



RELEASE FOR
CONSTRUCTION
AS NOTED ON PLANS REVIEW
DEVELOPMENT SERVICES
LEE'S SUMMIT, MISSOURI

11/11/2020

MiTek USA, Inc.
16023 Swingley Ridge Rd
Chesterfield, MO 63017
314-434-1200

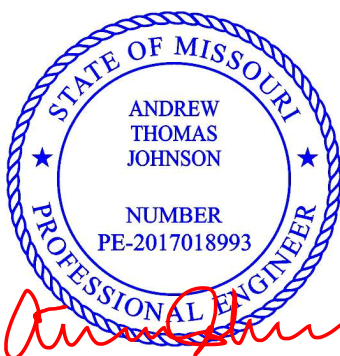
Re: 201754
Walker Custom Hms

The truss drawing(s) referenced below have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Heartland Truss, Inc..

Pages or sheets covered by this seal: I42988885 thru I42988892

My license renewal date for the state of Missouri is December 31, 2021.

Missouri COA: Engineering 001193



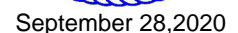
September 28, 2020

Johnson, Andrew ,Engineer

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

11/11/2020

Scale = 1:85.8



Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2760 Crain Highway, Suite 203 Waldorf, MD 20601



Job	Truss	Truss Type	RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI		Ply	Walker Custom Hms
201754	AG	GABLE			1	I42988886
Heartland Truss, Inc,		Plattsburg, MO - 64477,	Job Reference (optional)			
-0-10-12		18-11-15	8.330 s Jul 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:36 2020 Page 1			
0-10-12		18-11-15	ID:qtLxzIWUQcDgpd39wasymGzsryy-tqH39JWqYnZnrtx0fH7l6vKaEmTePBaAJB2OXPyZ5lD			
			11/11/2020		50-0-0	50-10-12
					18-11-15	0-10-12

