not consider lateral forces.
- 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.

LOAD CASE(S) Standard



October 25,2024

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

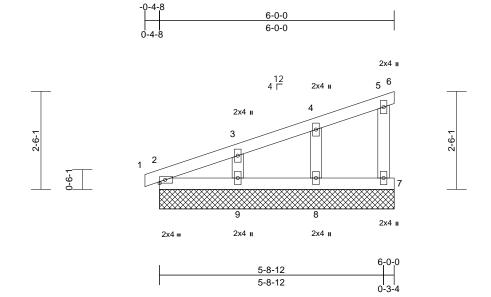
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/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	Ply	26 Cross Creek - Hayden K - Roof	
25090188	D01	Monopitch Supported Gable	1	1	Job Reference (optional)	169125639

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:53 ID:RPFco9iHZuPKmp1rZQ1BZjzw85G-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

Page: 1



Scale = 1:29.5

Loading	(psf)	Spacing	1-11-4	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.07	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.05	Vert(CT)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.06	Horz(CT)	0.00	6	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0			1							Weight: 25 lb	FT = 20%

LUMBER

TOP CHORD 2x4 SP No.2 **BOT CHORD** 2x4 SP No.2 2x4 SP No.3 WFBS 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 10-0-0 oc

bracing.

REACTIONS (size) 2=6-0-0, 6=6-0-0, 7=6-0-0, 8=6-0-0,

9=6-0-0, 10=6-0-0 Max Horiz 2=77 (LC 10), 10=77 (LC 10)

Max Uplift 6=-16 (LC 21), 7=-26 (LC 14), 8=-28 (LC 10), 9=-48 (LC 14) Max Grav 2=120 (LC 21), 6=5 (LC 14), 7=117

(LC 21), 8=206 (LC 21), 9=235 (LC

21), 10=120 (LC 21)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/10, 2-3=-159/51, 3-4=-94/34,

4-5=-35/20, 5-6=-13/5, 5-7=-103/103

BOT CHORD 2-9=-100/34, 8-9=0/0, 7-8=0/0 WEBS 4-8=-170/166, 3-9=-180/186

NOTES

- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) -0-4-8 to 2-7-8, Exterior(2N) 2-7-8 to 6-0-0 zone; cantilever left and right exposed; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 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 16 lb uplift at joint 6, 26 lb uplift at joint 7, 28 lb uplift at joint 8 and 48 lb uplift at joint 9.
- 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.

LOAD CASE(S) Standard

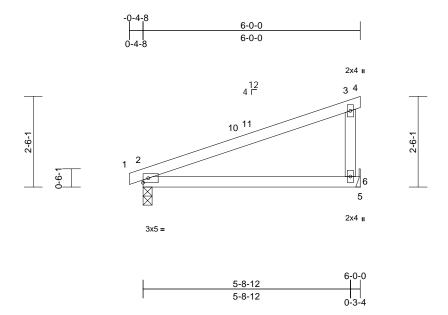


October 25,2024

Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	D02	Monopitch	9	1	Job Reference (optional)	l69125640

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:53 ID:krHzYocKvxshGLGFSgtm6Xzw845-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f

Page: 1



Scale = 1:31.8

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.75	Vert(LL)	0.12	6-9	>590	240	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.50	Vert(CT)	-0.14	6-9	>486	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.02	2	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 22 lb	FT = 20%

LUMBER

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

BRACING

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

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

bracing.

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

Max Horiz 2=79 (LC 10)

Max Uplift 2=-85 (LC 10), 6=-103 (LC 10)

Max Grav 2=346 (LC 21), 6=341 (LC 21) (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/11, 2-3=-92/90, 3-4=-8/0, 3-6=-250/190

BOT CHORD 2-6=-203/152, 5-6=0/0

NOTES

FORCES

- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) -0-4-8 to 2-7-8, Interior (1) 2-7-8 to 3-0-0, Exterior(2E) 3-0-0 to 6-0-0 zone; cantilever left and right exposed; end vertical left exposed; porch left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members. Refer to girder(s) for truss to truss connections.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 103 lb uplift at joint
- One H2.5A Simpson Strong-Tie connectors recommended to connect truss to bearing walls due to UPLIFT at jt(s) 2. This connection is for uplift only and does not consider lateral forces.
- 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.

