

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

RE: 3163304 - GIEBEIG - LOT 8 CW

MiTek USA, Inc.

6904 Parke East Blvd. Tampa, FL 33610-4115

Site Information:

Customer Info: GIEBEIG CONST. Project Name: Spec Hse Model: 1595

Lot/Block: 8 Subdivision: Crosswinds

Address: TBD, TBD

City: Columbia Cty State: FL

Name Address and License # of Structural Engineer of Record, If there is one, for the building.

Name:

License #:

City:

Address:

State:

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

Design Code: FBC2020/TPI2014

Design Program: MiTek 20/20 8.5

Wind Speed: 130 mph Floor Load: N/A psf

Wind Code: ASCE 7-16 Roof Load: 37.0 psf

This package includes 25 individual, Truss Design Drawings and 0 Additional Drawings. With my seal affixed to this sheet, I hereby certify that I am the Truss Design Engineer and this index sheet

conforms to 61G15-31.003, section 5 of the Florida Board of Professional Engineers Rules.

No.	Seal#	Truss Name	Date	No.	Seal#	Truss Name	Date
1	T27693417	CJ01	5/12/22	23	T27693439	T14	5/12/22
2	T27693418		5/12/22	24	T27693440		5/12/22
3	T27693419	CJ05	5/12/22	25	T27693441	T16	5/12/22
1	T27603420	C 107	5/12/22				21, 121, 212

No.	Seal#	Truss Name	Date	
1234567891011234567890122	T27693417 T27693418 T27693420 T27693421 T27693422 T27693424 T27693425 T27693426 T27693428 T27693428 T27693428 T27693430 T27693431 T27693431 T27693433 T27693433 T27693433 T27693433 T27693433 T27693433 T27693433 T27693438	CJ01 CJ03 CJ05 CJ07 EJ01 EJ02 HJ10 HJ11 T01G T01G T03 T04 T05 T06 T07 T08 T09 T10 T11 T12 T13	5/12/22 5/12/22	



The truss drawing(s) referenced above have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Builders FirstSource-Lake City, FL.

Truss Design Engineer's Name: ORegan, Philip

My license renewal date for the state of Florida is February 28, 2023.

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.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

GIEBEIG - LOT 8 CW Job Truss Truss Type Qty T27693417 **CJ01** 3163304 8 Jack-Open Job Reference (optional) Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:43 2022 Page 1 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-Ecsgr9sEmddxHuFLMXSxB9YZ016JFluKrqy2m1zHY66 1-0-0 1-6-0 Scale = 1:8.2 6.00 12 4 1-0-0 LOADING (psf) SPACING-2-0-0 CSI DEFL (loc) I/defl L/d **PLATES** GRIP TCLL 20.0 Plate Grip DOL 1.25 TC 0.14 Vert(LL) 0.00 >999 240 MT20 244/190 TCDL 7.0 Lumber DOL 1.25 BC 0.03 Vert(CT) 0.00 >999 180 BCLL 0.0 Rep Stress Incr YES WB 0.00 Horz(CT) 0.00 2 n/a n/a

LUMBER-

BCDL

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

10.0

BRACING-

TOP CHORD **BOT CHORD** 

Structural wood sheathing directly applied or 1-0-0 oc purlins. Rigid ceiling directly applied or 10-0-0 oc bracing.

Weight: 6 lb

FT = 20%

REACTIONS.

(size) 3=Mechanical, 2=0-3-8, 4=Mechanical

Code FBC2020/TPI2014

Max Horz 2=39(LC 12)

Max Uplift 3=-6(LC 1), 2=-67(LC 12), 4=-19(LC 1)

Max Grav 3=7(LC 16), 2=179(LC 1), 4=18(LC 16)

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

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) zone; porch left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

Matrix-MP

- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2, 4.



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May 12,2022

MARNING - 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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



GIEBEIG - LOT 8 CW Job Truss Truss Type Qty T27693418 8 CJ03 3163304 Jack-Open Job Reference (optional) 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:44 2022 Page 1 Builders FirstSource (Lake City,FL), Lake City, FL - 32055,  $ID:MRUpuoKKMqHFlyIM1PC4d7zYSsJ-ioQ22VtsXxlov2qXwFzAjN5kmQRQ\_I8T4UibJUzHY65$ Scale = 1:13.3 6.00 12 0-4-8 9 3-0-0 LOADING (psf) SPACING-CSI. DEFL. I/defl L/d **PLATES** 2-0-0 in (loc) 20.0 Plate Grip DOL 1.25 TC 0.14 Vert(LL) 0.01 4-7 >999 240 MT20 244/190 TCLL TCDL Lumber DOL 1.25 BC 0.10 Vert(CT) -0.01 4-7 >999 180 7.0 BCLL Rep Stress Incr WB 0.00 Horz(CT) -0.00 0.0 YES n/a n/a Code FBC2020/TPI2014 Weight: 12 lb FT = 20% BCDL 10.0 Matrix-MP

LUMBER-

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

TOP CHORD BOT CHORD Structural wood sheathing directly applied or 3-0-0 oc purlins. Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS.

(size) 3=Mechanical, 2=0-3-8, 4=Mechanical

Max Horz 2=73(LC 12)

Max Uplift 3=-35(LC 12), 2=-58(LC 12), 4=-16(LC 9) Max Grav 3=60(LC 1), 2=210(LC 1), 4=50(LC 3)

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

### NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 1-6-0, Interior(1) 1-6-0 to 2-11-4 zone; porch left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2, 4.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information\*\* available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



GIEBEIG - LOT 8 CW Job Truss Truss Type Qty Ply T27693419 3163304 CJ05 Jack-Open Job Reference (optional) Builders FirstSource (Lake City,FL), Lake City, FL - 32055. 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:44 2022 Page 1 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-ioQ22VtsXxlov2qXwFzAjN5iXQPG\_l8T4UibJUzHY65 5-0-0 1-6-0 Scale = 1:18.2 6.00 12 0-4-8 LOADING (psf) SPACING-2-0-0 CSI. DEFL I/defl L/d PLATES GRIP Plate Grip DOL 1.25 TCLL 20.0 TC 0.28 Vert(LL) 0.03 4-7 >999 240 MT20 244/190 1.25 TCDL 7.0 Lumber DOL BC 0.24 Vert(CT) -0.05 4-7 >999 180 BCLL 00 Rep Stress Incr YES WR 0.00 Horz(CT) 0.00 3 n/a n/a

LUMBER-

BCDL

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

10.0

BRACING-

TOP CHORD BOT CHORD Structural wood sheathing directly applied or 5-0-0 oc purlins. Rigid ceiling directly applied or 10-0-0 oc bracing.

Weight: 18 lb

FT = 20%

REACTIONS.

(size) 3=Mechanical, 2=0-3-8, 4=Mechanical

Code FBC2020/TPI2014

Max Horz 2=107(LC 12)

Max Uplift 3=-67(LC 12), 2=-65(LC 12)

Max Grav 3=113(LC 1), 2=276(LC 1), 4=88(LC 3)

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

### NOTES

 Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 1-6-0, Interior(1) 1-6-0 to 4-11-4 zone; porch right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60

Matrix-MP

- Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific
  to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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GIEBEIG - LOT 8 CW Job Truss Truss Type Qty T27693420 3163304 CJ07 Jack-Open Job Reference (optional) 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:45 2022 Page 1 Lake City, FL - 32055, Builders FirstSource (Lake City,FL), ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-A?\_QGruVIEtfXCPkTyUPGadmQqc7jCOdJ8R8rwzHY64 7-0-0 7-0-0 Scale = 1:23.0 6.00 12 D-4-B 10 11 3 7-0-0 LOADING (psf) DEFL. in I/defl L/d **PLATES** GRIP SPACING-2-0-0 CSI. (loc) 0.72 Vert(LL) 0.32 3-6 >263 240 MT20 244/190 Plate Grip DOL 1.25 TC TCLL 20.0 0.27 180 1.25 BC 0.71 Vert(CT) 3-6 >312 TCDL 7.0 Lumber DOL WB 0.00 Horz(CT) -0.01 Rep Stress Incr 0.0 YES n/a BCLL Weight: 22 lb FT = 20% Code FBC2020/TPI2014 Matrix-MS BCDL 10.0 BRACING-LUMBER-

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

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

REACTIONS.

(size) 1=0-3-8, 2=Mechanical, 3=Mechanical

Max Horz 1=114(LC 12)

Max Uplift 1=-61(LC 9), 2=-88(LC 12), 3=-41(LC 9)

Max Grav 1=257(LC 1), 2=168(LC 1), 3=127(LC 3)

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

### NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) 0-0-0 to 3-0-0, Interior(1) 3-0-0 to 6-11-4 zone; porch left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 2, 3.



Philip J. O'Regan PE No.58126 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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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



Job Truss Truss Type Qty GIEBEIG - LOT 8 CW T27693421 **EJ01** Jack-Partial 26 3163304 Job Reference (optional) Lake City, FL - 32055, 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:46 2022 Page 1 Builders FirstSource (Lake City,FL), ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-eBXoTBv73Y?W8L\_w1g?epoAzbE?PSfdmYoBiNMzHY63 -1-6-0 7-0-0 7-0-0 Scale = 1:23.2 6.00 12 D-4-B 3x4 = Plate Offsets (X,Y)-[2:0-1-13,0-1-8] LOADING (psf) SPACING-2-0-0 CSI. DEFL **PLATES** GRIP I/defi L/d TCLL 20.0 Plate Grip DOL 1.25 TC 0.63 Vert(LL) 0.10 4-7 >794 240 MT20 244/190 TCDL 7.0 Lumber DOL 1.25 BC 0.51 Vert(CT) -0.22 4-7 >385 180 BCLL 0.0 Rep Stress Incr YES WB 0.00 Horz(CT) 0.01 BCDL 10.0 Code FBC2020/TPI2014 Matrix-MS Weight: 25 lb FT = 20% LUMBER-

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

BRACING-TOP CHORD **BOT CHORD** 

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

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

REACTIONS.

(size) 3=Mechanical, 2=0-3-8, 4=Mechanical

Max Horz 2=137(LC 12)

Max Uplift 3=-86(LC 12), 2=-76(LC 12)

Max Grav 3=164(LC 1), 2=346(LC 1), 4=126(LC 3)

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

### NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl. GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 1-6-0, Interior(1) 1-6-0 to 6-11-4 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3, 2.



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GIEBEIG - LOT 8 CW Job Truss Truss Type Qty Ply T27693422 3163304 EJ02 Jack-Partial Job Reference (optional) 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:47 2022 Page 1 Builders FirstSource (Lake City,FL), Lake City, FL - 32055, ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-6N5BgXvlqs7NmVY6bNWtL?j6WeKfB6twmSwFvozHY62 1-6-0 Scale = 1:23.2 6.00 12 D-4-8 6 3x4 = Plate Offsets (X,Y)-- [3:0-4-0,0-1-15] SPACING-CSI. DEFL I/defl L/d PLATES GRIP LOADING (psf) 2-0-0 (loc) Vert(LL) 0.16 3-5 >529 240 MT20 244/190 TCLL 20.0 Plate Grip DOL 1.25 TC 0.68 -0.26 >315 180 TCDL 7.0 Lumber DOL 1.25 BC 0.58 Vert(CT) 3-5 0.00 0.13 n/a 0.0 Rep Stress Incr YES WB Horz(CT) BCLL BCDL 10.0 Code FBC2020/TPI2014 Weight: 26 lb FT = 20%

BRACING-

TOP CHORD

**BOT CHORD** 

LUMBER-

TOP CHORD 2x4 SP No.2

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

3-6: 2x4 SP No.3

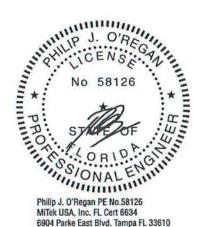
REACTIONS. (size) 4=Mechanical, 2=0-3-8, 5=Mechanical

Max Horz 2=137(LC 12)

Max Uplift 4=-72(LC 12), 2=-76(LC 12), 5=-12(LC 12) Max Grav 4=151(LC 1), 2=347(LC 1), 5=118(LC 3)

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

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 1-6-0, Interior(1) 1-6-0 to 6-11-4 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 2, 5.



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

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

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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Job Truss Truss Type Qty GIEBEIG - LOT 8 CW T27693423 HJ10 Diagonal Hip Girder 3163304 3 Job Reference (optional) Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:48 2022 Page 1 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-aafZutwNb9FEOf7l9526uDFln2gHwTG3?6goSFzHY61 9-10-1 4-6-0 Scale = 1:22.8 4.24 12 3x4 = 0-4-B 14 15 6 7 2x4 || 3x4 = 3x4 = 4-6-0 9-10-1 4-6-0 LOADING (psf) SPACING-2-0-0 CSI. DEFL l/defi L/d **PLATES** GRIP (loc) TCLL 20.0 Plate Grip DOL 1.25 TC 0.58 Vert(LL) 0.06 6-7 >999 240 MT20 244/190 TCDL 7.0 Lumber DOL 1.25 BC 0.62 Vert(CT) -0.126-7 >992 180 0.0 \* BCLL Rep Stress Incr NO WB 0.44 Horz(CT) 0.01 5 n/a n/a BCDL 10.0 Code FBC2020/TPI2014 Matrix-MS Weight: 43 lb FT = 20%

BRACING-

TOP CHORD

**BOT CHORD** 

LUMBER-

REACTIONS.

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

2x4 SP No.3

(size) 4=Mechanical, 2=0-4-9, 5=Mechanical

Max Horz 2=149(LC 22)

Max Uplift 4=-77(LC 4), 2=-298(LC 4), 5=-142(LC 4) Max Grav 4=149(LC 1), 2=527(LC 1), 5=299(LC 1)

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

TOP CHORD

2-3=-799/340

**BOT CHORD** 2-7=-395/729, 6-7=-395/729

3-7=-60/281, 3-6=-768/416

WEBS

### NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone; porch left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4 except (jt=lb) 2=298, 5=142.
- 7) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 59 lb down and 73 lb up at 1-6-1, 59 lb down and 73 lb up at 1-6-1, 22 lb down and 38 lb up at 4-4-0, 22 lb down and 38 lb up at 4-4-0, and 43 lb down and 78 lb up at 7-1-15, and 43 lb down and 78 lb up at 7-1-15 on top chord, and 41 lb down and 43 lb up at 1-6-1, 41 lb down and 43 lb up at 1-6-1, 19 lb down and 24 lb up at 4-4-0, 19 lb down and 24 lb up at 4-4-0, and 64 lb down at 7-1-15, and 64 lb down at 7-1-15 on bottom chord. The design/selection of such connection device(s) is the responsibility of others
- 8) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

### LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25 Uniform Loads (plf)

Vert: 1-4=-54, 5-8=-20

Concentrated Loads (lb)

Vert: 7=-6(F=-3, B=-3) 12=-73(F=-36, B=-36) 15=-59(F=-29, B=-29)



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

Rigid ceiling directly applied or 9-2-14 oc bracing.

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

MARNING - 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 MTek® 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 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 ucliapse with possible personal injury and properly damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TH1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



GIEBEIG - LOT 8 CW Job Truss Truss Type Qty Ply T27693424 3163304 **HJ11** Roof Special Girder Job Reference (optional) 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:41:49 2022 Page 1 Builders FirstSource (Lake City,FL), Lake City, FL - 32055, ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-2mDx5Dx?MTN5?piVioZLQQoYnR6mfxKDEmPM\_hzHY60 10-2-4 5-6-1 5-6-1 Scale = 1:24.8 2x4 || 4 12 4.24 12 3x4 = 10 D-4-8 14 15 13 6 2x4 || 4x4 = 5-6-1 5-6-1 10-1-14 LOADING (psf) SPACING-CSI. DEFL. I/def L/d PLATES GRIP 2-0-0 in (loc) Plate Grip DOL 1.25 TC 0.31 Vert(LL) 0.02 6-8 >999 240 MT20 244/190 20.0 TCLL 180 1.25 BC 0.22 Vert(CT) -0.03 6-8 >999 TCDL 7.0 Lumber DOL 0.0 Rep Stress Incr WB 0.32 Horz(CT) 0.01 n/a NO BCLL Code FBC2020/TPI2014 Weight: 57 lb FT = 20%BCDL 10.0 BRACING-LUMBER-TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, TOP CHORD 2x4 SP No.2 except end verticals.

**BOT CHORD** 

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

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

2x4 SP No.3

(size) 2=0-4-9, 5=0-4-3

Max Horz 2=157(LC 4) Max Uplift 2=-304(LC 4), 5=-405(LC 4)

Max Grav 2=539(LC 1), 5=782(LC 1)

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

TOP CHORD 2-3=-727/297, 4-5=-373/209 **BOT CHORD** 2-6=-351/656, 5-6=-351/656

WEBS

REACTIONS.