Scale = 1:88.4

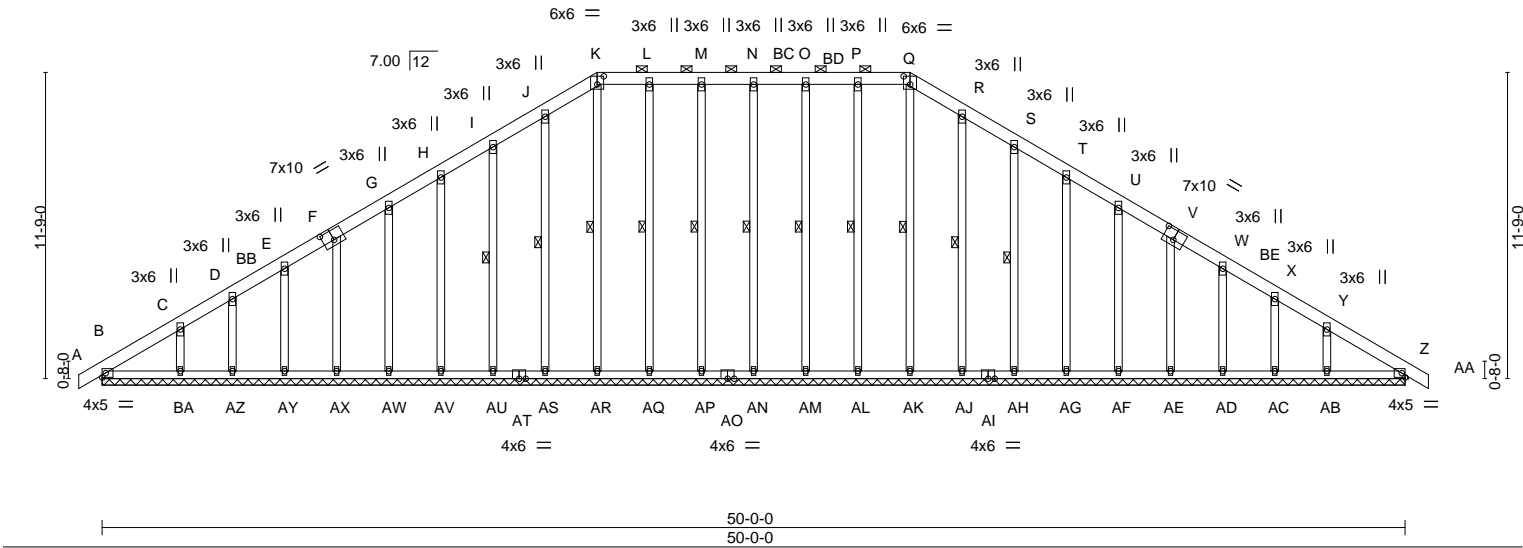


Plate Offsets (X, Y)--		[F:0-5-0,0-4-8], [K:0-3-0,0-3-12], [Q:0-3-0,0-3-12], [V:0-5-0,0-4-8]	
LOADING (psf)	SPACING-	CSI.	DEFL.
TCLL 25.0	2-0-0	TC 0.05	in (loc) l/defl L/d
(Roof Snow=25.0)	Plate Grip DOL 1.15	BC 0.06	Vert(LL) -0.00 Z n/r 120
TCDL 10.0	Lumber DOL 1.15	WB 0.28	Vert(CT) 0.00 Z n/r 90
BCLL 0.0	Rep Stress Incr YES	Matrix-S	Horz(CT) 0.01 Z n/a n/a
BCDL 10.0	Code IRC2018/TPI2014		
		PLATES	GRIP
		MT20	244/190
		Weight: 463 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x6 SP No.1	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except
BOT CHORD 2x4 SP No.2	2-0-0 oc purlins (6-0-0 max.): K-Q.
OTHERS 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
	WEBS 1 Row at midpt N-AN, M-AP, L-AQ, K-AR, J-AS, I-AU, O-AM, P-AL, Q-AK, R-AJ, S-AH

REACTIONS. All bearings 50-0-0.
(lb) - Max Horz B=-290(LC 10)
Max Uplift All uplift 100 lb or less at joint(s) B, AN, AP, AQ, AR, AS, AU, AV, AW, AX, AY, AZ, AM, AL, AJ, AH, AG, AF, AE, AD, AC, AB except BA=-101(LC 12)
Max Grav All reactions 250 lb or less at joint(s) B, Z, AR, AZ, AK, AC except AN=286(LC 32), AP=291(LC 32), AQ=288(LC 32), AS=289(LC 33), AU=291(LC 33), AV=284(LC 33), AW=302(LC 33), AX=286(LC 33), AY=257(LC 33), BA=276(LC 22), AM=291(LC 32), AL=288(LC 32), AJ=289(LC 33), AH=291(LC 33), AG=284(LC 33), AF=302(LC 33), AE=286(LC 33), AD=257(LC 33), AB=266(LC 23)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD B-C=-275/266, H-I=-166/276, I-J=-173/309, J-K=-196/328, K-L=-176/304, L-M=-176/304, M-N=-176/304, N-O=-176/304, O-P=-176/304, P-Q=-176/304, Q-R=-196/325, R-S=-173/285
WEBS M-AP=-251/59, I-AU=-251/87, G-AW=-262/84, O-AM=-251/57, S-AH=-251/89, U-AF=-262/84

NOTES-
1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -0-10-12 to 4-1-4, Exterior(2N) 4-1-4 to 13-11-15, Corner(3R) 13-11-15 to 23-11-15, Exterior(2N) 23-11-15 to 26-0-1, Corner(3R) 26-0-1 to 36-0-1, Exterior(2N) 36-0-1 to 45-10-12, Corner(3E) 45-10-12 to 50-10-12 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.33 plate grip DOL=1.33
2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
3) TCDL: ASCE 7-16; Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
4) Unbalanced snow loads have been considered for this design.
5) This truss has been designed for greater of min roof live load of 16.0 psf or 2.00 times flat roof load of 25.0 psf on overhangs non-concurrent with other live loads.
6) Provide adequate drainage to prevent water ponding.
7) All plates are 2x4 MT20 unless otherwise indicated.
8) Gable requires continuous bottom chord bearing.
9) Gable studs spaced at 2-0-0 oc.
10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) B, AN, AP, AQ, AR, AS, AU, AV, AW, AX, AY, AZ, AM, AL, AJ, AH, AG, AF, AE, AD, AC, AB except (jt=lb) BA=101.