LOAD CASE(S) Standard



October 25,2024

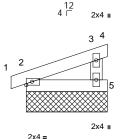


Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	D03	Monopitch Supported Gable	1	1	Job Reference (optional)	l69125641

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Scale = 1:28.4

Loading	(psf)	Spacing	1-11-4	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.04	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.03	Vert(CT)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00	4	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 8 lb	FT = 20%

LUMBER

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

BRACING

TOP CHORD Structural wood sheathing directly applied or 2-0-0 oc purlins, except end verticals.

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

bracing.

2=2-0-0, 4=2-0-0, 5=2-0-0, 6=2-0-0 REACTIONS (size) Max Horiz 2=30 (LC 10), 6=30 (LC 10) Max Uplift 2=-15 (LC 10), 4=-43 (LC 21),

5=-39 (LC 14), 6=-15 (LC 10)

2=108 (LC 21), 4=13 (LC 14), Max Grav 5=153 (LC 21), 6=108 (LC 21)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=0/9, 2-3=-37/22, 3-4=-20/14,

3-5=-132/145

BOT CHORD 2-5=-46/20

NOTES

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) zone; cantilever left and right exposed; end vertical left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.

- This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 20.0 psf on overhangs non-concurrent with other live loads.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom 8) 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 3-06-00 tall by 2-00-00 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 15 lb uplift at joint 2, 43 lb uplift at joint 4, 39 lb uplift at joint 5 and 15 lb uplift at joint 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.

LOAD CASE(S) Standard



Page: 1

October 25,2024

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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/TPII Quality Criteria and DSB-22 available from Truss Plate Institute (www.tpinst.org) and BCSB Building Component Safety Information, available from the Structural Building Component Safety Information and Safety Information, available from the Structural Building Component Safety Information and Safety In and BCSI Building Component Safety Information available from the Structural Building Component Association (www.sbcacomponents.com)



Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	V01	Valley	1	1	Job Reference (optional)	69125642

Run: 8,73 S Sep 25 2024 Print: 8,730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:53 ID:dYMwf63F2skAzTKPF4kIDWzyTIX-RfC?PsB70Hq3NSgPqnL8w3uITXbGKWrCDoi7J4zJC?f

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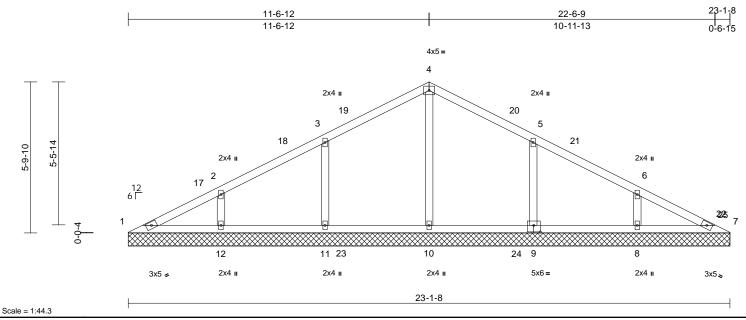


Plate Offsets (X, Y): [9:0-3-0,0-3-0]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.31	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.17	Vert(TL)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.15	Horiz(TL)	0.00	7	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 92 lb	FT = 20%

LUMBER

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

BRACING

TOP CHORD Structural wood sheathing directly applied or

6-0-0 oc purlins.

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

bracing.

REACTIONS (size) 1=23-1-8, 7=23-1-8, 8=23-1-8, 9=23-1-8, 10=23-1-8, 11=23-1-8,

12=23-1-8

Max Horiz 1=94 (LC 14)

Max Uplift 1=-9 (LC 15), 8=-78 (LC 15), 9=-100 (LC 15), 11=-99 (LC 14),

12=-81 (LC 14)

Max Grav 1=106 (LC 20), 7=75 (LC 21),

8=340 (LC 3), 9=472 (LC 6),

10=422 (LC 5), 11=470 (LC 5),

12=344 (LC 3)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=-156/100, 2-3=-43/116, 3-4=-79/128, 4-5=-81/118, 5-6=-32/97, 6-7=-127/92

BOT CHORD 1-12=-47/143, 11-12=-47/74, 10-11=-47/74,

8-10=-49/75, 7-8=-49/113

WFBS 4-10=-248/7. 3-11=-390/149. 2-12=-244/117.