3-6=-65/278, 3-5=-693/371

### NOTES-

- 1) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone; porch left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=304, 5=405.
- 6) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 59 lb down and 73 lb up at 1-6-1, 59 lb down and 73 lb up at 1-6-1, 22 lb down and 38 lb up at 4-4-0, 22 lb down and 38 lb up at 4-4-0, 43 lb down and 78 lb up at 7-1-15, 43 lb down and 78 lb up at 7-1-15, and 124 lb down and 92 lb up at 10-0-8, and 128 lb down and 94 lb up at 10-0-8 on top chord, and 41 lb down and 43 lb up at 1-6-1, 41 lb down and 43 lb up at 1-6-1, 19 lb down and 24 lb up at 4-4-0, 19 lb down and 24 lb up at 4-4-0, 64 lb down at 7-1-15, and 64 lb down at 7-1-15, and 98 lb down and 56 lb up at 10-0-8 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
- 7) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

### LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25

Uniform Loads (plf)

Vert: 1-4=-54, 2-5=-20

Concentrated Loads (lb)

Vert: 4=-252(F=-124, B=-128) 5=-74(B) 12=-73(F=-36, B=-36) 14=-6(F=-3, B=-3) 15=-59(F=-29, B=-29)



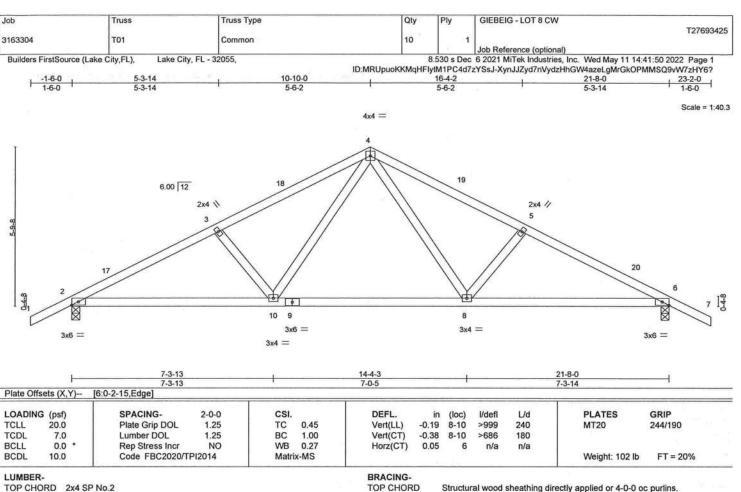
Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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ANSI/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601





BOT CHORD

Rigid ceiling directly applied or 9-3-2 oc bracing.

WEBS

2x4 SP No.2

**BOT CHORD** 

2x4 SP No.3

REACTIONS.

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

Max Horz 2=-92(LC 13)

Max Uplift 2=-256(LC 12), 6=-256(LC 13) Max Grav 2=1093(LC 1), 6=1093(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. 2-3=-1891/520, 3-4=-1724/510, 4-5=-1724/510, 5-6=-1891/520

TOP CHORD

**BOT CHORD** 2-10=-393/1643, 8-10=-193/1099, 6-8=-393/1643

**WEBS** 4-8=-193/717, 5-8=-277/176, 4-10=-193/717, 3-10=-277/176

### NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 1-6-0, Interior(1) 1-6-0 to 10-10-0, Exterior(2R) 10-10-0 to 13-10-0, Interior(1) 13-10-0 to 23-2-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

- 5) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=256, 6=256.
- 7) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

### LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25 Uniform Loads (plf)

Vert: 1-4=-54, 4-7=-54, 10-11=-20, 8-10=-80(F=-60), 8-14=-20



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

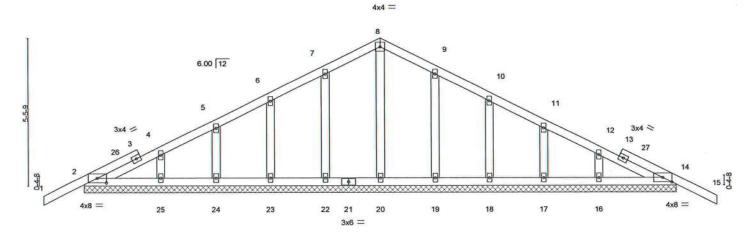
May 12,2022

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Job	Truss	Truss Type	Qty	Ply	GIEBEIG - LOT 8 CW	* YOU COURT TO SO FOR BOTH TO
Contraction of the Contraction	C. 2.00000		100		and the same of th	T27693426
3163304	T01G	Common Supported Gable	1		1	
					Job Reference (optional)	
Builders FirstSource	ce (Lake City,FL), Lake	City, FL - 32055,		8.530 s De	c 6 2021 MiTek Industries, Inc. Wed May 1	1 14:41:51 2022 Page 1
		7 00 00 00 00 00 00 00 00 00 00 00 00 00	ID:MRUpuoKKN	MqHFlytM1	PC4d7zYSsJ-?9LhWuyGt4dpF7stqDbpWrtxl	8Fro7w2Vh4uT2azHY6_
, -1-6-	0 ,	10-10-0	T .	VII ROSSIES SOOS	21-8-0	23-2-0
1-6-0	0	10-10-0			10-10-0	1-6-0

Scale = 1:40.8



	-					21-8-0						
Plate Offs	sets (X,Y)-	[2:0-4-0,0-2-1], [14:0-4-0,	,0-2-1]									
LOADING	G (psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.13	Vert(LL)	-0.01	15	n/r	120	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.05	Vert(CT)	-0.01	15	n/r	120	1000000000	
BCLL	0.0	Rep Stress Incr	YES	WB	0.05	Horz(CT)	0.00	14	n/a	n/a		
BCDL	10.0	Code FBC2020/T	PI2014	Matri	x-S						Weight: 114 lb	FT = 20%

21-8-0

LUMBER-

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

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

REACTIONS. All bearings 21-8-0.

Max Horz 2=87(LC 12) (lb) -

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

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

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Corner(3E) -1-6-0 to 1-6-0, Exterior(2N) 1-6-0 to 10-10-0, Corner(3R) 10-10-0 to 13-10-0, Exterior(2N) 13-10-0 to 23-2-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry
- Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.

  4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 5) All plates are 2x4 MT20 unless otherwise indicated.
- 6) Gable requires continuous bottom chord bearing.
- 7) Gable studs spaced at 2-0-0 oc.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 14, 22, 23, 24, 25, 19, 18, 17, 16.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

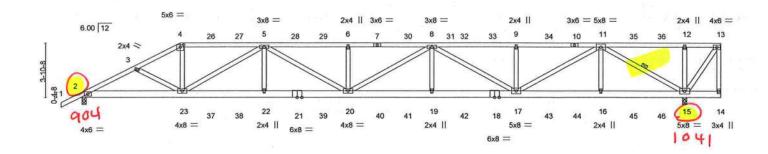
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Job	Truss	Truss Type	Qty Ply	GIEBEIG - LOT 8 CW		
3163304	T02 Half Hip Girder		1 2	1 2		T27693427
				Job Reference (optional)		
Builders FirstSource (Lake C	city,FL), Lake City, FL - 3	2055,	8.530 s Dec	6 2021 MiTek Industries, In	c. Wed May 11 14:4:	2:00 2022 Page 1
			ID:MRUpuoKKMqHFlytM1PC	24d7zYSsJ-EtO5Pz3vmrmX	qV2cscFwNkllJtgUkp	Gqm aRsYzHY5r
r1-6-0, 3-10-15	7-0-0 1 12-11-10	18-11-4 , 24-10-1	30-10-8	36-10-2	42-9-12	45-4-0
1-6-0 3-10-15	3-1-1 5-11-10	5-11-10 5-11-10	5-11-10	5-11-10	5-11-10	2-6-4

Scale = 1:78.9



ł		7-0-0	12-11-10 5-11-10	18-11-4 5-11-10	24-10-14 5-11-10	30-10-8 5-11-10		36-10-2 5-11-10		45-4-0 2-1-8 1-1-12-2-4-8
Plate Offse								2.17.10	511-10	1716677
LOADING	(psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	I/defi	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DC	DL 1.25	TC C	0.87 Vert(LL)	-0.50 19-20	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC 0	0.97 Vert(CT	-0.94 19-20	>547	180	2000 March	
BCLL	0.0 *	Rep Stress In	ncr NO	WB 0	0.76 Horz(C1	0.17 15	n/a	n/a	1	
BCDL	10.0	Code FBC20	20/TPI2014	Matrix-N	MS	en seran ana			Weight: 566 lb	FT = 20%

LUMBER-

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

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

BRACING-TOP CHORD

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

except end verticals.

**BOT CHORD** Rigid ceiling directly applied or 6-0-0 oc bracing. **WEBS** 1 Row at midpt 11-15

REACTIONS.

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

Max Horz 2=143(LC 27) Max Uplift 2=-904(LC 8), 15=-1041(LC 5)

Max Grav 2=3250(LC 1), 15=3957(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 2-3=-6693/1859, 3-4=-6553/1823, 4-5=-5948/1683, 5-6=-10423/2787, 6-8=-10423/2787,

8-9=-8435/2232, 9-11=-8435/2232

**BOT CHORD** 2-23=-1735/5940, 22-23=-2449/9024, 20-22=-2449/9024, 19-20=-2738/10290,

17-19-2738/10290, 16-17--1322/5005, 15-16--1322/5005 4-23--583/2462, 5-23--3628/952, 5-22-0/502, 5-20--404/1657, 6-20--626/326,

WEBS

8-19=0/515, 8-17=-2151/624, 9-17=-636/330, 11-17=-1055/3976, 11-16=0/480,

11-15=-5846/1545, 12-15=-571/284

### NOTES-

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

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

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

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

- 2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
- 3) Unbalanced roof live loads have been considered for this design.
- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone; Lumber DOL=1.60 plate grip DOL=1.60
- 5) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 6) Provide adequate drainage to prevent water ponding.
- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=904, 15=1041.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

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Job	Truss	Truss Type	Qty	Ply	GIEBEIG - LOT 8 CW	T27603427
3163304	Т02	Half Hip Girder	1	2	Job Reference (optional)	12/05542/

Builders FirstSource (Lake City,FL),

Lake City, FL - 32055,

8,530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:42:00 2022 Page 2 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-Et05Pz3vmrmXqV2cscFwNkllJtgUkpGqm\_aRsYzHY5r

### NOTES-

10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 128 lb down and 90 lb up at 7-0-0, 110 lb down and 90 lb up at 19-0-12, 110 lb down and 90 lb up at 11-0-12, 110 lb down and 90 lb up at 15-0-12, 110 lb down and 90 lb up at 15-0-12, 110 lb down and 90 lb up at 19-0-12, 110 lb down and 90 lb up at 27-0-12, 110 lb down and 90 lb up at 27-0-12, 110 lb down and 90 lb up at 25-0-12, 110 lb down and 90 lb up at 27-0-12, 110 lb down and 90 lb up at 35-0-12, 110 lb down and 90 lb up at 35-0-12, 110 lb down and 90 lb up at 37-0-12, 110 lb down and 90 lb up at 37-0-12, 110 lb down and 90 lb up at 37-0-12, 110 lb down and 90 lb up at 37-0-12, 110 lb down and 90 lb up at 37-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down and 90 lb up at 43-0-12, 110 lb down at 13-0-12, 110 lb down and 110 lb down at 13-0-12, 110 lb d

### LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25

Uniform Loads (plf)

Vert: 1-4=-54, 4-13=-54, 2-14=-20

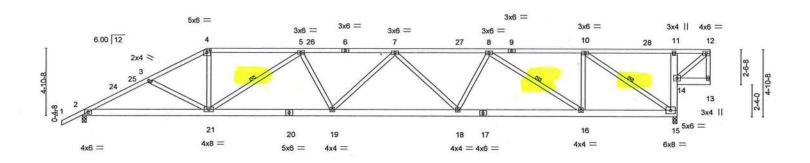
Concentrated Loads (lb)

Vert: 4-110(B) 7-110(B) 13-133(B) 14-73(B) 21-64(B) 23-335(B) 5-110(B) 22-64(B) 20-64(B) 6-110(B) 19-64(B) 8-110(B) 9-110(B) 17-64(B) 16-64(B) 11-110(B) 12-110(B) 15-64(B) 10-110(B) 18-64(B) 26-110(B) 27-110(B) 28-110(B) 29-110(B) 30-110(B) 32-110(B) 33-110(B) 34-110(B) 35-110(B) 36-110(B) 37-64(B) 49-64(B) 49-64(B)



AC 415 THE COLUMN TO THE COLUM	CW	GIEBEIG - LOT 8 CV	Ply	Qty		Truss Type		Truss	1	ob	
T27693428	T27690					Half Hip		Г03	1	3163304	
	ional)	Job Reference (optio									
11 14:42:02 2022 Page 1	tries, Inc. Wed May 1	6 2021 MiTek Industri	530 s Dec	8.		32055,	ke City, FL -	ty,FL), Lak	Source (Lake Cit	<b>Builders First</b>	
hlhRcCix7DH3YwRzHY5p	9IT0F3pC?z1IOS9qhl	4d7zYSsJ-AGVsqf59	HFIytM1PC	ID:MRUpuoKKMq							
45-4-0	42-11-8	36-2-0	E .	29-4-8	22-7-0	5-9-8	1 1:	9-0-0	4-10-15	r1-6-0	
2-4-8	6-9-8	6-9-8	1	6-9-8	6-9-8	3-9-8	6	4-1-1	4-10-15	1-6-0	

Scale = 1:80.3



-		9-0-0	18-0-11 9-0-11			27-1-5 9-0-11	1		36-2-0 9-0-11		42-11-8 6-9-8	45-4-0 2-4-8
Plate Offsets (X	(Y)-	[4:0-3-0,0-2-0]	5-0-11			5-0-11			3-0-11		0-9-0	Z-4-0
LOADING (psf	)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL 20.0	)	Plate Grip DOL	1.25	TC	0.68	Vert(LL)	-0.30	18-19	>999	240	MT20	244/190
TCDL 7.0	)	Lumber DOL	1.25	BC	0.68	Vert(CT)	-0.57	18-19	>897	180		
BCLL 0.0	•	Rep Stress Incr	YES	WB	0.81	Horz(CT)	0.14	15	n/a	n/a		
BCDL 10.0	)	Code FBC2020/TI	PI2014	Matri	x-MS						Weight: 280 lb	FT = 20%

BRACING-

TOP CHORD

**BOT CHORD** 

LUMBER-

TOP CHORD 2x4 SP No.2

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

WEBS 2x4 SP No.3

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

Max Horz 2=178(LC 12)

Max Uplift 2=-409(LC 12), 15=-470(LC 9) Max Grav 2=1658(LC 1), 15=1767(LC 1)

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

TOP CHORD 2-3=-3108/764, 3-4=-2869/688, 4-5=-2550/650, 5-7=-3639/924, 7-8=-3452/886,

8-10=-1967/516

**BOT CHORD** 2-21=-785/2753, 19-21=-918/3510, 18-19=-993/3727, 16-18=-861/3220, 15-16=-516/1967,

14-15=-360/133, 11-14=-278/132

WEBS 3-21=-266/160, 4-21=-186/986, 5-21=-1230/389, 5-19=-30/368, 7-18=-387/231,

8-18=-121/543, 8-16=-1503/414, 10-16=-174/985, 10-15=-2377/616

### NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl. GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 9-0-0, Exterior(2R) 9-0-0 to 15-4-15, Interior(1) 15-4-15 to 45-2-4 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- Provide adequate drainage to prevent water ponding.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=409, 15=470.



Structural wood sheathing directly applied or 2-7-4 oc purlins,

5-21, 8-16, 10-15

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

except end verticals.

1 Row at midpt

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

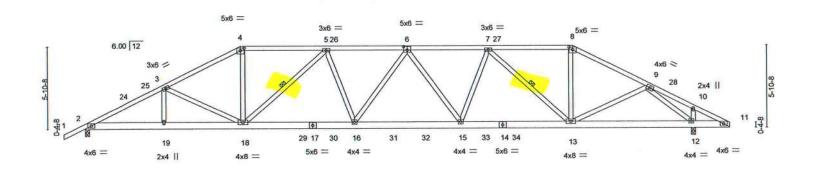
May 12,2022

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 note of the seign 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 fruss systems, see \*\*ANSI/TPI Quality Criteria, DSB-89 and BCSI Building Composition available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job		Truss		Truss Type		Qty	Ply	GIEBEIG - LO	OT 8 CW		T27693429
3163304		T04		Hip		1	1				121033423
								Job Reference	e (optional)	-10	
Builders FirstS	ource (Lake	City,FL),	Lake City, F	L - 32055,					Industries, Inc. Wed M		
						ID:MRUpuoKKMo	HFIytM1PC	4d7zYSsJ-eS3l	E176n3m86hznBXkpd?	NNuw5nlx9PGSxp	5TtzHY50
c1-6-0 <sub>i</sub>	5-6-11	1	11-0-0	16-11-15	22-8-0	28-4-1	1	34-4-0	39-7-1	45-4-0	
1-6-0	5-6-11	9.5	5-5-5	5-11-15	5-8-1	5-8-1		5-11-15	5-3-1	5-8-15	3

Scale = 1:78.5



1	5-6- 5-6-	11-0-0		8-11-6 7-11-6	-1	26-4-10 7-5-4	+		-4-0 11-6		42-11-8 8-7-8	2-4-8
Plate Offse	The second second second second	-3-0,0-2-0], [6:0-3-0,0-		A STATE OF THE PERSON NAMED IN COLUMN 1		7-0-4						
LOADING TCLL TCDL	(psf) 20.0 7.0	SPACING- Plate Grip DOL Lumber DOL	2-0-0 1.25 1.25	CSI. TC BC	0.46 0.65	DEFL. Vert(LL) Vert(CT)	in -0.27 -0.46		l/defl >999 >999	L/d 240 180	PLATES MT20	GRIP 244/190
BCLL BCDL	0.0 * 10.0	Rep Stress Incr Code FBC2020/TF	YES PI2014	WB Matrix	0.80 x-MS	Horz(CT)	0.13	12	n/a	n/a	Weight: 282 lb	FT = 20%

BRACING-TOP CHORD

WEBS

**BOT CHORD** 

LUMBER-

REACTIONS.