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Job	Truss	Truss Type	RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI 11/11/2020		
201754	AG	GABLE	Ply	1	Walker Custom Hms I42988886
Heartland Truss, Inc, Plattsburg, MO - 64477,			Job Reference (optional) ID:qtLxzIWUQcDgpd39wasymGzsryy-L0rRMfWTI5heT1WCD_eXf6tl_Apt8epJXrx3syZ5IC 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:37 2020 Page 2		
NOTES- 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) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.					

 **WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.**

Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job	Truss	Truss Type	RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI		Ply	Walker Custom Hms
201754	B	MONOPITCH	ID:qtLxziWUQcDgpd39wasymGzsryy-pDPpa?X53PpV5B5Pmi9mBKQlra1St9USmVXVclyZ5IB		1	I42988887
Heartland Truss, Inc., Plattsburg, MO - 64477,			Job Reference (optional) 8.330 s Jul 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:38 2020 Page 1 10-4-4 3-6-10			
-0-10-12 0-10-12			6-9-10 6-9-10 11/11/2020			

Scale = 1:21.7

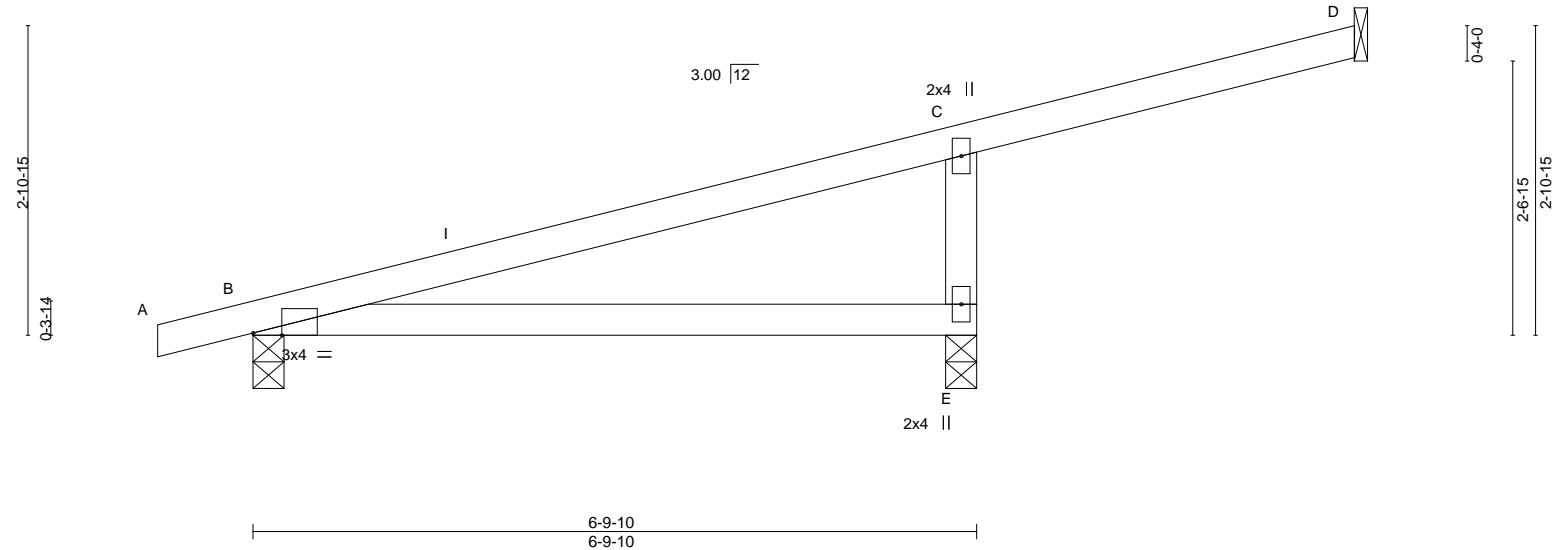


Plate Offsets (X,Y)-- [B:0-3-4,Edge]		6-9-10 6-9-10							
LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in (loc)	l/defl	L/d
TCLL 25.0		Plate Grip DOL	1.15	TC 0.75		Vert(LL)	-0.11 E-H	>712	240
(Roof Snow=25.0)		Lumber DOL	1.15	BC 0.55		Vert(CT)	-0.20 E-H	>390	180
TCDL 10.0		Rep Stress Incr	YES	WB 0.00		Horz(CT)	0.00 B	n/a	n/a
BCLL 0.0		Code IRC2018/TPI2014		Matrix-MP					
BCDL 10.0									
						PLATES		GRIP	
						MT20		244/190	
						Weight: 30 lb		FT = 20%	