5-9=-391/150, 6-8=-242/116

NOTES

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; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) 0-0-8 to 3-0-8, Interior (1) 3-0-8 to 8-7-4, Exterior(2R) 8-7-4 to 14-7-4, Interior (1) 14-7-4 to 19-7-1, Exterior(2E) 19-7-1 to 22-7-1 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- 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 3-06-00 tall by 2-00-00 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 9 lb uplift at joint 1, 99 lb uplift at joint 11, 81 lb uplift at joint 12, 100 lb uplift at joint 9 and 78 lb uplift at joint 8.
- 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.

LOAD CASE(S) Standard



October 25,2024

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

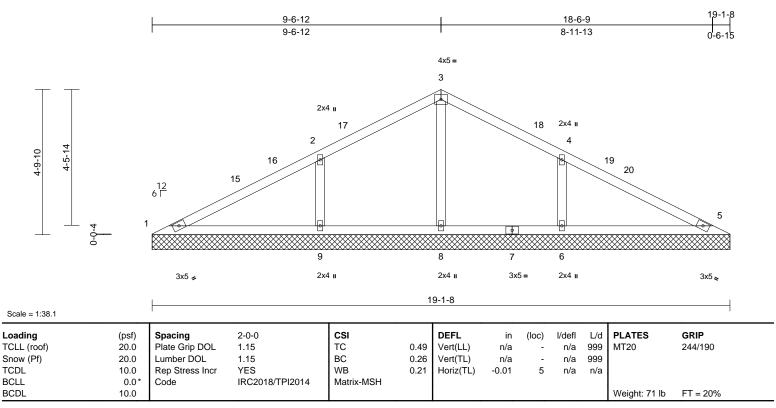
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall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



Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	V02	Valley	1	1	Job Reference (optional)	169125643

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Page: 1



LUMBER

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

BRACING

TOP CHORD Structural wood sheathing directly applied or

10-0-0 oc purlins.

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

bracing.

REACTIONS (size) 1=19-1-8, 5=19-1-8, 6=19-1-8, 8=19-1-8, 9=19-1-8, 14=19-1-8

Max Horiz 1=77 (LC 14)

1=-45 (LC 36), 6=-125 (LC 15), Max Uplift

9=-130 (LC 14)

1=110 (LC 35), 5=1 (LC 1), 6=579 Max Grav (LC 21), 8=566 (LC 21), 9=588 (LC

20), 14=1 (LC 1)

FORCES (lb) - Maximum Compression/Maximum

TOP CHORD

Tension 1-2=-146/425, 2-3=0/393, 3-4=0/413,

4-5=-132/441

1-9=-328/126, 8-9=-328/98, 6-8=-328/98,

5-6=-328/98

3-8=-516/65, 2-9=-448/171, 4-6=-445/172

WEBS NOTES

BOT CHORD

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) 0-0-8 to 3-0-8, Interior (1) 3-0-8 to 6-7-4, Exterior(2R) 6-7-4 to 12-7-4, Interior (1) 12-7-4 to 15-7-1, Exterior(2E) 15-7-1 to 18-7-1 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

- 3) 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this 5) design.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 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 45 lb uplift at joint 1, 130 lb uplift at joint 9 and 125 lb uplift at joint 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.

LOAD CASE(S) Standard



October 25,2024

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

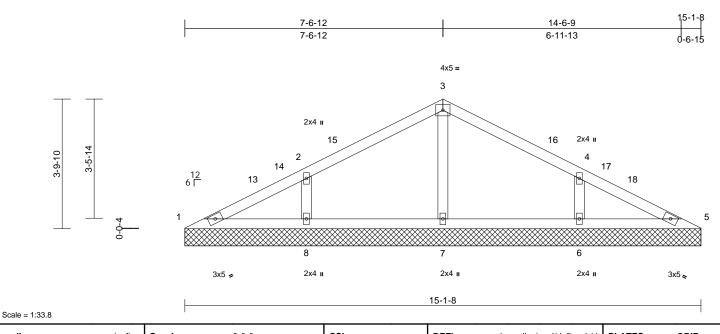
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall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



Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	V03	Valley	1	1	Job Reference (optional)	169125644

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:53 ID:9MoYRm3dHYcJLJmDhND3glzyTIY-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f

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Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defI	L/d	PLATES	GRIP	
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.31	Vert(LL)	n/a	-	n/a	999	MT20	244/190	
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.11	Vert(TL)	n/a	-	n/a	999			
TCDL	10.0	Rep Stress Incr	YES	WB	0.08	Horiz(TL)	0.00	5	n/a	n/a			
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH									
BCDL	10.0										Weight: 54 lb	FT = 20%	

LUMBER

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

BRACING

TOP CHORD Structural wood sheathing directly applied or

6-0-0 oc purlins.