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

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

Max Horz 2=104(LC 16)

Max Uplift 2=-385(LC 12), 12=-386(LC 13) Max Grav 2=1783(LC 2), 12=1929(LC 2)

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

TOP CHORD 2-3=-3415/694, 3-4=-2954/607, 4-5=-2618/580, 5-6=-3333/705, 6-7=-3189/666,

7-8=-2177/471, 8-9=-2464/487

**BOT CHORD** 2-19=-645/3028, 18-19=-645/3028, 16-18=-652/3227, 15-16=-676/3341, 13-15=-591/3008,

12-13=-303/1697

3-18=-497/196, 4-18=-153/1066, 5-18=-903/277, 5-16=-59/361, 6-15=-328/161,

7-15=-96/561, 7-13=-1179/323, 8-13=-121/847, 9-13=-104/574, 9-12=-2232/496

### NOTES-

**WEBS** 

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

- 3) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 11-0-0, Exterior(2R) 11-0-0 to 17-4-15, Interior(1) 17-4-15 to 34-4-0, Exterior(2R) 34-4-0 to 40-8-15, Interior(1) 40-8-15 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 4) Provide adequate drainage to prevent water ponding.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=385, 12=386.



Structural wood sheathing directly applied or 2-11-10 oc purlins.

5-18, 7-13

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

1 Row at midpt

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

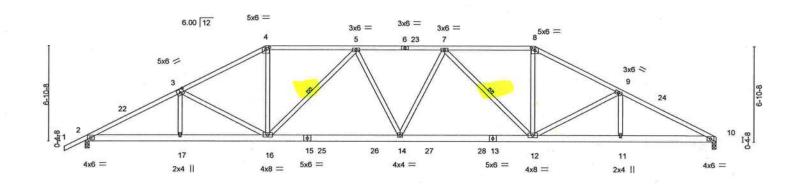
May 12,2022

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



T	Job	Truss	1	russ Type		Qty	Ply	GIEBEIG - LOT 8 CW		
	3163304	T05	ŀ	łip		1	1			T27693430
								Job Reference (optional)		
	Builders FirstSource	(Lake City,FL),	Lake City, FL - 320	155,			8.530 s Dec	6 2021 MiTek Industries, Inc. W	/ed May 11 14:42:04 20	)22 Page 1
					ID	MRUpuoKKM	HFIytM1PC	4d7zYSsJ-6fdcFL7Pq4GzJ7MN5	SKsXaw14U4NgfzQgb	Yf?JzHY5n
	r1-6-0	6-10-2	13-0-0	19-5-15	25-10	)-1	32-4-0	, 38-5-14	45-4-0	
	1-6-0	6-10-2	6-1-14	6-5-15	6-4	1	6-5-15	6-1-14	6-10-2	

Scale = 1:79.8



	1	6-10-2	3-0-0	22	2-8-0		32-4-0	)	9	38-5-1	4 , 45-4	-0	
	1	6-10-2	-1-14	9	-8-0		9-8-0	11		6-1-1	4 6-10	-2	
Plate Offse	ets (X,Y)	[3:0-3-0,0-3-0], [4:0-3-0,0	0-2-0], [8:0-3-0	,0-2-0]									
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP	10
TCLL	20.0	Plate Grip DOL	1.25	TC	0.63	Vert(LL)	-0.33 1	2-14	>999	240	MT20	244/190	
TCDL	7.0	Lumber DOL	1.25	BC	0.78	Vert(CT)	-0.57 1	2-14	>961	180	0.00000000		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.58	Horz(CT)	0.16	10	n/a	n/a			
BCDL	10.0	Code FBC2020/T	PI2014	Matrix	-MS						Weight: 275 lb	FT = 20%	

BRACING-

TOP CHORD

**BOT CHORD** 

WEBS

LUMBER-

REACTIONS.

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

2x4 SP No.3

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

Max Horz 2=119(LC 12)

Max Uplift 10=-362(LC 13), 2=-395(LC 12) Max Grav 10=1846(LC 2), 2=1915(LC 2)

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

TOP CHORD 2-3=-3654/705, 3-4=-3088/599, 4-5=-2725/577, 5-7=-3327/654, 7-8=-2727/579,

8-9=-3091/602, 9-10=-3667/715 2-17=-656/3223, 16-17=-656/3226, 14-16=-544/3222, 12-14=-520/3223, 11-12=-568/3235,

**BOT CHORD** 10-11=-568/3235

WEBS 3-17=0/263, 3-16=-601/237, 4-16=-136/1100, 5-16=-795/241, 5-14=-63/311, 7-14=-62/310, 7-12=-794/240, 8-12=-142/1103, 9-12=-610/245, 9-11=0/266

### NOTES-

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 13-0-0, Exterior(2R) 13-0-0 to 19-5-15, Interior(1) 19-5-15 to 32-4-0, Exterior(2R) 32-4-0 to 38-5-14, Interior(1) 38-5-14 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- Provide adequate drainage to prevent water ponding.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 10=362, 2=395,



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

5-16, 7-12

Rigid ceiling directly applied or 9-0-0 oc bracing.

1 Row at midpt

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

MARNING - 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 property 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

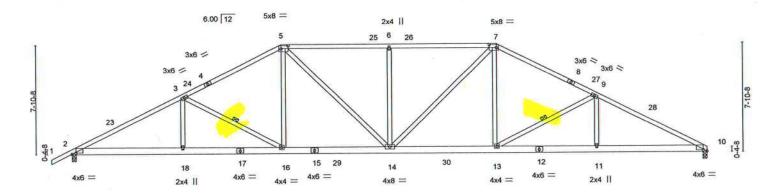
ANSITPI Quality Criteria, DSB-89 and BCSI Building Composately Information

available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job	Truss	Truss Type		Qty	Ply	GIEBEIG - LOT 8 CW		T27693431
3163304	T06	Hip		1	1	Job Reference (optional)		
Builders FirstSource	e (Lake City,FL),	Lake City, FL - 32055,				6 2021 MiTek Industries, Inc. PC4d7zYSsJ-31IMg18gLhWgY		
c1-6-0 <sub>1</sub>	7-10-12	15-0-0	22-8-0	30-4	-0	37-5-4	45-4-0	
1-6-0	7-10-12	7-1-4	7-8-0	7-8-	0	7-1-4	7-10-12	

Scale = 1:79.7



	7-10-12 15-0-0		22-8-0	30-4-0			37-5-4	45-4-0		
	T.	7-10-12	7-1-4	7-8-0		7-8-0		7-1-4	7-10-12	4
Plate Offse	ets (X,Y)-	[2:0-3-3,0-0-14], [5:0-6-0,	,0-2-8], [7:0-6-0	,0-2-8], [10:0-3-3,0-0-14]						
LOADING	(psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC 0.93	Vert(LL)	-0.28 13-14	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC 0.84	Vert(CT)	-0.48 13-14	>999	180		
BCLL	0.0 *	Rep Stress Incr Code FBC2020/T	YES PI2014	WB 0.51 Matrix-MS	Horz(CT)	0.14 10	n/a	n/a	Weight: 278 lb	FT = 20%

BRACING-

WEBS

TOP CHORD

**BOT CHORD** 

Structural wood sheathing directly applied.

1 Row at midpt

Rigid ceiling directly applied or 9-0-0 oc bracing.

3-16, 9-13

LUMBER-

REACTIONS.

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

2x4 SP No.3 WEBS

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

Max Horz 2=134(LC 12)

Max Uplift 2=-393(LC 12), 10=-360(LC 13) Max Grav 2=1912(LC 2), 10=1844(LC 2)

FORCES. (Ib) - Max. Comp./Max. Ten. - All forces 250 (Ib) or less except when shown. 2-3=-3601/687, 3-5=-2906/582, 5-6=-2884/625, 6-7=-2884/625, 7-9=-2908/586,

TOP CHORD 9-10=-3613/695

2-18=-643/3167, 16-18=-643/3167, 14-16=-405/2540, 13-14=-341/2542, 11-13=-540/3179, **BOT CHORD** 

10-11=-540/3179

3-18=0/336, 3-16=-733/273, 5-16=-83/645, 5-14=-180/592, 6-14=-474/231, WEBS

7-14=-180/590, 7-13=-85/648, 9-13=-742/280, 9-11=0/338

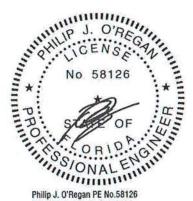
### NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 15-0-0, Exterior(2R) 15-0-0 to 21-4-15, Interior(1) 21-4-15 to 30-4-0, Exterior(2R) 30-4-0 to 36-8-15, Interior(1) 36-8-15 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

4) Provide adequate drainage to prevent water ponding.

- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=393, 10=360.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

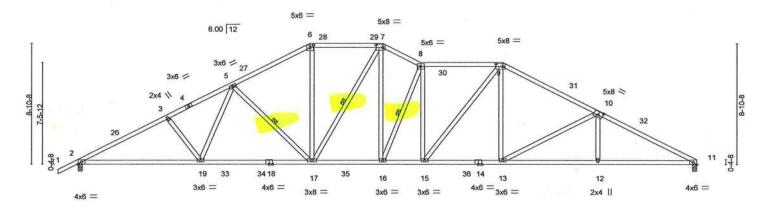
MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE. Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, 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



Job Truss Truss Type Qty GIEBEIG - LOT 8 CW T27693432 3163304 T07 Roof Special Job Reference (optional) Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:42:08 2022 Page 1 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-?Qs74iAwtJmOnkf8KIPoiQ4eK6QbcQ50bDWs85zHY5j 25-1-8 31-1-8 38-1-9 45-4-0 4-9-0

Scale = 1:81.5



	1	9-0-1	17-0	-0	22-4-0	25-1-8	31-1-8	1	38-1-9	45-4-	0 ,	
		9-0-1	7-11-	15	5-4-0	2-9-8	6-0-0		7-0-1	7-2-7	1	
Plate Offs	ets (X,Y)	[6:0-3-0,0-2-0], [7:0-6-0,0	-2-8], [9:0-6-0,0	0-2-8], [10:0-	4-0,0-3-0]							
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in (loc)	l/defi	L/d	PLATES	GRIP	
TCLL	20.0	Plate Grip DOL	1.25	TC	0.93	Vert(LL)	-0.32 13-15	>999	240	MT20	244/190	
TCDL	7.0	Lumber DOL	1.25	BC	0.96	Vert(CT)	-0.55 17-19	>993	180			
BCLL	0.0	Rep Stress Incr	YES	WB	0.83	Horz(CT)	0.19 11	n/a	n/a			
BCDL	10.0	Code FBC2020/T	PI2014	Matri	x-MS				200000	Weight: 270 lb	FT = 20%	

BRACING-

TOP CHORD

BOT CHORD

WERS

Structural wood sheathing directly applied.

1 Row at midpt

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

5-17, 7-17, 8-16

LUMBER-

TOP CHORD 2x4 SP No.2

2x4 SP No.2 \*Except\* BOT CHORD 2-18: 2x4 SP M 31

WEBS 2x4 SP No.3

REACTIONS. (size) 2=0-3-8, 11=0-3-8

Max Horz 2=149(LC 12)

Max Uplift 2=-342(LC 12), 11=-360(LC 13) Max Grav 2=1923(LC 2), 11=1845(LC 2)

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

2-3=-3559/735, 3-5=-3399/732, 5-6=-2674/659, 6-7=-2353/633, 7-8=-2781/716, TOP CHORD

8-9=-2924/729, 9-10=-2944/680, 10-11=-3588/751

BOT CHORD 2-19=-611/3135, 17-19=-525/2780, 16-17=-416/2486, 15-16=-527/2929, 13-15=-437/2575,

12-13=-603/3166, 11-12=-604/3159

3-19=-278/170, 5-19=-96/579, 5-17=-626/249, 6-17=-140/933, 7-17=-394/136,

7-16=-291/1274, 8-16=-1228/335, 8-15=-308/134, 9-15=-139/560, 9-13=-75/576,

10-13=-681/262, 10-12=0/293

WEBS

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 17-0-0, Exterior(2R) 17-0-0 to 21-6-6, Interior(1) 21-6-6 to 22-4-0, Exterior(2E) 22-4-0 to 25-1-8, Interior(1) 25-1-8 to 31-1-8, Exterior(2R) 31-1-8 to 35-7-14, Interior(1) 35-7-14 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 4) Provide adequate drainage to prevent water ponding.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=342, 11=360.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

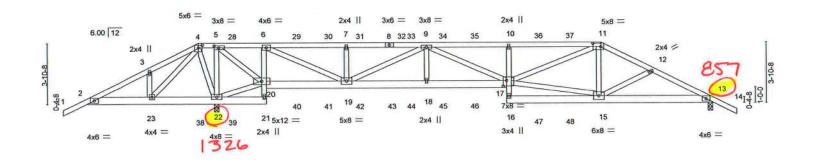
May 12,2022

🛦 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 MTek® 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 designer must verify the applicability of design parameters and properly incorporate this design into the overall building designer must verify the applicability of design parameters and properly incorporate this design into the overall building designer must verify the applicability of design parameters and properly incorporate this design into the overall building designer must verify the applicability of design parameters and properly incorporate this design into the overall building designer must verify the applicability of design parameters and properly design. For experiment of the overall building designer must be overall building d



Job		Truss			Truss	Туре				Qty	Ply	GIEBEIG - LOT 8 C	cw		T2769343
3163304		Т08			Hip G	irder				1	2	Job Reference (opti	onal)		
Builders First	Source (Lake	City,FL),	Lake C	ity, FL - 3	32055,				ID:MRU			6 2021 MiTek Indust 24d7zYSsJ-MOg08Q			
,-1-6-0,	3-10-15	7-0-0	8-1-12	11-3-8	-1	16-3-11	-1	21-3-13	-1	26-4-0	1	32-4-0	35-5-1	39-4-0	40-10-0
1-6-0	3-10-15	3-1-1	1-1-12	3-1-12	18	5-0-3	1.0	5-0-3	1	5-0-3		6-0-0	3-1-1	3-10-15	1-6-0

Scale = 1:70.1



	3-10-15	5 , 8-1-12 ,	11-3-8	16-3-11	21-3-13		26-4-0	- 1	- 3	2-4-0	39-4-0	
	3-10-15	5 4-2-13	3-1-12	5-0-3	5-0-3		5-0-3	3	(	5-0-0	7-0-0	
Plate Offse	ets (X,Y)	[4:0-3-0,0-2-0], [5:0-3-8	0-1-8], [11:0	0-6-0,0-2-8], [17:0	0-2-8,0-4-4]							
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.96	Vert(LL)	-0.30	17-18	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.99	Vert(CT)	-0.54	17-18	>693	180		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.75	Horz(CT)	0.16	13	n/a	n/a	AND A CHARLES OF THE PROPERTY.	
BCDL	10.0	Code FBC2020/	TPI2014	Matri	x-MS						Weight: 504 lb	FT = 20%

BRACING-

TOP CHORD

BOT CHORD

Structural wood sheathing directly applied.

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

LUMBER-

2x4 SP No.2 TOP CHORD

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

6-21,10-16: 2x4 SP No.3

WEBS 2x4 SP No.3

(size) 13=0-3-8, 22=0-3-8 REACTIONS.

Max Horz 22=63(LC 27)

Max Uplift 13=-857(LC 4), 22=-1326(LC 4) Max Grav 13=2344(LC 20), 22=3761(LC 1)

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

TOP CHORD 2-3=-177/515, 3-4=-108/508, 4-5=-247/953, 5-6=-2204/1003, 6-7=-5698/2140,

7-9=-5698/2140, 9-10=-7531/2867, 10-11=-7450/2844, 11-12=-4542/1749, 12-13=-4688/1756

2-23=-423/212, 22-23=-714/304, 6-20=-2167/836, 19-20=-1017/2312, 18-19=-2804/7581, **BOT CHORD** 

17-18=-2804/7581, 10-17=-605/303, 15-16=-242/732, 13-15=-1529/4153

4-23=-169/439, 4-22=-768/276, 5-22=-2296/902, 20-22=-958/333, 5-20=-1285/3373, WEBS

6-19=-1416/3931, 7-19=-529/259, 9-19=-2231/801, 9-18=-97/510, 15-17=-1272/3363,

11-17=-1372/3699, 11-15=-19/292

### NOTES-

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

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

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

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

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

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

- 4) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone; cantilever left exposed; porch left exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 5) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

Provide adequate drainage to prevent water ponding.