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

REACTIONS. (size) D=Mechanical, E=0-3-8, B=0-3-8
 Max Horz B=96(LC 9)
 Max Uplift D=-32(LC 8), E=-139(LC 12), B=-63(LC 8)
 Max Grav D=88(LC 19), E=704(LC 19), B=362(LC 19)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
 TOP CHORD C-E=-614/340

- NOTES-**
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) -0-10-12 to 2-1-4, Interior(1) 2-1-4 to 10-3-8 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.33 plate grip DOL=1.33
 - 2) TCLL: ASCE 7-16; Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - 3) Unbalanced snow loads have been considered for this design.
 - 4) This truss has been designed for greater of min roof live load of 20.0 psf or 2.00 times flat roof load of 25.0 psf on overhangs non-concurrent with other live loads.
 - 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 6) Refer to girder(s) for truss to truss connections.
 - 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) D, B except (jt=lb) E=139.
 - 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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Job	Truss	Truss Type	CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI		Ply	Walker Custom Hms	I42988888
201754	BG	GABLE			1	Job Reference (optional)	
Heartland Truss, Inc., Plattsburg, MO - 64477,			8.330 s Jul 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:39 2020 Page 1		ID: qTLxziWUQcDgd39wasymGzsryy-HPZBnLYjqixMjLgbKPh?kXywbzNhccck?9G28kyZ5IA		
-0-10-12 0-10-12			6-9-10 6-9-10		10-4-4 3-6-10		