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

bracing.

REACTIONS (size) 1=15-1-8, 5=15-1-8, 6=15-1-8, 7=15-1-8, 8=15-1-8

Max Horiz 1=-58 (LC 15)

1=-7 (LC 15), 5=-6 (LC 15), 6=-97 Max Uplift

(LC 15), 8=-98 (LC 14)

1=93 (LC 35), 5=93 (LC 36), 6=482 Max Grav (LC 21), 7=337 (LC 20), 8=482 (LC

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=-125/109, 2-3=-66/113, 3-4=-66/105,

4-5=-125/109

1-8=-56/105, 7-8=-56/53, 6-7=-56/53,

5-6=-56/105 WEBS

3-7=-261/76, 2-8=-390/170, 4-6=-390/170

NOTES

BOT CHORD

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) 0-0-8 to 3-0-8, Interior (1) 3-0-8 to 4-7-4, Exterior(2R) 4-7-4 to 10-7-4, Interior (1) 10-7-4 to 12-2-0, Exterior(2E) 12-2-0 to 15-2-0 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10
- Unbalanced snow loads have been considered for this 5) design.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 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 7 lb uplift at joint 1, 6 lb uplift at joint 5, 98 lb uplift at joint 8 and 97 lb uplift at joint 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.

LOAD CASE(S) Standard



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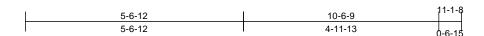
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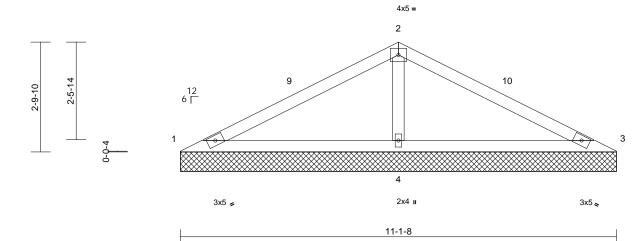


Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	V04	Valley	1	1	Job Reference (optional)	169125645

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Page: 1





Scale = 1:29.4

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.54	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.51	Vert(TL)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.15	Horiz(TL)	0.01	4	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 36 lb	FT = 20%

LUMBER

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

BRACING

Structural wood sheathing directly applied or TOP CHORD

10-0-0 oc purlins.

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

bracing.

REACTIONS (size) 1=11-1-8, 3=11-1-8, 4=11-1-8

Max Horiz 1=42 (LC 14)

Max Uplift 1=-50 (LC 21), 3=-50 (LC 20),

4=-72 (LC 14)

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

4=856 (LC 21)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=-164/491, 2-3=-164/491 1-4=-374/216, 3-4=-374/216 BOT CHORD

2-4=-667/341

WFBS NOTES

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) 0-0-8 to 3-0-8, Exterior(2R) 3-0-8 to 8-2-0, Exterior(2E) 8-2-0 to 11-2-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.

- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

 * This truss has been designed for a live load of 20.0psf
- on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 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 50 lb uplift at joint 1, 50 lb uplift at joint 3 and 72 lb uplift at joint 4.
- 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.

LOAD CASE(S) Standard



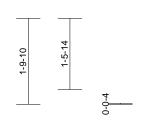
October 25,2024

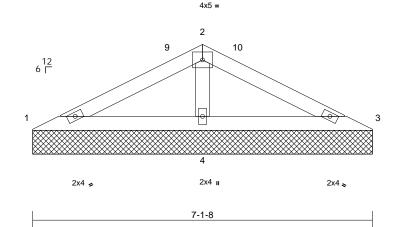
Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	V05	Valley	1	1	Job Reference (optional)	I69125646

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:54 ID:DnG3jXeMlcnMjr?e3AbZAezyTkn-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?f

Page: 1







Scale = 1:24.2

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl		PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.20	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.22	Vert(TL)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.06	Horiz(TL)	0.00	4	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 22 lb	FT = 20%

LUMBER

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

BRACING

Structural wood sheathing directly applied or TOP CHORD

7-1-8 oc purlins.