- 7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 8) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 13=857, 22=1326.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

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Job	Truss	Truss Type	Qty	Ply	GIEBEIG - LOT 8 CW
3163304	T08	Hip Girder	1	_	T27693433
				2	Job Reference (optional)

Builders FirstSource (Lake City,FL),

Lake City, FL - 32055,

8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:42:13 2022 Page 2 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-MOg08QD3irPhuVY66r\_zPUoUW76GHidlIVEdplzHY5e

### NOTES-

10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 128 lb down and 90 lb up at 7-0-0, 110 lb down and 90 lb up at 9-0-12, 97 lb down and 77 lb up at 11-0-12, 97 lb down and 77 lb up at 15-0-12, 97 lb down and 77 lb up at 17-0-12, 97 lb down and 77 lb up at 17-0-12, 97 lb down and 77 lb up at 19-0-12, 97 lb down and 77 lb up at 22-3-4, 97 lb down and 77 lb up at 22-3-4, 97 lb down and 77 lb up at 22-3-4, 97 lb down and 77 lb up at 22-3-4, 110 lb down and 90 lb up at 28-3-4, and 110 lb down and 90 lb up at 30-3-4, and 230 lb down and 173 lb up at 32-4-0 on top chord, and 335 lb down and 174 lb up at 7-0-0, 86 lb down at 9-0-12, 78 lb down and 32 lb up at 13-0-12, 78 lb down and 32 lb up at 17-0-12, 86 lb down and 32 lb up at 19-0-12, 78 lb down and 32 lb up at 20-3-4, 78 lb down and 32 lb up at 20-3-4, 78 lb down and 32 lb up at 30-3-4, and 335 lb down and 32 lb up at 30-3-4, and 335 lb down and 32-3-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

### LOAD CASE(S) Standard

Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25
 Uniform Loads (plf)

Vert: 1-4=-54, 4-11=-54, 11-14=-54, 2-21=-20, 17-20=-20, 13-16=-20

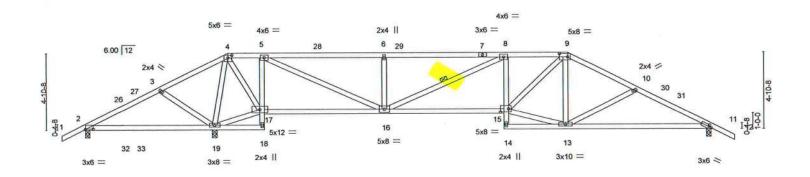
Concentrated Loads (lb)

Vert: 4=-110(F) 8=-97(F) 11=-182(F) 6=-97(F) 10=-97(F) 17=-77(F) 15=-335(F) 28=-110(F) 29=-97(F) 30=-97(F) 31=-97(F) 33=-97(F) 34=-97(F) 35=-97(F) 36=-110(F) 37=-110(F) 38=-335(F) 39=-64(F) 40=-77(F) 41=-77(F) 42=-77(F) 43=-77(F) 44=-77(F) 45=-77(F) 45=-77



Job		Truss			Truss Type		Qty	Ply	GIEBEIG - LO	OT 8 CW		T07000 10 1
0400004		TOO			Hip		1	1				T27693434
3163304		T09			пір			16:	Job Reference	e (optional)		
Builders FirstS	ource (Lake	City,FL),	Lake C	City, FL - 32	055,					Industries, Inc. We		
						ID:MRUpus	KKMqH	FlytM1PC4c	7zYSsJ-qaEOI	LmEhT9XYVf7lgYV	CxhKlGWVx09?	u_9zBMkzHY5d
-1-6-0,	4-10-0	- 1	9-0-0	, 11-3-8	18-9-12	. 2	3-4-0		30-4-0	34-6-8	39-4-0	40-10-0
1-6-0	4-10-0	- 1	4-1-15	2-3-8	7-6-4	7	-6-4		4-0-0	4-2-8	4-9-8	1-6-0

Scale = 1:70.1



	<u></u>	8-1-12	11-3-8	18-9-12		26-4-6			30-4-0		39-4-0	
Plate Offse	ets (X,Y)-	8-1-12 [2:0-6-0,0-0-3], [4:0-3-0	3-1-12 ,0-2-0], [9:0-6-0	7-6-4	1-15,0-1-8],	7-6-4 [15:0-6-0,0-2-8]			4-0-0		9-0-0	SVI
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL TCDL	20.0	Plate Grip DOL Lumber DOL	1.25 1.25	TC BC	0.58	Vert(LL) Vert(CT)	0.17	19-22 13-25	>583 >999	240 180	MT20	244/190
BCLL	0.0	Rep Stress Incr Code FBC2020/	YES	100505000	0.74	Horz(CT)	0.06	11	n/a	n/a	Weight: 215 lb	FT = 20%

BRACING-TOP CHORD

WEBS

BOT CHORD

LUMBER-

TOP CHORD 2x4 SP No.2

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

5-18,8-14: 2x4 SP No.3

WEBS 2x4 SP No.3

REACTIONS.

(size) 2=0-3-8, 11=0-3-8, 19=0-3-8

Max Horz 2=78(LC 12)

Max Uplift 2=-449(LC 24), 11=-284(LC 13), 19=-537(LC 9) Max Grav 2=60(LC 13), 11=1079(LC 24), 19=2238(LC 1)

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

TOP CHORD 2-3=-253/1226, 3-4=-271/1391, 4-5=-36/362, 5-6=-1456/405, 6-8=-1456/405,

8-9=-1902/505, 9-10=-1532/402, 10-11=-1800/484

**BOT CHORD** 2-19=-1066/287, 5-17=-1155/358, 16-17=-331/212, 15-16=-387/1941, 11-13=-359/1585 WEBS

3-19=-321/234, 4-19=-1610/344, 17-19=-910/298, 4-17=-256/1070, 5-16=-459/1944,

6-16=-429/208, 8-16=-545/207, 13-15=-182/1313, 9-15=-236/808, 10-13=-305/169

### NOTES-

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

- 3) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 2-5-3, Interior(1) 2-5-3 to 9-0-0, Exterior(2R) 9-0-0 to 14-6-12, Interior(1) 14-6-12 to 30-4-0, Exterior(2R) 30-4-0 to 35-10-12, Interior(1) 35-10-12 to 40-10-0 zone; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 4) Provide adequate drainage to prevent water ponding.
- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \*This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=449, 11=284, 19=537.



Structural wood sheathing directly applied or 4-0-7 oc purlins.

8-16

Rigid ceiling directly applied or 5-5-14 oc bracing.

1 Row at midpt

Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

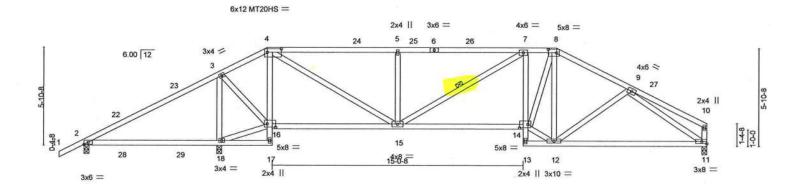
May 12,2022

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Job	Truss	Truss Type		Qty	Ply	GIEBEIG - LO	T 8 CW		
3163304	T10	Hip		1		1			T27693435
						Job Reference	(optional)		
Builders FirstSource	(Lake City,FL),	Lake City, FL - 32055,			8.530 s D	ec 6 2021 MiTek I	ndustries, Inc. W	ed May 11 14:42:16 20:	22 Page 1
				ID:MRUpuoKKMqHF	lytM1PC4c	17zYSsJ-myL8mSC	Sx?mnGlzGhozYg	06Q3yKBQU3hBRTSH	QdzHY5b
1-1-6-0	8-1-12	, 11-0-0 11 <sub>r</sub> 3-8	18-9-12	26	4-0	, 28-4-0	32-8-4	37-4-0	
1-6-0	8-1-12	2-10-4 0-3-8	7-6-4	7-	6-4	2-0-0	4-4-4	4-7-12	

Scale = 1:66.5



	1	8-1-12	11-3-8	18-9-12		26-4-0	28-	4-0	37-4-0	6
		8-1-12	3-1-12	7-6-4	1	7-6-4	2-0	0-0	9-0-0	
Plate Offse	ets (X,Y)-	[4:0-10-0,0-2-8], [8:0-6-0	,0-2-8], [14:0-6-	-0,0-2-8], [16:0-6-0,0-2-8]						
LOADING	(psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L∕d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC 0.76	Vert(LL)	0.23 18-21	>422	240	MT20	244/190
CDL	7.0	Lumber DOL	1.25	BC 0.77	Vert(CT)	0.18 18-21	>529	180	MT20HS	187/143
BCLL	0.0	Rep Stress Incr	YES	WB 0.73	Horz(CT)	0.06 11	n/a	n/a	15	
BCDL	10.0	Code FBC2020/T	PI2014	Matrix-MS	Ø 350				Weight: 215 lb	FT = 20%

BRACING-

TOP CHORD

**BOT CHORD** 

WEBS

LUMBER-

TOP CHORD 2x4 SP No.2

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

4-17,7-13: 2x4 SP No.3

WEBS 2x4 SP No.3

REACTIONS. (size) 2=0-3-8, 18=0-3-8, 11=0-3-8

Max Horz 2=125(LC 12)

Max Uplift 2=-161(LC 24), 18=-405(LC 9), 11=-238(LC 13) Max Grav 2=104(LC 23), 18=1777(LC 1), 11=985(LC 1)

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

TOP CHORD

2-3=-131/676, 4-5=-1318/358, 5-7=-1318/358, 7-8=-1402/396, 8-9=-1260/331 2-18=-576/152, 4-16=-839/233, 14-15=-270/1426, 7-14=-312/175, 11-12=-260/1085 **BOT CHORD** 

3-18=-1386/343, 3-16=-178/970, 4-15=-339/1385, 5-15=-460/222, 12-14=-150/1214, **WEBS** 

8-14=-265/911, 8-12=-403/140, 9-11=-1219/318, 16-18=-563/171

### NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 2-2-13, Interior(1) 2-2-13 to 11-0-0, Exterior(2R) 11-0-0 to 16-3-6, Interior(1) 16-3-6 to 28-4-0, Exterior(2R) 28-4-0 to 33-7-6, Interior(1) 33-7-6 to 37-2-4 zone; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 4) Provide adequate drainage to prevent water ponding.
- 5) All plates are MT20 plates unless otherwise indicated.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=161, 18=405, 11=238.



Structural wood sheathing directly applied or 3-11-4 oc purlins,

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

except end verticals.

1 Row at midpt

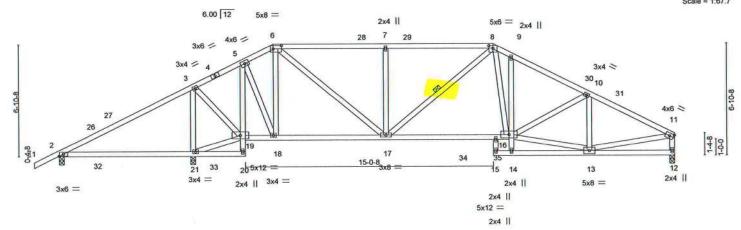
Philip J. O'Regan PE No.58126 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

MRRNING - 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 amage. 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 Compo Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



GIEBEIG - LOT 8 CW Qty Ply Truss Type Job Truss T27693436 3163304 T11 Hip | Job Reference (optional) 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:42:17 2022 Page 1 Lake City, FL - 32055. Builders FirstSource (Lake City,FL), ID:MRUpuoKKN dqHFlytM1PC4d7zYSsJ-E9vWznHZm4v7M6rtLg3vZKyEHkYiDZPKg7Cry3zHY5a 19-9-12 6-9-12 26-4-0 6-6-4 32-2-0 4-10-8 37-4-0 1-6-0 Scale = 1:67.7



	-	8-1-12	11-3-8	13-0-0	19-9-12		26-4-0	27-3-8 0-11-8	32-2-0 4-10-8	5-2-0	
Plate Offs	ets (X,Y)-	8-1-12 [6:0-6-0,0-2-8], [8:0-3-0,0	3-1-12	1-8-8	6-9-12		6-6-4	0-11-6	4-10-8	5-2-0	
			8 28	0.022		732-7410-710	7007 55 75	VIA VEE		Participal Report Let	
LOADING	(psf)	SPACING-	2-0-0	CSI		DEFL.	in (loc)	I/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.72	Vert(LL)	0.23 21-25	>433	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.70	Vert(CT)	0.18 21-25	>545	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.51	Horz(CT)	0.05 12	n/a	n/a		
BCDL	10.0	Code FBC2020/T		Mat	rix-MS				2002	Weight: 236 lb	FT = 20%

BRACING-

TOP CHORD

**BOT CHORD** 

WEBS

LUMBER-

TOP CHORD 2x4 SP No.2

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

5-20,9-14: 2x4 SP No.3

WEBS 2x4 SP No.3

REACTIONS.

(size) 2=0-3-8, 12=0-3-8, 21=0-3-8

Max Horz 2=140(LC 12)

Max Uplift 2=-65(LC 12), 12=-235(LC 13), 21=-343(LC 12) Max Grav 2=205(LC 23), 12=1121(LC 2), 21=1809(LC 2)

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

TOP CHORD 2-3=-76/498, 3-5=-398/170, 5-6=-657/204, 6-7=-1342/332, 7-8=-1342/332,

8-9=-1633/403, 9-10=-1674/367, 10-11=-1513/324, 11-12=-1035/246

BOT CHORD 2-21=-405/126, 5-19=-814/125, 18-19=-60/314, 17-18=-101/579, 16-17=-168/1345

3-21=-1366/347, 19-21=-394/128, 3-19=-100/922, 5-18=-141/781, 6-18=-566/162,

6-17=-208/1006, 7-17=-411/199, 8-16=-118/603, 13-16=-228/1329, 10-13=-407/133,

11-13=-218/1250

### NOTES-

WEBS

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 2-2-13, Interior(1) 2-2-13 to 13-0-0, Exterior(2R) 13-0-0 to 18-3-6, Interior(1) 18-3-6 to 26-4-0, Exterior(2R) 26-4-0 to 31-7-6, Interior(1) 31-7-6 to 37-2-4 zone; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

4) Provide adequate drainage to prevent water ponding.

- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 12=235, 21=343.



Structural wood sheathing directly applied or 4-5-10 oc purlins,

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

except end verticals.

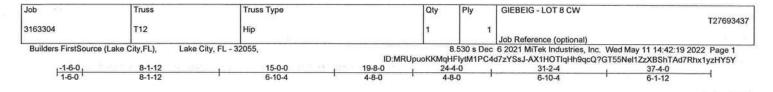
1 Row at midpt

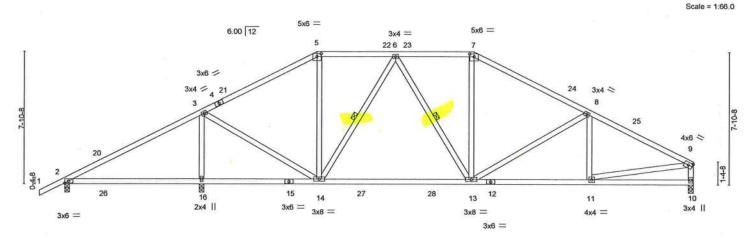
10-0-0 oc bracing: 14-16

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	1	8-1-12		15-0-0	370	24-4-0		ÿ.	31-2-4	37-4	0 ,	
		8-1-12	1 (	5-10-4		9-4-0		1	6-10-4	6-1-1	2	
Plate Off	fsets (X,Y)-	[5:0-3-0,0-2-0], [7:0-3-0,0	0-2-0]									
LOADIN	IG (psf)	SPACING-	2-0-0	CSI.		DEFL.	in (lo	) I/defl	L/d	PLATES	GRIP	
TCLL	20.0	Plate Grip DOL	1.25	TC	0.71	Vert(LL)	0.26 16-1	9 >383	240	MT20	244/190	
TCDL	7.0	Lumber DOL	1.25	BC	0.88	Vert(CT)	0.21 16-1	9 >468	180			
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.49	Horz(CT)	0.03	0 n/a	n/a			
BCDL	10.0	Code FBC2020/T	PI2014	Matrix	k-MS				07.000	Weight: 210 lb	FT = 20%	

BRACING-

TOP CHORD

BOT CHORD

WEBS

LUMBER-

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

WEBS 2x4 SP No.3

REACTIONS. (size) 2=0-3-8, 16=0-3-8, 10=0-3-8

Max Horz 2=155(LC 12)

Max Uplift 2=-86(LC 9), 16=-324(LC 12), 10=-242(LC 13) Max Grav 2=322(LC 23), 16=1646(LC 2), 10=1140(LC 2)

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

TOP CHORD 3-5=-954/255, 5-6=-782/257, 6-7=-1118/322, 7-8=-1319/317, 8-9=-1588/348,

9-10=-1039/256

**BOT CHORD** 13-14=-132/1013, 11-13=-257/1376

**WEBS** 3-16=-1354/347, 3-14=-102/1020, 6-14=-501/160, 6-13=-63/251, 7-13=-31/334,

8-13=-330/184, 9-11=-229/1281

### NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 2-2-13, Interior(1) 2-2-13 to 15-0-0, Exterior(2R) 15-0-0 to 20-3-6, Interior(1) 20-3-6 to 24-4-0, Exterior(2R) 24-4-0 to 29-7-6, Interior(1) 29-7-6 to 37-2-4 zone; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

Provide adequate drainage to prevent water ponding.

- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 16=324, 10=242.