Scale = 1:21.7

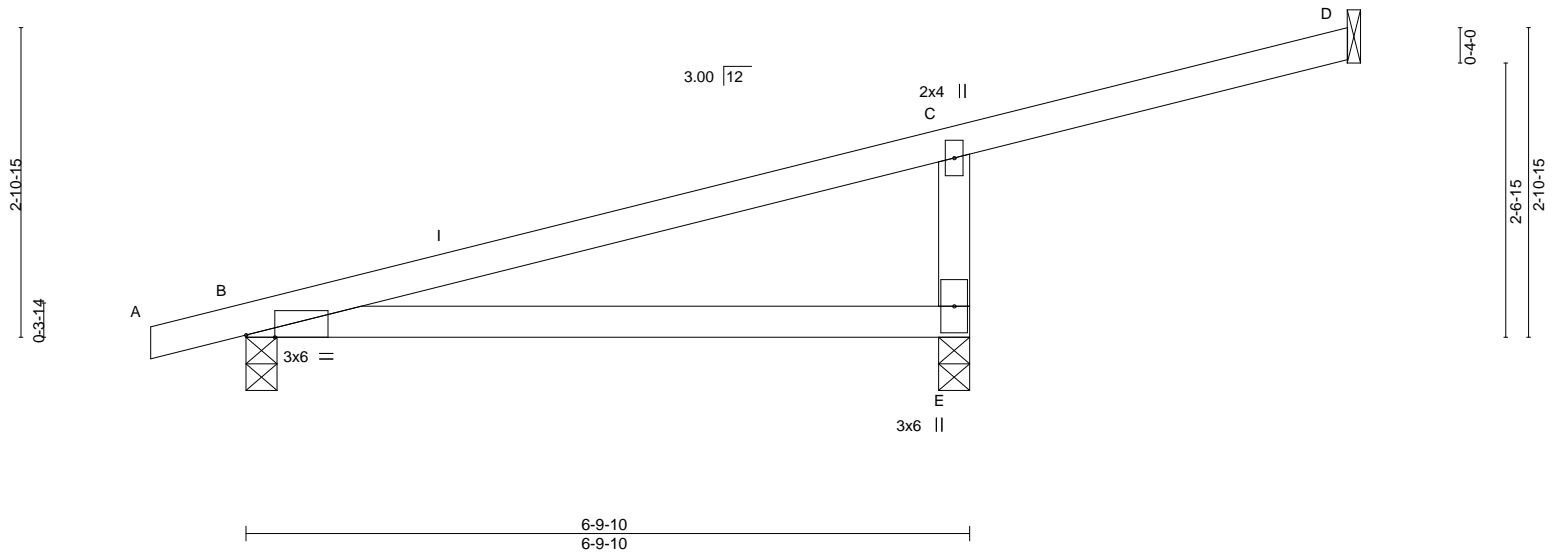


Plate Offsets (X,Y)-- [B:0-3-4,Edge]												
LOADING (psf)		SPACING- 2-0-0		CSI.		DEFL. in (loc) I/defl L/d			PLATES	GRIP		
TCLL	25.0	Plate Grip DOL	1.15	TC	0.75	Vert(LL)	-0.11	E-H	>712	240	MT20	244/190
(Roof Snow=25.0)		Lumber DOL	1.15	BC	0.55	Vert(CT)	-0.20	E-H	>390	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00	B	n/a	n/a		
BCLL	0.0	Code IRC2018/TPI2014		Matrix-MP							Weight: 30 lb	FT = 20%
BCDL	10.0											

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

REACTIONS. (size) D=Mechanical, E=0-3-8, B=0-3-8
 Max Horz B=96(LC 9)
 Max Uplift D=-32(LC 8), E=-139(LC 12), B=-63(LC 8)
 Max Grav D=88(LC 19), E=704(LC 19), B=362(LC 19)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD C-E=-614/484

NOTES-

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Corner(3E) -0-10-12 to 2-1-4, Exterior(2N) 2-1-4 to 10-3-8 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.33 plate grip DOL=1.33
- 2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
- 3) TCLL: ASCE 7-16; Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) This truss has been designed for greater of min roof live load of 20.0 psf or 2.00 times flat roof load of 25.0 psf on overhangs non-concurrent with other live loads.
- 6) Gable studs spaced at 2-0-0 oc.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 8) Refer to girder(s) for truss to truss connections.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) D, B except (jt=B) E=139.
- 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.



September 28, 2020



WARNING: Varying design parameters and READ NOTES ON THIS AND INCLUDED W/ITER REFERENCE PAGE MP147316V, 3/15/2020 (2) OF ONE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for a mild steel building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



16023 Swingley Ridge Rd
Chesterfield, MO 63017

Job: 201754

Truss: C

Truss Type: COMMON

Heartland Truss, Inc., Plattsburg, MO - 64477,

RELEASE FOR CONSTRUCTION
AS NOTED ON PLANS REVIEW
DEVELOPMENT SERVICES
LEE'S SUMMIT, MISSOURI

Walker Custom Hms

Job Reference (optional)