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

bracing.

REACTIONS (size) 1=7-1-8, 3=7-1-8, 4=7-1-8

Max Horiz 1=26 (LC 14)

Max Uplift 1=-10 (LC 14), 3=-16 (LC 15),

4=-36 (LC 14)

Max Grav 1=110 (LC 20), 3=110 (LC 21),

4=462 (LC 20)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=-124/225, 2-3=-124/225

1-4=-195/133, 3-4=-195/133 BOT CHORD

WFBS 2-4=-336/182

NOTES

- Unbalanced roof live loads have been considered for 1) this design.
- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior(2E) 0-0-8 to 3-0-8, Exterior(2R) 3-0-8 to 4-2-0, Exterior(2E) 4-2-0 to 7-2-0 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.

- TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

 * This truss has been designed for a live load of 20.0psf
- on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 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 10 lb uplift at joint 1, 16 lb uplift at joint 3 and 36 lb uplift at joint 4.
- 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.

LOAD CASE(S) Standard



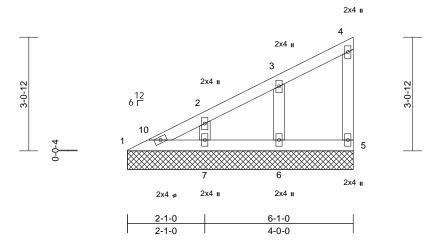
October 25,2024



Job	Truss	Truss Type	Qty	Ply	26 Cross Creek - Hayden K - Roof	
25090188	VL6	Valley	1	1	Job Reference (optional)	169125647

Run: 8.73 S Sep 25 2024 Print: 8.730 S Sep 25 2024 MiTek Industries, Inc. Wed Oct 23 15:54:54 $ID: LhLH_y89wqDstMwtGhh4zBzyU9G-RfC?PsB70Hq3NSgPqnL8w3ulTXbGKWrCDoi7J4zJC?ff$

2-1-0	6-1-0
2-1-0	400



Scale = 1:31

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.08	Vert(LL)	n/a	-	n/a	999	MT20	244/190
Snow (Pf)	20.0	Lumber DOL	1.15	BC	0.04	Vert(TL)	n/a	-	n/a	999		
TCDL	10.0	Rep Stress Incr	YES	WB	0.06	Horiz(TL)	0.00	5	n/a	n/a		
BCLL	0.0*	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 25 lb	FT = 20%

LUMBER

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

BRACING

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.

BOT CHORD REACTIONS (size)

1=6-1-0, 5=6-1-0, 6=6-1-0, 7=6-1-0

Max Horiz 1=104 (LC 14)

Max Uplift 5=-16 (LC 14), 6=-48 (LC 14),

7=-38 (LC 14)

1=81 (LC 20), 5=85 (LC 20), 6=243 Max Grav (LC 20), 7=256 (LC 20)

FORCES (lb) - Maximum Compression/Maximum

Tension

TOP CHORD 1-2=-226/75, 2-3=-148/53, 3-4=-48/23,

4-5=-69/70

BOT CHORD 1-7=-103/80, 6-7=0/0, 5-6=0/0 WFBS 3-6=-206/214, 2-7=-184/166

NOTES

- Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Corner(3E) zone; cantilever left and right exposed ;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip
- 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); Pf=20.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00: Ct=1.10

- 4) Unbalanced snow loads have been considered for this design.
- Gable requires continuous bottom chord bearing.
- 6) Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 16 lb uplift at joint 5, 48 lb uplift at joint 6 and 38 lb uplift at joint 7.
- 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.

LOAD CASE(S) Standard



Page: 1

October 25,2024

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

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



Symbols

PLATE LOCATION AND ORIENTATION



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



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

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

* Plate location details available in MiTek software or upon request

PLATE SIZE

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

LATERAL BRACING LOCATION



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

BEARING



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

Industry Standards:

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

DSB-22: ANSI/TPI1:

Numbering System



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

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

Product Code Approvals

ICC-ES Reports:

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

Design General Notes

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

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

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MiTek



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

General Safety Notes

Damage or Personal Injury Failure to Follow Could Cause Property

- Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI
- Ņ Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
- Never exceed the design loading shown and never stack materials on inadequately braced trusses.
- Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
- Cut members to bear tightly against each other

'n

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