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

6-14, 6-13

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

except end verticals.

1 Row at midpt

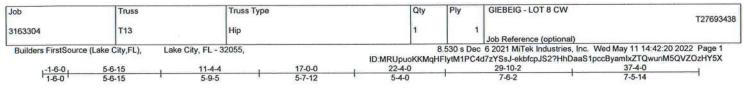
Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

May 12,2022

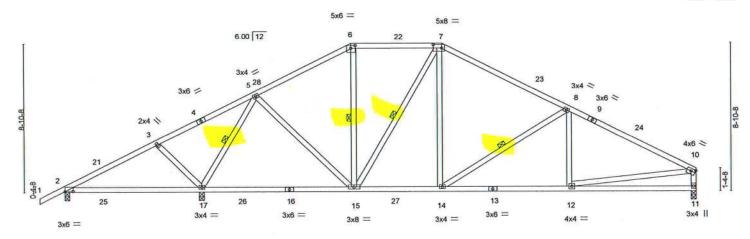
MARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE. Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, 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/TP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601





Scale = 1:66.0



		8-1-12	8-3-8	17-0-0		22-4-0			29-10-	2	37-4-0	
	1	8-1-12	0-1-12	8-8-8		5-4-0	1		7-6-2	2	7-5-14	
Plate Offse	ets (X,Y)-	[2:0-6-0,0-0-3], [6:0-3-0	0,0-2-0], [7:0-6-	0,0-2-8], [10:Ed	ge,0-1-12]							
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.61	Vert(LL)	0.21	17-20	>472	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.76	Vert(CT)	0.19	17-20	>528	180		
BCLL	0.0	Rep Stress Incr	YES	WB	0.46	Horz(CT)	0.03	11	n/a	n/a	***************************************	
BCDL	10.0	Code FBC2020	/TPI2014	Matrix	-MS	12 27					Weight: 216 lb	FT = 20%

LUMBER-

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

BRACING-TOP CHORD

except end verticals. BOT CHORD

Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 2-17.

Structural wood sheathing directly applied or 4-0-1 oc purlins,

WEBS 1 Row at midpt

5-17, 6-15, 7-15, 8-14

REACTIONS.

(size) 2=0-3-8, 11=0-3-8, 17=0-3-8

Max Horz 2=170(LC 12)

Max Uplift 2=-77(LC 8), 11=-234(LC 13), 17=-357(LC 12) Max Grav 2=266(LC 23), 11=1116(LC 2), 17=1771(LC 2)

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

3-5=-99/425, 5-6=-919/256, 6-7=-770/263, 7-8=-1128/296, 8-10=-1574/335, TOP CHORD

10-11=-1002/252

BOT CHORD 15-17=-78/376, 14-15=-91/942, 12-14=-231/1351

3-17=-314/197, 5-17=-1386/313, 5-15=-44/585, 7-15=-378/137, 7-14=-87/490, **WEBS** 

8-14=-507/226, 10-12=-189/1204

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 2-2-13, Interior(1) 2-2-13 to 17-0-0, Exterior(2E) 17-0-0 to 22-4-0, Exterior(2R) 22-4-0 to 27-7-6, Interior(1) 27-7-6 to 37-2-4 zone; porch left exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.

4) Provide adequate drainage to prevent water ponding.

- 5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 6) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2 except (jt=lb) 11=234, 17=357.

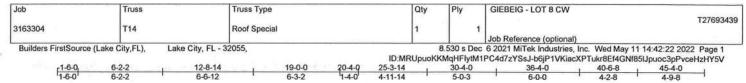


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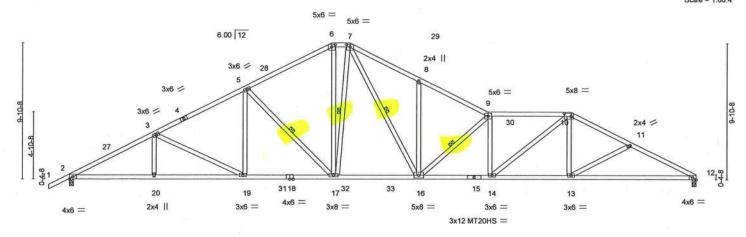
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Scale = 1:80.4



	1	6-	2-2	12-8-14	19-0-0	) (	25-4-0	, 3	0-4-0	i i	36-4-0	45-4-0	7	
		6-	2-2	6-6-12	6-3-2		6-4-0	1	5-0-0	-1	6-0-0	9-0-0		
Plate Offs	ets (X,Y)-	- [6:0	)-3-0,0-2-0], [7:0-3	3-0,0-2-0], [10:0-0	6-0,0-2-8]									
LOADING	(psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L∕d	PLATES	GRIP	
TCLL	20.0		Plate Grip DO	L 1.25	TC	0.46	Vert(LL)	-0.35	16-17	>999	240	MT20	244/190	
TCDL	7.0		Lumber DOL	1.25	BC	0.45	Vert(CT)	-0.60	16-17	>914	180	MT20HS	187/143	
BCLL	0.0		Rep Stress In	cr YES	WB	0.64	Horz(CT)	0.16	12	n/a	n/a			
BCDL	10.0		Code FBC20	20/TPI2014	Matri	x-MS	0.000					Weight: 275 lb	FT = 20%	

BRACING-

TOP CHORD

**BOT CHORD** 

WEBS

LUMBER-

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

9-10: 2x4 SP M 31 **BOT CHORD** 2x4 SP M 31

WEBS 2x4 SP No.3

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

Max Horz 2=164(LC 12)

Max Uplift 12=-371(LC 13), 2=-357(LC 12) Max Grav 12=1825(LC 2), 2=1911(LC 2)

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

TOP CHORD 2-3=-3612/672, 3-5=-3073/634, 5-6=-2485/585, 6-7=-2173/569, 7-8=-3364/817,

8-9=-3345/734, 9-10=-4029/874, 10-11=-3329/708, 11-12=-3544/766

**BOT CHORD** 2-20=-625/3183, 19-20=-625/3183, 17-19=-443/2694, 16-17=-301/2184, 14-16=-746/4051,

13-14=-522/2947, 12-13=-634/3151 **WEBS** 

3-19=-551/207, 5-19=-49/498, 5-17=-761/274, 6-17=-184/902, 7-17=-334/163,

7-16=-470/1671, 8-16=-315/198, 9-16=-1484/380, 9-14=-698/199, 10-14=-276/1373,

10-13=-30/407, 11-13=-277/163

### NOTES-

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl. GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 19-0-0, Exterior(2E) 19-0-0 to 20-4-0, Exterior(2R) 20-4-0 to 24-10-6, Interior(1) 24-10-6 to 36-4-0, Exterior(2R) 36-4-0 to 40-8-7, Interior(1) 40-8-7 to 45-4-0 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
- 4) Provide adequate drainage to prevent water ponding.
- 5) All plates are MT20 plates unless otherwise indicated.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 12=371, 2=357.



Structural wood sheathing directly applied or 2-9-12 oc purlins.

5-17, 7-17, 7-16, 9-16

Rigid ceiling directly applied or 9-0-15 oc bracing.

1 Row at midpt

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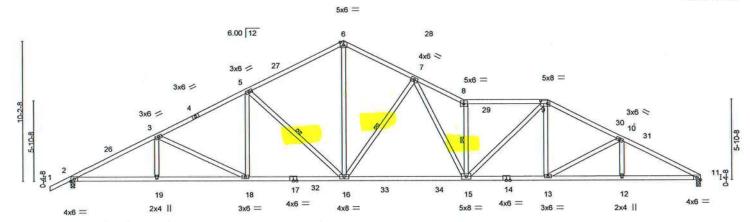
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Job	Truss		Truss Type		Qt	ty Ply	GIEBEIG - LOT	8 CW	
									T27693440
3163304	T15		Roof Special		1		Job Reference (	ontionall	
Builders FirstSource (	Lake City.FL).	Lake City, FL - 32	2055.			8.530 s I	Dec 6 2021 MiTek In	dustries, Inc. Wed Ma	ay 11 14:42:23 2022 Page 1
					ID:MRUpuo	KKMqHFlytM	1PC4d7zYSsJ-3JHo	ErLKLwfG41J1ixAJpb	CDB9YzdDaD23f9AjzHY5U
r1-6-0 <sub>i</sub>	6-2-2	12-8-14	19-8	-0	24-8-13	28-4-0	34-4-0	39-8-1	1 45-4-0
1-6-0	6-2-2	6-6-12	6-11	-2	5-0-13	3-7-3	6-0-0	5-4-1	5-7-15

Scale = 1:80.4



	1	6-2-2	2-8-14	19-8-	0 .	28-4-0			34-4-0		39-8-1		-4-0
	1	6-2-2	6-6-12	6-11-	2	8-8-0			6-0-0		5-4-1	5-7	7-15
Plate Offset	ts (X,Y)-	[9:0-6-0,0-2-8]											
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	I/defl	L/d	PLATES		GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.89	Vert(LL)	-0.48 1	15-16	>999	240	MT20		244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.90	Vert(CT)	-0.82 1	15-16	>660	180			
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.72	Horz(CT)	0.19	11	n/a	n/a			
BCDL	10.0	Code FBC2020/1	TPI2014	Matrix	c-MS	- A - E					Weight: 2	261 lb	FT = 20%

BRACING-

WEBS

TOP CHORD

**BOT CHORD** 

Structural wood sheathing directly applied.

1 Row at midpt

Rigid ceiling directly applied or 7-4-9 oc bracing.

5-16, 7-16, 8-15

LUMBER-

TOP CHORD 2x4 SP No.2

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

14-17: 2x4 SP M 31

WEBS 2x4 SP No.3

REACTIONS.

(size) 11=0-3-8, 2=0-3-8

Max Horz 2=168(LC 12)

Max Uplift 11=-374(LC 13), 2=-362(LC 12) Max Grav 11=1835(LC 2), 2=1914(LC 2)

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

TOP CHORD 2-3=-3619/656, 3-5=-3082/620, 5-6=-2462/567, 6-7=-2437/585, 7-8=-4067/903,

8-9=-3567/767, 9-10=-3163/679, 10-11=-3624/734

BOT CHORD 2-19=-637/3188, 18-19=-637/3188, 16-18=-455/2703, 15-16=-454/2836, 13-15=-472/2789,

12-13=-598/3198, 11-12=-598/3198

3-19=0/251, 3-18=-547/202, 5-18=-48/490, 5-16=-781/291, 6-16=-364/1885,

7-16=-1236/390, 7-15=-392/1726, 8-15=-1981/502, 9-15=-185/1074, 9-13=-60/400,

10-13=-484/188

### NOTES-

WEBS

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 19-8-0, Exterior(2R) 19-8-0 to 24-2-6, Interior(1) 24-2-6 to 34-4-0, Exterior(2R) 34-4-0 to 38-10-6, Interior(1) 38-10-6 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific
  to the use of this truss component.

Provide adequate drainage to prevent water ponding.

5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

- This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 11=374, 2=362.



Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

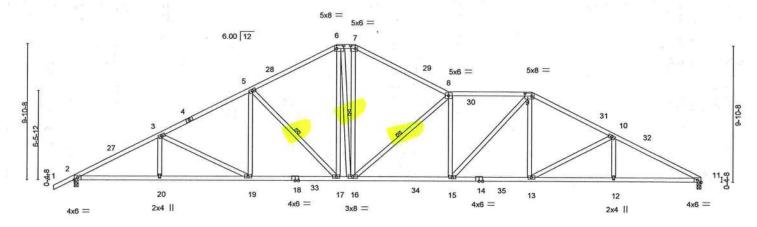
May 12,2022

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 bucking 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/PTI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



Job Truss Type Truss Qty GIEBEIG - LOT 8 CW T27693441 3163304 T16 Roof Special Job Reference (optional) Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.530 s Dec 6 2021 MiTek Industries, Inc. Wed May 11 14:42:25 2022 Page 1 ID:MRUpuoKKMqHFlytM1PC4d7zYSsJ-?hOYfXNatXv\_KLSQpMCnu0HY1yCs58OWWM8GEczHY5S 27-1-8 33-1-8 39-0-11 6-6-12

Scale = 1:80.4



	1		2-8-14	19-0-0	20-4-0	27-1-8		33-1-8			5-4-0
Dista Office	1- 0/ 10		3-6-12	6-3-2	4-4-0	6-9-8		6-0-0		5-11-3	6-3-5
Plate Offse	ets (X,Y)-	[6:0-6-0,0-2-8], [7:0-4-0,0	0-2-8], [9:0-6-0,	0-2-8]							
LOADING	(psf)	SPACING-	2-0-0	CSI.		DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC 0.	93	Vert(LL)	-0.37 15-16	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC 1.	00	Vert(CT)	-0.65 15-16	>840	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB 0.	70	Horz(CT)	0.22 11	n/a	n/a		
BCDL	10.0	Code FBC2020/1	PI2014	Matrix-M	S					Weight: 280 lb	FT = 20%

LUMBER-

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

TOP CHORD BOT CHORD WEBS Structural wood sheathing directly applied.
Rigid ceiling directly applied or 1-4-12 oc bracing.
1 Row at midpt 5-17, 6-16, 8-16

REACTIONS.

(size) 11=0-3-8, 2=0-3-8

Max Horz 2=164(LC 16)

Max Uplift 11=-371(LC 13), 2=-357(LC 12) Max Grav 11=1848(LC 2), 2=1912(LC 2)

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

TOP CHORD 2-3=-3612/679, 3-5=-3080/641, 5-6=-2479/593, 6-7=-2205/579, 7-8=-2516/606,

8-9=-3320/750, 9-10=-3102/676, 10-11=-3629/732

BOT CHORD 2-20=-625/3183, 19-20=-625/3183, 17-19=-451/2701, 16-17=-306/2161, 15-16=-576/3328, 13-15=-454/2727, 12-13=-593/3199, 11-12=-593/3199

3-19=-545/207, 5-19=-50/513, 5-17=-779/275, 6-17=-167/622, 6-16=-166/484,

7-16=-182/874, 8-16=-1522/409, 8-15=-431/166, 9-15=-172/862, 9-13=-67/489,

10-13=-556/218

### NOTES-

WEBS

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

- 2) Wind: ASCE 7-16; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Exterior(2E) -1-6-0 to 3-0-6, Interior(1) 3-0-6 to 19-0-0, Exterior(2E) 19-0-0 to 20-4-0, Exterior(2R) 20-4-0 to 24-10-6, Interior(1) 24-10-6 to 33-1-8, Exterior(2R) 33-1-8 to 37-7-14, Interior(1) 37-7-14 to 45-4-0 zone; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific
  to the use of this truss component.
- Provide adequate drainage to prevent water ponding.
- 5) All plates are 3x6 MT20 unless otherwise indicated.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) \* This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
- 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 11=371, 2=357.



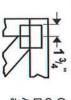
Philip J. O'Regan PE No.58126 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

May 12,2022

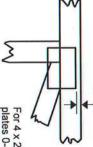


## Symbols

# PLATE LOCATION AND ORIENTATION



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



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

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

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

### PLATE SIZE

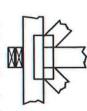
width measured perpendicular to slots. Second dimension is the length parallel to slots. The first dimension is the plate

# LATERAL BRACING LOCATION



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

### BEARING



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

### Industry Standards:

ANSI/TPI1:

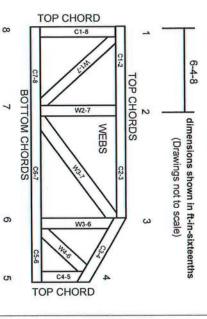
National Design Specification for Metal Design Standard for Bracing. Plate Connected Wood Truss Construction.

DSB-89:

Guide to Good Practice for Handling, Building Component Safety Information

Connected Wood Trusses. Installing & Bracing of Metal Plate

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

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

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

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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

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

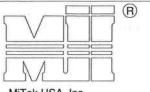
### T-BRACE / I-BRACE DETAIL WITH 2X BRACE ONLY

MII-T-BRACE 2

MiTek USA, Inc. Page 1 of 1

**Brace Size** for One-Ply Truss

Specified Continuous



MiTek USA, Inc.

Note: T-Bracing / I-Bracing to be used when continuous lateral bracing is impractical. T-Brace / I-Brace must cover 90% of web length.

Note: This detail NOT to be used to convert T-Brace / I-Brace webs to continuous lateral braced webs.

Nailing Pattern									
T-Brace size	Nail Size	Nail Spacing							
2x4 or 2x6 or 2x8	10d (0.131" X 3")	6" o.c.							

					Rows of La	iteral Bracing
2x4 or 2x6 or 2x8	10d (0.131" X 3")	6" o.c.		Web Size	- 1	2
Note: Nail along	entire length of T-Br	ace / I-Brace		2x3 or 2x4	2x4 T-Brace	2x4 I-Brace
(On Two	o-Ply's Nail to Both P	lies)		2x6	2x6 T-Brace	2x6 I-Brace
				2x8	2x8 T-Brace	2x8 I-Brace
	Ne Ne	ails			for Two	e Size -Ply Truss Continuous tteral Bracing
\	11 11,1-1	SPACING	n a a	Web Size	1	2
	/ // // //			2x3 or 2x4	2x4 T-Brace	2x4 I-Brace

T-Brace / I-Brace must be same species and grade (or better) as web member.