8.330 s Jul 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:40 2020 Page 1

ID:qtLxzlWUQcDgpd39wasymGzsrlyy-lbXZ?gZLb03DKVFnu7CEHIV5PNizL?VIEp0bgByZ5i9

0-10-12 5-8-2

0-10-12 5-8-2

11-0-0 5-3-14

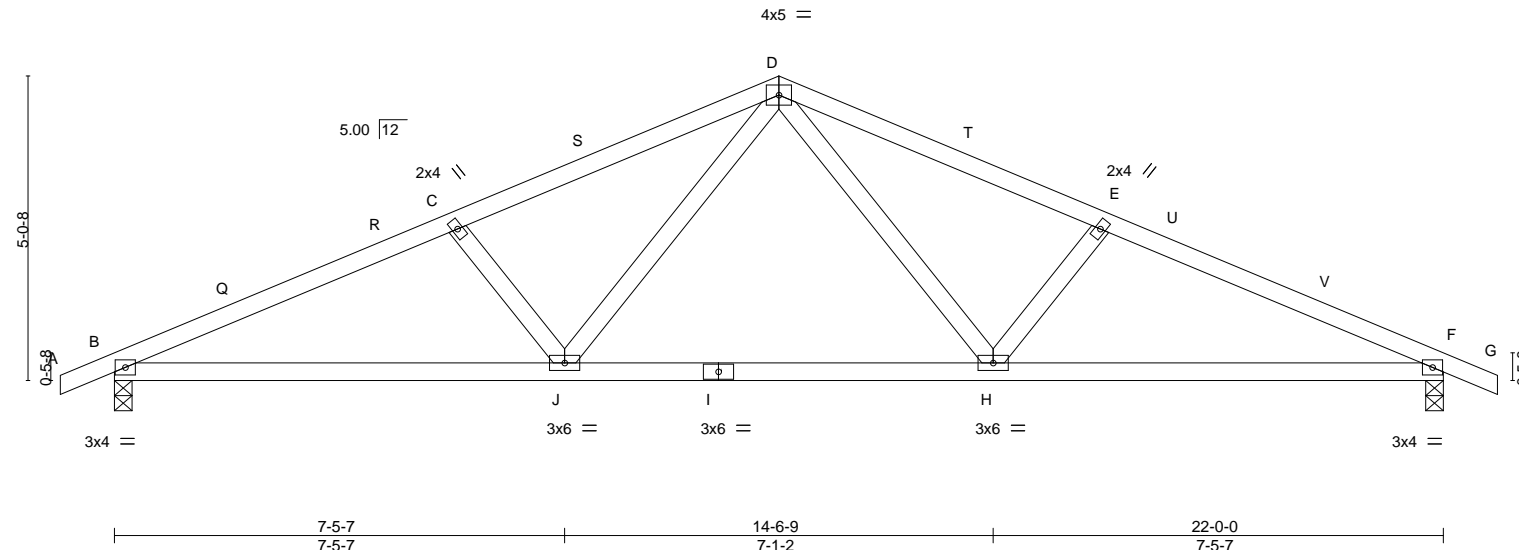
11/11/2020

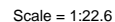
16-3-14 5-3-14

22-0-0 5-8-2

22-10-12 0-10-12

Scale = 1:38.1





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

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS C-F=-340/110

- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCdL=6.0psf; BCdL=6.0psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-3-8 to 3-3-8, Exterior(2R) 3-3-8 to 8-8-10, Exterior(2E) 8-8-10 to 11-8-10 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.33 plate grip DOL=1.33
- 2) TCdL: ASCE 7-16; Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- 3) Unbalanced snow loads have been considered for this design.
- 4) This truss has been designed for greater of min roof live load of 16.0 psf or 2.00 times flat roof load of 25.0 psf on overhangs non-concurrent with other live loads.
- 5) Gable requires continuous bottom chord bearing.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) B, D, F.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 9) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