2x4 I-Brace

2x6 I-Brace

2x8 I-Brace

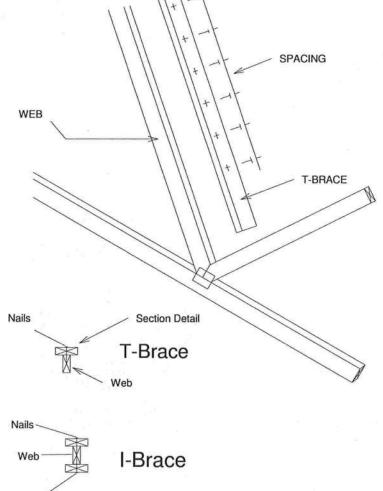
2x4 T-Brace

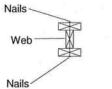
2x6 T-Brace

2x8 T-Brace

2x6

2x8





PARILITY PARILITY 39380

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February 12, 2018

### SCAB-BRACE DETAIL

### MII-SCAB-BRACE

MiTek USA, Inc.

Page 1 of 1

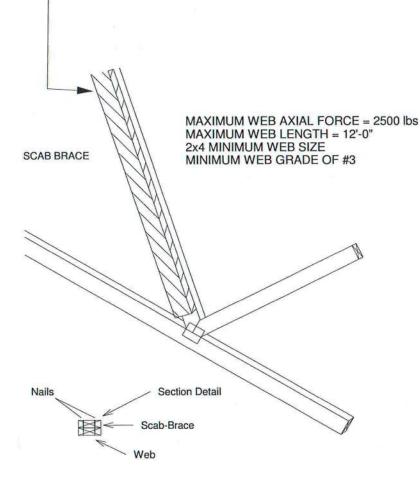


Note: Scab-Bracing to be used when continuous lateral bracing at midpoint (or T-Brace) is impractical.

Scab must cover full length of web +/- 6".

\*\*\* THIS DETAIL IS NOT APLICABLE WHEN BRACING IS \*\*\* REQUIRED AT 1/3 POINTS OR I-BRACE IS SPECIFIED.

APPLY 2x\_\_\_ SCAB TO ONE FACE OF WEB WITH 2 ROWS OF 10d (0.131" X 3") NAILS SPACED 6" O.C. SCAB MUST BE THE SAME GRADE, SIZE AND SPECIES (OR BETTER) AS THE WEB.



Scab-Brace must be same species grade (or better) as web member.



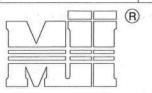
Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

February 12, 2018

### STANDARD REPAIR TO REMOVE END VERTICAL (RIBBON NOTCH VERTICAL)

MII-REP05

MiTek USA, Inc. Page 1 of 1



MiTek USA, Inc. ENGINEERED BY

1. THIS IS A SPECIFIC REPAIR DETAIL TO BE USED ONLY FOR ITS ORIGINAL INTENTION. THIS REPAIR DOES NOT IMPLY THAT THE REMAINING PORTION OF THE TRUSS IS UNDAMAGED. THE ENTIRE TRUSS SHALL BE INSPECTED TO VERIFY THAT NO FURTHER REPAIRS ARE REQUIRED. WHEN THE REQUIRED REPAIRS ARE PROPERLY APPLIED, THE TRUSS WILL BE CAPABLE OF SUPPORTING THE LOADS INDICATED.

2. ALL MEMBERS MUST BE RETURNED TO THEIR ORIGINAL POSITIONS BEFORE APPLYING REPAIR AND HELD IN PLACE DURING APPLICATION OF REPAIR.

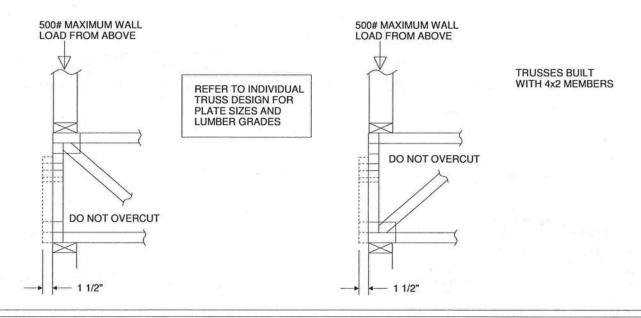
AFFETTING REPAIR AND RELD IN FLACE DURING AFFECTATION OF REPAIR.

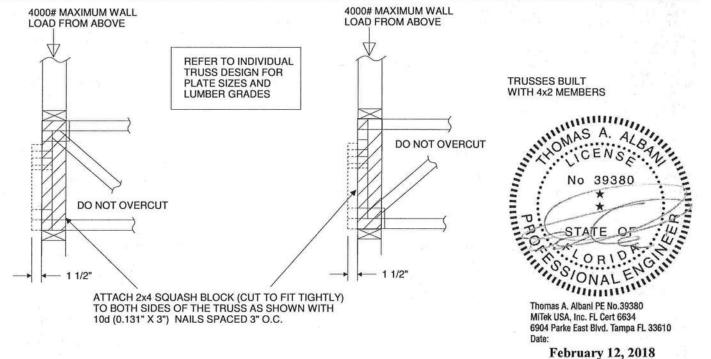
3. THE END DISTANCE, EDGE DISTANCE, AND SPACING OF NAILS SHALL BE SUCH AS TO AVOID SPLITTING OF THE WOOD.

4. LUMBER MUST BE CUT CLEANLY AND ACCURATELY AND THE REMAINING WOOD MUST BE UNDAMAGED.

5. THIS REPAIR IS TO BE USED FOR SINGLE PLY TRUSSES IN THE 4X\_ORIENTATION ONLY.

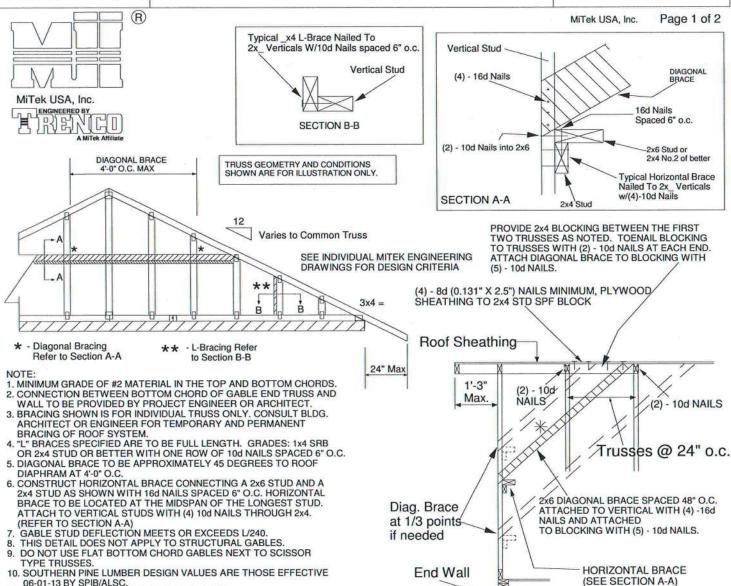
6. CONNECTOR PLATES MUST BE FULLY IMBEDDED AND UNDISTURBED.





### Standard Gable End Detail

### MII-GE130-D-SP



TYPE TRUSSES.
TTE THUSSES.
10. SOUTHERN PINE LUMBER DESIGN VALUES ARE THOSE EFFECTIVE
10. SOUTHERINT INC LOWDER DESIGN VALUES AND THOSE DITECTIVE
06-01-13 BY SPIB/ALSC.

11. NAILS DESIGNATED 10d ARE (0.131" X 3") AND NAILS DESIGNATED 16d ARE (0.131" X 3.5")

Minimum Stud Size	Stud Spacing	Without Brace	1x4 L-Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade			Maximu	m Stud Le	ngth	
2x4 SP No. 3 / Stud	12" O.C.	3-9-13	4-1-1	5-9-6	7-1-3	11-5-7
2x4 SP No. 3 / Stud	16" O.C.	3-5-4	3-6-8	5-0-2	6-10-8	10-3-13
2x4 SP No. 3 / Stud	24" O.C.	2-9-11	2-10-11	4-1-1	5-7-6	8-5-1

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of diagonal brace with 10d nails 8" o.c., with 3" minimum end distance. Brace must cover 90% of diagonal length.

MAX MEAN ROOF HEIGHT = 30 FEET CATEGORY II BUILDING EXPOSURE D ASCE 7-98, ASCE 7-02, ASCE 7-05 130 MPH ASCE 7-10 160 MPH **DURATION OF LOAD INCREASE: 1.60** 

STUD DESIGN IS BASED ON COMPONENTS AND CLADDING. CONNECTION OF BRACING IS BASED ON MWFRS.



Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

February 12, 2018

### Standard Gable End Detail

### MII-GE130-SP

Page 1 of 2

(2) - 10d NAILS

Trusses @ 24" o.c.

2x6 DIAGONAL BRACE SPACED 48" O.C.

ATTACHED TO VERTICAL WITH (4) -16d NAILS AND ATTACHED

HORIZONTAL BRACE

(SEE SECTION A-A)

TO BLOCKING WITH (5) - 10d NAILS.

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MiTek USA, Inc. ENGINEERED BY 

DIAGONAL BRACE

4'-0" O.C. MAX

Typical \_x4 L-Brace Nailed To Verticals W/10d Nails spaced 6" o.c. Vertical Stud SECTION B-B

TRUSS GEOMETRY AND CONDITIONS SHOWN ARE FOR ILLUSTRATION ONLY. Varies to Common Truss SEE INDIVIDUAL MITEK ENGINEERING DRAWINGS FOR DESIGN CRITERIA

3x4 =

24" Max

Diag. Brace

at 1/3 points

End Wall

if needed

Vertical Stud DIAGONAL (4) - 16d Nails 16d Nails Spaced 6" o.c. (2) - 10d Nails into 2x6 2x6 Stud or 2x4 No.2 of better Typical Horizontal Brace Nailed To 2x\_ Verticals w/(4)-10d Nails SECTION A-A

> PROVIDE 2x4 BLOCKING BETWEEN THE FIRST TWO TRUSSES AS NOTED. TOENAIL BLOCKING TO TRUSSES WITH (2) - 10d NAILS AT EACH END. ATTACH DIAGONAL BRACE TO BLOCKING WITH (5) - 10d NAILS.

SHEATHING TO 2x4 STD SPF BLOCK

Roof Sheathing

1'-3"

Max.

(4) - 8d (0.131" X2.5") NAILS MINIMUM, PLYWOOD

(2) - 10d

NAILS

- Diagonal Bracing Refer to Section A-A

L-Bracing Refer to Section B-B

- 1. MINIMUM GRADE OF #2 MATERIAL IN THE TOP AND BOTTOM CHORDS. CONNECTION BETWEEN BOTTOM CHORD OF GABLE END TRUSS AND WALL TO BE PROVIDED BY PROJECT ENGINEER OR ARCHITECT.
   BRACING SHOWN IS FOR INDIVIDUAL TRUSS ONLY. CONSULT BLDG.
- ARCHITECT OR ENGINEER FOR TEMPORARY AND PERMANENT BRACING OF ROOF SYSTEM.
- "L" BRACES SPECIFIED ARE TO BE FULL LENGTH. GRADES: 1x4 SRB OR 2x4 STUD OR BETTER WITH ONE ROW OF 10d NAILS SPACED 6" O.C. 5. DIAGONAL BRACE TO BE APPROXIMATELY 45 DEGREES TO ROOF
- DIAPHRAM AT 4'-0" O.C.
- 6. CONSTRUCT HORIZONTAL BRACE CONNECTING A 2x6 STUD AND A 2x4 STUD AS SHOWN WITH 16d NAILS SPACED 6" O.C. HORIZONTAL BRACE TO BE LOCATED AT THE MIDSPAN OF THE LONGEST STUD. ATTACH TO VERTICAL STUDS WITH (4) 10d NAILS THROUGH 2x4.
- (REFER TO SECTION A-A)
  7. GABLE STUD DEFLECTION MEETS OR EXCEEDS L/240.
  8. THIS DETAIL DOES NOT APPLY TO STRUCTURAL GABLES.
- DO NOT USE FLAT BOTTOM CHORD GABLES NEXT TO SCISSOR TYPE TRUSSES
- SOUTHERN PINE LUMBER DESIGN VALUES ARE THOSE EFFECTIVE
- 06-01-13 BY SPIB/ALSC.

  11. NAILS DESIGNATED 10d ARE (0.131" X 3") AND NAILS DESIGNATED 16d ARE (0.131" X 3.5")

Minimum Stud Size	Stud Spacing	Without Brace	1x4 L-Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade	1. 1		Maximur	n Stud Lei	ngth	<b>BRACES AT</b>
2x4 SP No. 3 / Stud	12" O.C.	4-0-7	4-5-6	6-3-8	8-0-15	12-1-6
2x4 SP No. 3 / Stud	16" O.C.	3-8-0	3-10-4	5-5-6	7-4-1	11-0-1
2x4 SP No. 3 / Stud	24" O.C.	3-0-10	3-1-12	4-5-6	6-1-5	9-1-15

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of diagonal brace with 10d nails 8" o.c., with 3" minimum end distance. Brace must cover 90% of diagonal length.

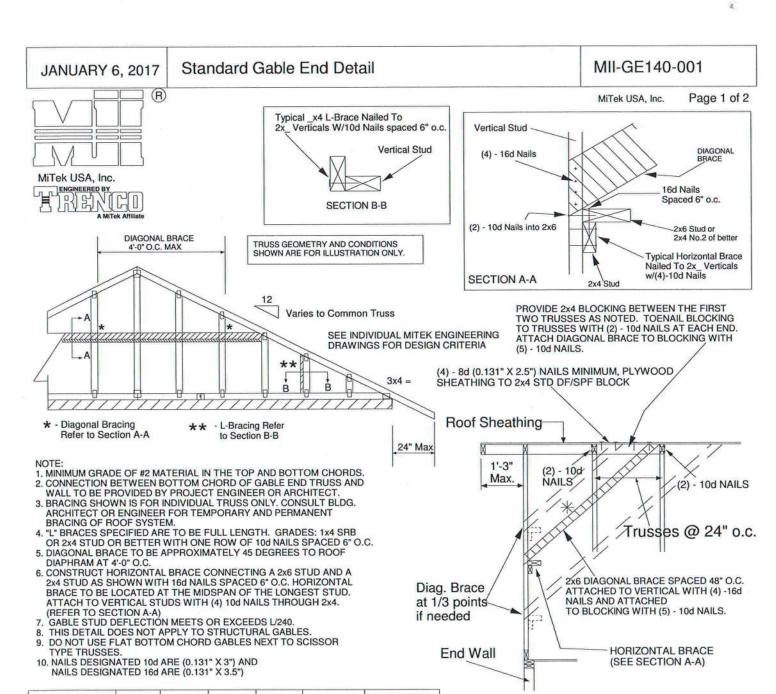
MAX MEAN ROOF HEIGHT = 30 FEET CATEGORY II BUILDING EXPOSURE B or C ASCE 7-98, ASCE 7-02, ASCE 7-05 130 MPH ASCE 7-10 160 MPH DURATION OF LOAD INCREASE: 1.60

STUD DESIGN IS BASED ON COMPONENTS AND CLADDING. CONNECTION OF BRACING IS BASED ON MWFRS.



Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

February 12, 2018



Minimum Stud Size	Stud Spacing	Without Brace	1x4 L-Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade			Maximu	n Stud Lei	ngth	
2x4 DF/SPF Std/Stud	12" O.C.	3-10-1	3-11-7	5-7-2	7-8-2	11-6-4
2x4 DF/SPF Std/Stud	16" O.C.	3-3-14	3-5-1	4-10-2	6-7-13	9-11-11
2x4 DF/SPF Std/Stud	24" O.C.	2-8-9	2-9-8	3-11-7	5-5-2	8-1-12

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of web with 10d nails 8" o.c., with 3" minimum end distance. Brace must cover 90% of diagonal length.

MAXIMUM WIND SPEED = 140 MPH MAX MEAN ROOF HEIGHT = 30 FEET CATEGORY II BUILDING EXPOSURE B or C ASCE 7-98, ASCE 7-02, ASCE 7-05 DURATION OF LOAD INCREASE: 1.60

STUD DESIGN IS BASED ON COMPONENTS AND CLADDING. CONNECTION OF BRACING IS BASED ON MWFRS.

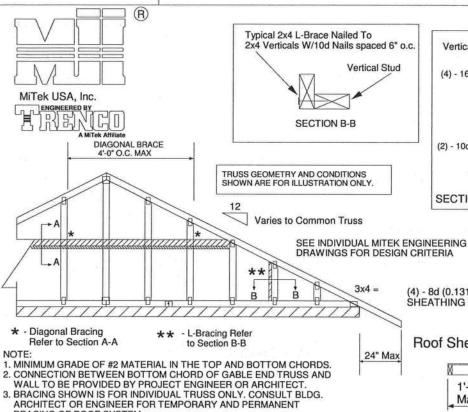


Thomas A. Albani PE No.39380 MITek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

January 19, 2018

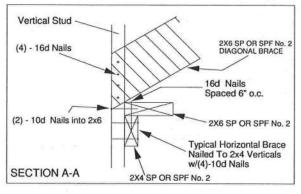
### Standard Gable End Detail

MII-GE170-D-SP



MiTek USA, Inc.

Page 1 of 2



PROVIDE 2x4 BLOCKING BETWEEN THE FIRST TWO TRUSSES AS NOTED. TOENAIL BLOCKING TO TRUSSES WITH (2) - 10d NAILS AT EACH END. ATTACH DIAGONAL BRACE TO BLOCKING WITH (5) - 10d NAILS.

(4) - 8d (0.131" X 2.5") NAILS MINIMUM, PLYWOOD SHEATHING TO 2x4 STD SPF BLOCK

Roof Sheathing

1'-0"

10d Max. NAILS

Diag. Brace

at 1/3 points if needed

End Wall

2x6 DIAGONAL BRACE SPACED 48" O.C. ATTACHED TO VERTICAL WITH (4) -16d NAILS, AND ATTACHED TO

(2) - 10d NAILS

Trusses @ 24" o.c.

BLOCKING WITH (5) -10d NAILS.

HORIZONTAL BRACE (SEE SECTION A-A)

ATTACH TO VERTICAL GABLE STUDS WITH (4) 10d NAILS THROUGH 2x4.

6. CONSTRUCT HORIZONTAL BRACE CONNECTING A 2x6 AND A 2x4 AS SHOWN WITH 16d NAILS SPACED 6" O.C. HORIZONTAL

(REFER TO SECTION A-A)
GABLE STUD DEFLECTION MEETS OR EXCEEDS L/240.
THIS DETAIL DOES NOT APPLY TO STRUCTURAL GABLES.
DO NOT USE FLAT BOTTOM CHORD GABLES NEXT TO SCISSOR

"L" BRACES SPECIFIED ARE TO BE FULL LENGTH, SPF or SP No.3 OR BETTER WITH ONE ROW OF 10d NAILS SPACED 6" O.C.
5. DIAGONAL BRACE TO BE APPROXIMATELY 45 DEGREES TO ROOF DIAPHRAM AT 4'-0" O.C.

BRACE TO BE LOCATED AT THE MIDSPAN OF THE LONGEST GABLE STUD.

TYPE TRUSSES. 10. SOUTHERN PINE LUMBER DESIGN VALUES ARE THOSE EFFECTIVE

06-01-13 BY SPIB/ALSC.

NAILS DESIGNATED 10d ARE (0.131" X 3") AND NAILS DESIGNATED 16d ARE (0.131" X 3.5")

BRACING OF ROOF SYSTEM.

Minimum Stud Size	Stud Spacing	Without Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade	4 - 6		Maximum St	ud Length	
2x4 SP No. 3 / Stud	12" O.C.	3-9-7	5-8-8	6-11-1	11-4-4
2x4 SP No. 3 / Stud	16" O.C.	3-4-12	4-11-15	6-9-8	10-2-3
2x4 SP No. 3 / Stud	24" O.C.	2-9-4	4-0-7	5-6-8	8-3-13
2x4 SP No. 2	12" O.C.	3-11-13	5-8-8	6-11-1	11-11-7
2x4 SP No. 2	16" O.C.	3-7-7	4-11-5	6-11-1	10-10-5
2x4 SP No. 2	24" O.C.	3-1-15	4-0-7	6-3-14	9-5-14

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of diagonal brace with 10d nails 6" o.c., with 3" minimum end distance. Brace must cover 90% of diagonal length. T or I braces must be 2x4 SPF No. 2 or SP No. 2.

MAX MEAN ROOF HEIGHT = 30 FEET EXPOSURE D

ASCE 7-10 170 MPH

DURATION OF LOAD INCREASE: 1.60

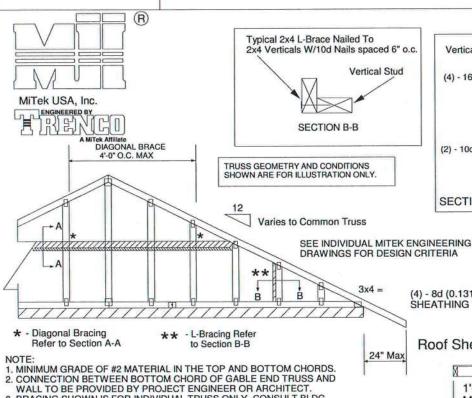
STUD DESIGN IS BASED ON COMPONENTS AND CLADDING CONNECTION OF BRACING IS BASED ON MWFRS.



Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

### Standard Gable End Detail

### MII-GE180-D-SP



MiTek USA, Inc. Page 1 of 2 Vertical Stud 2X6 SP OR SPF No. 2 DIAGONAL BRACE (4) - 16d Nails 16d Nails Spaced 6" o.c. (2) - 10d Nails into 2x6 2X6 SP OR SPF No. 2 Typical Horizontal Brace Nailed To 2x4 Verticals w/(4)-10d Nails **SECTION A-A** 2X4 SP OR SPF No. 2

> PROVIDE 2x4 BLOCKING BETWEEN THE FIRST TWO TRUSSES AS NOTED. TOENAIL BLOCKING TO TRUSSES WITH (2) - 10d NAILS AT EACH END. ATTACH DIAGONAL BRACE TO BLOCKING WITH (5) - 10d NAILS.

(4) - 8d (0.131" X 2.5") NAILS MINIMUM, PLYWOOD, SHEATHING TO 2x4 STD SPF BLOCK

- 10d

NAILS

Roof Sheathing

1'-0"

Max.

Diag. Brace

at 1/3 points

End Wall

if needed

3. BRACING SHOWN IS FOR INDIVIDUAL TRUSS ONLY. CONSULT BLDG. ARCHITECT OR ENGINEER FOR TEMPORARY AND PERMANENT

BRACING OF ROOF SYSTEM.

4. "L" BRACES SPECIFIED ARE TO BE FULL LENGTH, SPF or SP No.3
OR BETTER WITH ONE ROW OF 10d NAILS SPACED 6" O.C.

5. DIAGONAL BRACE TO BE APPROXIMATELY 45 DEGREES TO ROOF

DIAPHRAM AT 4'-0" O.C.

CONSTRUCT HORIZONTAL BRACE CONNECTING A 2x6 AND A 2x4 AS SHOWN WITH 16d NAILS SPACED 6" O.C. HORIZONTAL BRACE TO BE LOCATED AT THE MIDSPAN OF THE LONGEST GABLE STUD. ATTACH TO VERTICAL GABLE STUDS WITH (4) 10d NAILS THROUGH 2x4. (REFER TO SECTION A-A)

GABLE STUD DEFLECTION MEETS OR EXCEEDS L/240. THIS DETAIL DOES NOT APPLY TO STRUCTURAL GABLES.

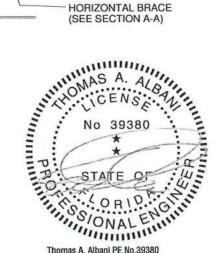
9. DO NOT USE TYPE TRUSSE 10. SOUTHERN F 06-01-13 BY S	ES. PINE LUMB	ER DESIGN	GABLES NEXT		
11. NAILS DESIGNAILS DESIGNAILS DESIGNAILS	NATED 100	ARE (0.131"			
Minimum Stud Size	Stud Spacing	Without Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade			Maximum St	ud Length	
2x4 SP No. 3 / Stud	12" O.C.	3-7-12	5-4-11	6-2-1	10-11-3
Lancas areas and a second and a second and a second		000			

Stud Size	Spacing	Brace	L-Brace	BRACE	1/3 POINTS
Species and Grade			Maximum St	ud Length	
2x4 SP No. 3 / Stud	12" O.C.	3-7-12	5-4-11	6-2-1	10-11-3
2x4 SP No. 3 / Stud	16" O.C.	3-2-8	4-8-1	6-2-1	9-7-7
2x4 SP No. 3 / Stud	24" O.C.	2-7-7	3-9-12	5-2-13	7-10-4
2x4 SP No. 2	12" O.C.	3-10-0	5-4-11	6-2-1	11-6-1
2x4 SP No. 2	16" O.C.	3-5-13	4-8-1	6-2-1	10-5-7
2x4 SP No. 2	24" O.C.	3-0-8	3-9-12	6-1-1	9-1-9

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of diagonal brace with 10d nails 6in o.c., with 3in minimum end distance. Brace must cover 90% of diagonal length. T or I braces must be 2x4 SPF No. 2 or SP No. 2.

MAX MEAN ROOF HEIGHT = 30 FEET EXPOSURE D ASCE 7-10 180 MPH **DURATION OF LOAD INCREASE: 1.60** 

STUD DESIGN IS BASED ON COMPONENTS AND CLADDING. CONNECTION OF BRACING IS BASED ON MWFRS.



2x6 DIAGONAL BRACE SPACED 48" O.C. ATTACHED TO VERTICAL WITH
(4) -16d NAILS, AND ATTACHED TO

BLOCKING WITH (5) -10d NAILS.

(2) - 10d NAILS

Trusses @ 24" o.c.

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MiTek USA, Inc. Page 1 of 1

(R)

MiTek USA, Inc.

MAXIMUM WIND SPEED = REFER TO NOTES D AND OR E MAX MEAN ROOF HEIGHT = 30 FEET MAX TRUSS SPACING = 24 " O.C. CATEGORY II BUILDING EXPOSURE B or C

**ASCE 7-10** 

**DURATION OF LOAD INCREASE: 1.60** 

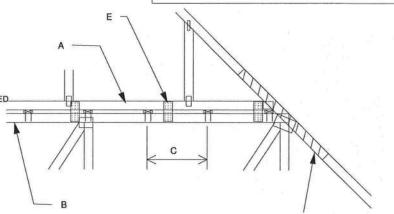
DETAIL IS NOT APPLICABLE FOR TRUSSES TRANSFERING DRAG LOADS (SHEAR TRUSSES). ADDITIONAL CONSIDERATIONS BY BUILDING ENGINEER/DESIGNER ARE REQUIRED.

- A PIGGBACK TRUSS, REFER TO MITEK TRUSS DESIGN DRAWING. SHALL BE CONNECTED TO EACH PURLIN WITH (2) (0.131° X.3.5") TOE-NAILED. B BASE TRUSS, REFER TO MITEK TRUSS DESIGN DRAWING.
- BASE TRUSS, REFER TO MITEK TRUSS DESIGN DRAWING.
   PURLINS AT EACH BASE TRUSS JOINT AND A MAXIMUM 24" O.C.
  UNLESS SPECIFIED CLOSER ON MITEK TRUSS DESIGN DRAWING.
  CONNECT TO BASE TRUSS WITH (2) (0.131" X 3.5") NAILS EACH.
   2 X \_ X 4"-0" SCAB, SIZE TO MATCH TOP CHORD OF
  PIGGYBACK TRUSS, MIN GRADE #2, ATTACHED TO ONE FACE, CENTERED.
  ON INTERSECTION, WITH (2) ROWS OF (0.131" X 3") NAILS @ 4" O.C.
  SCAB MAY BE OMITTED PROVIDED THE TOP CHORD SHEATHING
  IS CONTINUOUS OVER INTERSECTION AT LEAST 1 FT. IN BOTH
  - DIRECTIONS AND:

    1. WIND SPEED OF 115 MPH OR LESS FOR ANY PIGGYBACK SPAN, OR

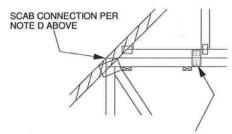
    2. WIND SPEED OF 116 MPH TO 160 MPH WITH A MAXIMUM
    PIGGYBACK SPAN OF 12 It.
- PIGGYBACK SPAN OF 12 II.

  E FOR WIND SPEEDS BETWEEN 126 AND 160 MPH, ATTACH
  MITEK 3X8 20 GA Nail-On PLATES TO EACH FACE OF TRUSSES AT
  72° O.C. W/ (4) (0.131° X 1.5") NAILS PER MEMBER. STAGGER NAILS
  FROM OPPOSING FACES. ENSURE 0.5" EDGE DISTANCE.
  (MIN. 2 PAIRS OF PLATES REQ. REGARDLESS OF SPAN)

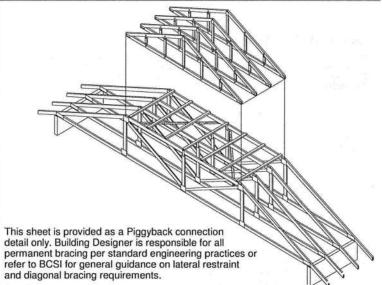


#### WHEN NO GAP BETWEEN PIGGYBACK AND BASE TRUSS EXISTS:

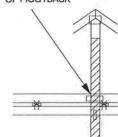
REPLACE TOE NAILING OF PIGGYBACK TRUSS TO PURLINS WITH Nail-On PLATES AS SHOWN, AND INSTALL PURLINS TO BOTTOM EDGE OF BASE TRUSS TOP CHORD AT SPECIFIED SPACING SHOWN ON BASE TRUSS MITEK DESIGN DRAWING.



FOR ALL WIND SPEEDS, ATTACH MITEK 3X6 20 GA Nail-On PLATES TO EACH FACE OF TRUSSES AT 48" O.C. W/ (4) (0.131" X 1.5") PER MEMBER. STAGGER NAILS FROM OPPOSING FACES ENSURE 0.5" EDGE DISTANCE.



VERTICAL WEB TO EXTEND THROUGH BOTTOM CHORD OF PIGGYBACK



#### FOR LARGE CONCENTRATED LOADS APPLIED TO CAP TRUSS REQUIRING A VERTICAL WEB:

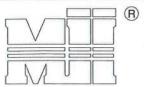
- 1) VERTICAL WEBS OF PIGGYBACK AND BASE TRUSS MUST MATCH IN SIZE, GRADE, AND MUST LINE UP
- MUST MATCH IN SIZE, GRADE, AND MUST LINE UP
  AS SHOWN IN DETAIL.
  ATTACH 2 x \_\_\_ x 4'-0" SCAB TO EACH FACE OF
  TRUSS ASSEMBLY WITH 2 ROWS OF 10d (0.131" X 3") NAILS
  SPACED 4" O.C. FROM EACH FACE. (SIZE AND GRADE TO MATCH
  VERTICAL WEBS OF PIGGYBACK AND BASE TRUSS.)
  (MINIMUM 2X4)
  THIS CONNECTION IS ONLY VALUE FOR A MAXIMUM
  CONSENTED TO LARD OF 4000 LPS (401.45). PENJEW
- CONCENTRATED LOAD OF 4000 LBS (@1.15). REVIEW BY A QUALIFIED ENGINEER IS REQUIRED FOR LOADS GREATER THAN 4000 LBS.
- FOR PIGGYBACK TRUSSES CARRYING GIRDER LOADS, NUMBER OF PLYS OF PIGGYBACK TRUSS TO MATCH BASE TRUSS. CONCENTRATED LOAD MUST BE APPLIED TO BOTH
- THE PIGGYBACK AND THE BASE TRUSS DESIGN.



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#### STANDARD PIGGYBACK TRUSS CONNECTION DETAIL

### MII-PIGGY-ALT 7-10



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A - PIGGBACK TRUSS, REFER TO MITEK TRUSS DESIGN DRAWING.
SHALL BE CONNECTED TO EACH PURLIN
WITH (2) 0(0.131\* X 3.5") TOE-NAILED.
B - BASE TRUSS, REFER TO MITEK TRUSS DESIGN DRAWING.
C - PURLINS AT EACH BASE TRUSS JOINT AND A MAXIMUM 24\* O.C.
UNLESS SPECIFIED CLOSER ON MITEK TRUSS DESIGN DRAWING.
CONNECT TO BASE TRUSS WITH (2) (0.131\* X 3.5") NAILS EACH.
D - 2 X \_ X 4\*0\* SCAB, SIZE TO MATCH TOP CHORD OF
PIGGYBACK TRUSS, MIN GRADE #2, ATTACHED TO ONE FACE, CENTERED ON
INTERSECTION, WITH (2) ROWS OF (0.131\* X 3.3") NAILS @ 4\* O.C.
SCAB MAY BE OMITTED PROVIDED THE TOP CHORD SHEATHING
IS CONTINUOUS OVER INTERSECTION AT LEAST 1 FT. IN BOTH IS CONTINUOUS OVER INTERSECTION AT LEAST 1 FT. IN BOTH DIRECTIONS AND:

1. WIND SPEED OF 115 MPH OR LESS FOR ANY PIGGYBACK SPAN, OR 2. WIND SPEED OF 116 MPH TO 160 MPH WITH A MAXIMUM

2. WIND SPEED OF 110 MPH TO 160 MPH WITH A MAXI PIGGYBACK SPAN OF 12 ft. E - FOR WIND SPEED IN THE RANGE 126 MPH - 160 MPH ADD 9" x 9" x 1/2" PLYWOOD (or 7/16" OSB) GUSSET EACH SIDE AT 48" O.C. OR LESS. ATTACH WITH 3 - 6d (0.113" X 2") NAILS INTO EACH CHORD FROM EACH SIDE (TOTAL - 12 NAILS)

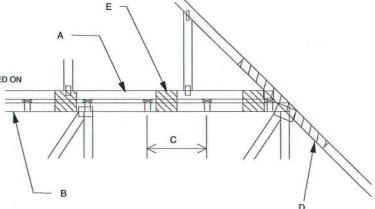


MAXIMUM WIND SPEED = REFER TO NOTES D AND OR E MAX MEAN ROOF HEIGHT = 30 FEET MAX TRUSS SPACING = 24 " O.C. CATEGORY II BUILDING EXPOSURE B or C ASCE 7-10

**DURATION OF LOAD INCREASE: 1.60** 

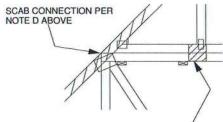
DETAIL IS NOT APPLICABLE FOR TRUSSES TRANSFERING DRAG LOADS (SHEAR TRUSSES). ADDITIONAL CONSIDERATIONS BY BUILDING

ENGINEER/DESIGNER ARE REQUIRED.