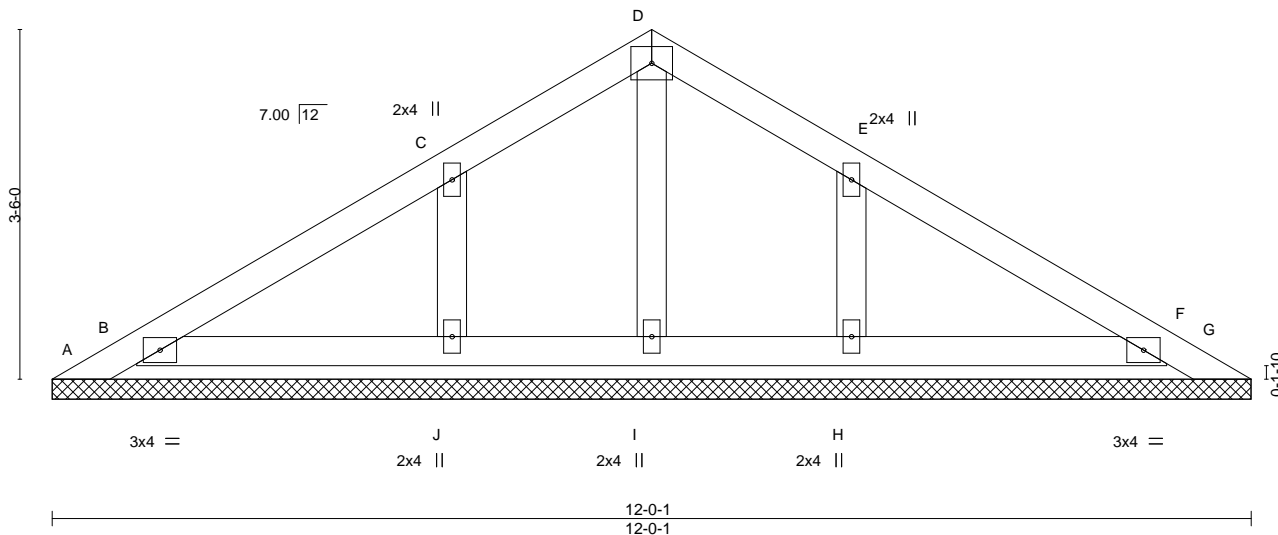
September 28, 2020

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Job 201754	Truss ZG	Truss Type GABLE	<div style="text-align: center;"> RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI 11/11/2020 </div>	Ply 1	Walker Custom Hms I42988892
Heartland Truss, Inc., Plattsburg, MO - 64477,			ID: qtLxziWUQcDgpd39wasymGzsrly-eMm4q2csfFaep6YY7zGARbgvs_BQHswL8R_ppyyZ5l5 8.330 s Jul 22 2020 MiTek Industries, Inc. Mon Sep 28 13:05:44 2020 Page 1 Job Reference (optional)		
6-0-1 6-0-1			12-0-1 6-0-1		
4x5 =			Scale = 1:23.1		



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 25.0 (Roof Snow=25.0)	2-0-0	TC 0.20	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL 1.15	BC 0.07	Vert(CT)	n/a	-	n/a		
BCLL 0.0	Rep Stress Incr YES	WB 0.07	Horz(CT)	0.00	F	n/a		
BCDL 10.0	Code IRC2018/TPI2014	Matrix-S					Weight: 45 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 10-0-0 oc bracing.

REACTIONS.

All bearings 12-0-1.
 (lb) - Max Horz A=83(LC 11)
 Max Uplift All uplift 100 lb or less at joint(s) B, F, J, H except A=132(LC 19), G=132(LC 20)
 Max Grav All reactions 250 lb or less at joint(s) A, G, I except B=399(LC 19), F=399(LC 20), J=394(LC 19), H=394(LC 20)

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

WEBS C-J=-327/134, E-H=-327/134

NOTES-

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp C; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-3-8 to 3-3-8, Exterior(2R) 3-3-8 to 8-8-10, Exterior(2E) 8-8-10 to 11-8-10 zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.33 plate grip DOL=1.33
- 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; Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat C; 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 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) B, F, J, H except (jt=lb) A=132, G=132.
- 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.
- See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



September 28, 2020

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.

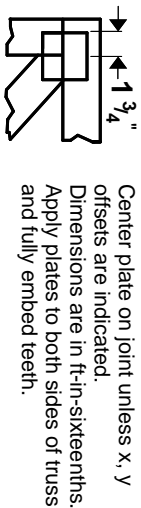
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see **ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information** available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



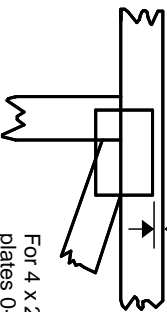
16023 Swingley Ridge Rd
 Chesterfield, MO 63017

Symbols

PLATE LOCATION AND ORIENTATION



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



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

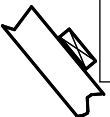
This symbol indicates the required direction of slots in connector plates.

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

PLATE SIZE

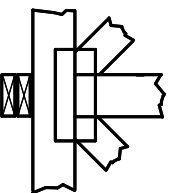
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION



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

BEARING



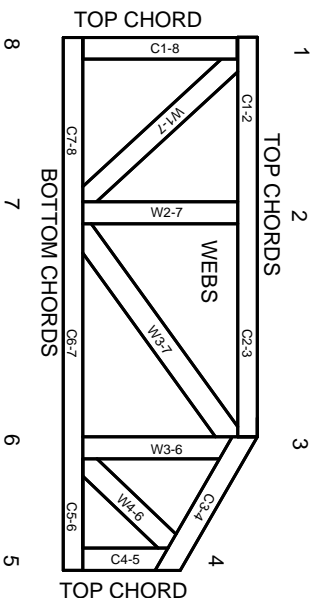
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

Industry Standards:

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

Numbering System

6-4-8 dimensions shown in ft-in-sixteenths (Drawings not to scale)



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

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

PRODUCT CODE APPROVALS

ICC-ES Reports:

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

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

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

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MiTek Engineering Reference Sheet: MII-7473 rev. 5/19/2020



General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

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