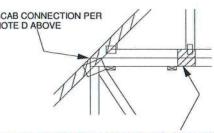
#### WHEN NO GAP BETWEEN PIGGYBACK AND BASE TRUSS EXISTS:

REPLACE TOE NAILING OF PIGGYBACK TRUSS TO PURLINS WITH PLYWOOD GUSSETS AS SHOWN, AND INSTALL PURLINS TO BOTTOM EDGE OF BASE TRUSS TOP CHORD AT SPECIFIED SPACING SHOWN ON BASE TRUSS MITEK DESIGN DRAWING.

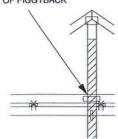


7" x 7" x 1/2" PLYWOOD (or 7/16" OSB) GUSSET EACH SIDE AT 24" O.C. ATTACH WITH 3 - 6d (0.113" X 2") NAILS INTO EACH CHORD FROM EACH SIDE (TOTAL - 12 NAILS)

This sheet is provided as a Piggyback connection detail only. Building Designer is responsible for all permanent bracing per standard engineering practices or refer to BCSI for general guidance on lateral restraint and diagonal bracing requirements.



VERTICAL WEB TO EXTEND THROUGH **BOTTOM CHORD** OF PIGGYBACK



#### FOR LARGE CONCENTRATED LOADS APPLIED TO CAP TRUSS REQUIRING A VERTICAL WEB:

VERTICAL WEBS OF PIGGYBACK AND BASE TRUSS MUST MATCH IN SIZE, GRADE, AND MUST LINE UP

AS SHOWN IN DETAIL.

ATTACH 2 x x 4'-0" SCAB TO EACH FACE OF
TRUSS ASSEMBLY WITH 2 ROWS OF 10d (0.131" X 3") NAILS
SPACED 4" O.C. FROM EACH FACE. (SIZE AND GRADE TO MATCH
VERTICAL WEBS OF PIGGYBACK AND BASE TRUSS.)

(MINIMUM 2X4)
THIS CONNECTION IS ONLY VALID FOR A MAXIMUM
CONCENTRATED LOAD OF 4000 LBS (@1.15). REVIEW
BY A QUALIFIED ENGINEER IS REQUIRED FOR LOADS

GREATER THAN 4000 LBS. FOR PIGGYBACK TRUSSES CARRYING GIRDER LOADS. NUMBER OF PLYS OF PIGGYBACK TRUSS TO MATCH BASE TRUSS. CONCENTRATED LOAD MUST BE APPLIED TO BOTH THE PIGGYBACK AND THE BASE TRUSS DESIGN.



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#### STANDARD REPAIR DETAIL FOR BROKEN CHORDS, WEBS AND DAMAGED OR MISSING CHORD SPLICE PLATES

### MII-REP01A1

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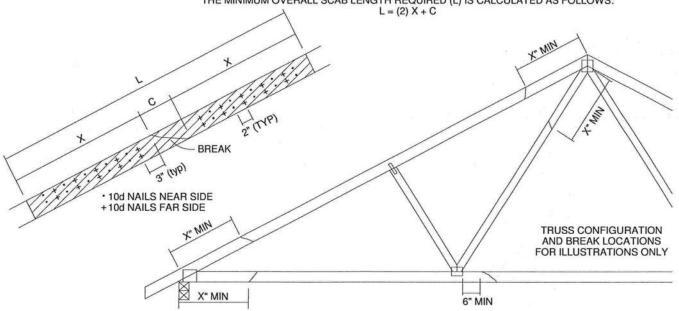


	JMBER OF			MAX	IMUM FO	RCE (lbs)	15% LOA	D DURAT	ION	
	ACH SIDE REAK *	X	S	Р	С	)F	S	PF	Н	IF
2x4	2x6		2x4	2x6	2x4	2x6	2x4	2x6	2x4	2x6
20	30	24"	1706	2559	1561	2342	1320	1980	1352	2028
26	39	30"	2194	3291	2007	3011	1697	2546	1738	2608
32	48	36"	2681	4022	2454	3681	2074	3111	2125	3187
38	57	42"	3169	4754	2900	4350	2451	3677	2511	3767
44	66	48"	3657	5485	3346	5019	2829	4243	2898	4347

\* DIVIDE EQUALLY FRONT AND BACK

ATTACH 2x\_ SCAB OF THE SAME SIZE AND GRADE AS THE BROKEN MEMBER TO EACH FACE OF THE TRUSS (CENTER ON BREAK OR SPLICE) WITH 10d (0.131" X 3") NAILS (TWO ROWS FOR 2x4, THREE ROWS FOR 2x6) SPACED 4" O.C. AS SHOWN. STAGGER NAIL SPACING FROM FRONT FACE AND BACK FACE FOR A NET 0-2-0 O.C. SPACING IN THE MAIN MEMBER. USE A MIN. 0-3-0 MEMBER END DISTANCE.

THE LENGTH OF THE BREAK (C) SHALL NOT EXCEED 12". (C=PLATE LENGTH FOR SPLICE REPAIRS) THE MINIMUM OVERALL SCAB LENGTH REQUIRED (L) IS CALCULATED AS FOLLOWS:



THE LOCATION OF THE BREAK MUST BE GREATER THAN OR EQUAL TO THE REQUIRED X DIMENSION FROM ANY PERIMETER BREAK OR HEEL JOINT AND A MINIMUM OF 6" FROM ANY INTERIOR JOINT (SEE SKETCH ABOVE)

#### DO NOT USE REPAIR FOR JOINT SPLICES

- THIS REPAIR DETAIL IS TO BE USED ONLY FOR THE APPLICATION SHOWN. THIS REPAIR DOES NOT IMPLY THAT THE REMAINING PORTION OF THE TRUSS IS UNDAMAGED. THE ENTIRE TRUSS SHALL BE INSPECTED TO VERIFY THAT NO FURTHER REPAIRS ARE REQUIRED. WHEN THE REQUIRED REPAIRS ARE PROPERLY APPLIED, THE TRUSS WILL BE CAPABLE OF SUPPORTING THE LOADS INDICATED.

  2. ALL MEMBERS MUST BE RETURNED TO THEIR ORIGINAL POSITIONS BEFORE APPLING REPAIR
- AND HELD IN PLACE DURING APPLICATION OF REPAIR.
- THE END DISTANCE, EDGE DISTANCE AND SPACING OF NAILS SHALL BE SUCH AS TO AVOID UNUSUAL SPLITTING OF THE WOOD.
- WHEN NAILING THE SCABS, THE USE OF A BACKUP WEIGHT IS RECOMMENDED TO AVOID
- LOOSENING OF THE CONNECTOR PLATES AT THE JOINTS OR SPLICES.

  5. THIS REPAIR IS TO BE USED FOR SINGLE PLY TRUSSES IN THE 2x\_ ORIENTATION ONLY.

  6. THIS REPAIR IS LIMITED TO TRUSSES WITH NO MORE THAN THREE BROKEN MEMBERS.



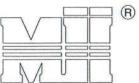
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### LATERAL TOE-NAIL DETAIL

MII-TOENAIL\_SP

MiTek USA, Inc.

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NOTES

- 1. TOE-NAILS SHALL BE DRIVEN AT AN ANGLE OF 45 DEGREES WITH THE MEMBER AND MUST HAVE FULL WOOD SUPPORT. (NAIL MUST BE DRIVEN THROUGH AND EXIT AT THE BACK CORNER OF THE MEMBER END AS SHOWN.
- THE END DISTANCE, EDGE DISTANCE, AND SPACING OF NAILS SHALL BE SUCH AS TO AVOID UNUSUAL SPLITTING OF THE WOOD.
- ALLOWABLE VALUE SHALL BE THE LESSER VALUE OF THE TWO SPECIES FOR MEMBERS OF DIFFERENT SPECIES.

# THIS DETAIL APPLICABLE TO THE THREE END DETAILS SHOWN BELOW

VIEWS SHOWN ARE FOR ILLUSTRATION PURPOSES ONLY

SIDE VIEW (2x3) 2 NAILS

NEAR SIDE

	DIAM.	SP	DF	HF	SPF	SPF-S
O	.131	88.0	80.6	69.9	68.4	59.7
LONG	.135	93.5	85.6	74.2	72.6	63.4
3.5"	.162	108.8	99.6	86.4	84.5	73.8
9	.128	74.2	67.9	58.9	57.6	50.3
LONG	.131	75.9	69.5	60.3	59.0	51.1
3.25"	.148	81.4	74.5	64.6	63.2	52.5

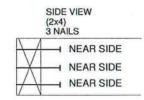
VALUES SHOWN ARE CAPACITY PER TOE-NAIL. APPLICABLE DURATION OF LOAD INCREASES MAY BE APPLIED.

#### EXAMPLE:

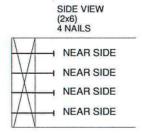
(3) - 16d (0.162" X 3.5") NAILS WITH SPF SPECIES BOTTOM CHORD

For load duration increase of 1.15:

3 (nails) X 84.5 (lb/nail) X 1.15 (DOL) = 291.5 lb Maximum Capacity

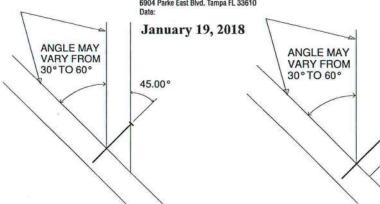


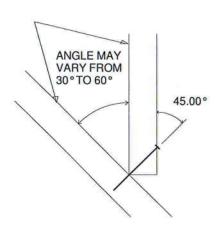
45.00°





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### TRUSSED VALLEY SET DETAIL

MII-VALLEY HIGH WIND1

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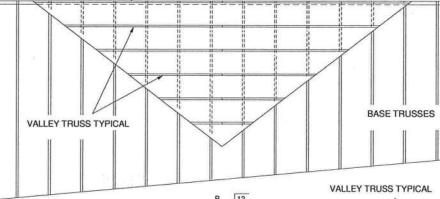


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GABLE END, COMMON TRUSS OR GIRDER TRUSS

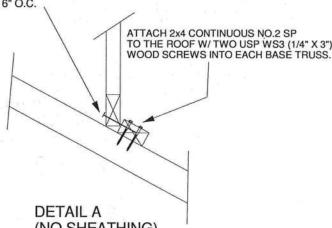
#### GENERAL SPECIFICATIONS

- 1. NAIL SIZE 10d (0.131" X 3")
  2. WOOD SCREW = 3" WS3 USP OR EQUIVALENT DO NOT USE DRYWALL OR DECKING TYPE SCREW
- 3. INSTALL VALLEY TRUSSES (24" O.C. MAXIMUM) AND SECURE PER DETAIL A
- 4. BRACE VALLEY WEBS IN ACCORDANCE WITH THE INDIVIDUAL DESIGN DRAWINGS.
- 5. BASE TRUSS SHALL BE DESIGNED WITH A PURLIN SPACING EQUILIVANT TO THE RAKE DIMENSION OF THE VALLEY TRUSS SPACING.
- 6. NAILING DONE PER NDS 01
- 7. VALLEY STUD SPACING NOT TO EXCEED 48" O.C.



GABLE END, COMMON TRUSS OR GIRDER TRUSS 12 SEE DETAIL A BELOW (TYP.)

SECURE VALLEY TRUSS W/ ONE ROW OF 10d NAILS 6" O.C.



(NO SHEATHING) N.T.S.

WIND DESIGN PER ASCE 7-98, ASCE 7-02, ASCE 7-05 146 MPH WIND DESIGN PER ASCE 7-10 160 MPH MAX MEAN ROOF HEIGHT = 30 FEET ROOF PITCH = MINIMUM 3/12 MAXIMUM 6/12 CATEGORY II BUILDING **EXPOSURE C** 

WIND DURATION OF LOAD INCREASE: 1.60
MAX TOP CHORD TOTAL LOAD = 50 PSF
MAX SPACING = 24" O.C. (BASE AND VALLEY) MINIMUM REDUCED DEAD LOAD OF 6 PSF ON THE TRUSSES



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MiTek USA, Inc.

R

### TRUSSED VALLEY SET DETAIL

MII-VALLEY HIGH WIND2

MiTek USA, Inc.

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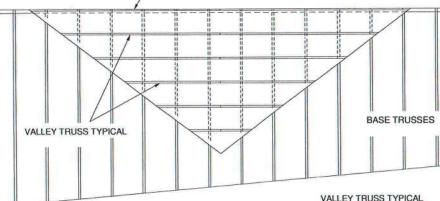
GABLE END, COMMON TRUSS OR GIRDER TRUSS

1. NAIL SIZE 10d (0.131" X 3")
2. WOOD SCREW = 4.5" WS45 USP OR EQUILIVANT
3. INSTALL SHEATHING TO TOP CHORD OF BASE TRUSSES.
4. INSTALL VALLEY TRUSSES (24" O.C. MAXIMUM) AND SECURE TO BASE TRUSSES AS PER DETAIL A
5. BRACE VALLEY WBBS IN ACCORDANCE WITH THE INDIVIDUAL DESIGN DRAWINGS.

INDIVIDUAL DESIGN DRAWINGS.

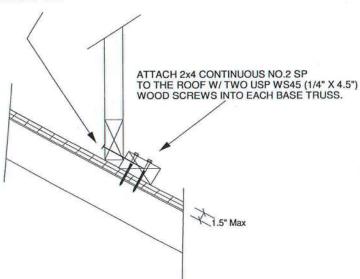
6. NAILING DONE PER NDS-01

7. VALLEY STUD SPACING NOT TO EXCEED 48" O.C.



GABLE END, COMMON TRUSS OR GIRDER TRUSS VALLEY TRUSS TYPICAL P 12 SEE DETAIL A BELOW (TYP.) 

SECURE VALLEY TRUSS W/ ONE ROW OF 10d NAILS 6" O.C.



WIND DESIGN PER ASCE 7-98, ASCE 7-02, ASCE 7-05 146 MPH WIND DESIGN PER ASCE 7-10 160 MPH MAX MEAN ROOF HEIGHT = 30 FEET ROOF PITCH = MINIMUM 3/12 MAXIMUM 6/12 CATEGORY II BUILDING **EXPOSURE C** WIND DURATION OF LOAD INCREASE: 1.60 MAX TOP CHORD TOTAL LOAD = 50 PSF MAX SPACING = 24" O.C. (BASE AND VALLEY) MINIMUM REDUCED DEAD LOAD OF 6 PSF ON THE TRUSSES

No 39380

STATE OF SONAL ENGINEERS A. Albani PE No.39380

Thomas A. Albani PE No.39380 MITek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

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MiTek USA, Inc.

GABLE END, COMMON TRUSS OR GIRDER TRUSS

#### **GENERAL SPECIFICATIONS**

- NAIL SIZE 16d (0.131" X 3.5")
   INSTALL VALLEY TRUSSES (24" O.C. MAXIMUM) AND SECURE PER DETAIL A
- 3. BRACE VALLEY WEBS IN ACCORDANCE WITH THE INDIVIDUAL DESIGN DRAWINGS.
- 4. BASE TRUSS SHALL BE DESIGNED WITH A PURLIN SPACING EQUILIVANT TO THE RAKE DIMENSION OF THE VALLEY TRUSS SPACING.
- 5. NAILING DONE PER NDS 01
- 6. VALLEY STUD SPACING NOT TO EXCEED 48" O.C.
- 7. ALL LUMBER SPECIES TO BE SP.

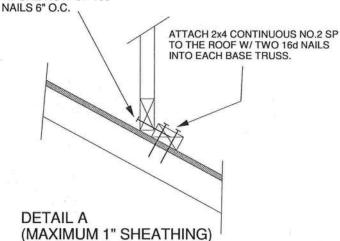
BASE TRUSSES VALLEY TRUSS TYPICAL VALLEY TRUSS TYPICAL 12

> SEE DETAIL A BELOW (TYP.)

GABLE END, COMMON TRUSS OR GIRDER TRUSS

SECURE VALLEY TRUSS W/ ONE ROW OF 16d

N.T.S.



WIND DESIGN PER ASCE 7-98, ASCE 7-02, ASCE 7-05 120 MPH WIND DESIGN PER ASCE 7-10 150 MPH MAX MEAN ROOF HEIGHT = 30 FEET ROOF PITCH = MINIMUM 3/12 MAXIMUM 10/12 CATEGORY II BUILDING EXPOSURE C OR B WIND DURATION OF LOAD INCREASE: 1.60 MAX TOP CHORD TOTAL LOAD = 60 PSF MAX SPACING = 24" O.C. (BASE AND VALLEY) MINIMUM REDUCED DEAD LOAD OF 4.2 PSF ON THE TRUSSES

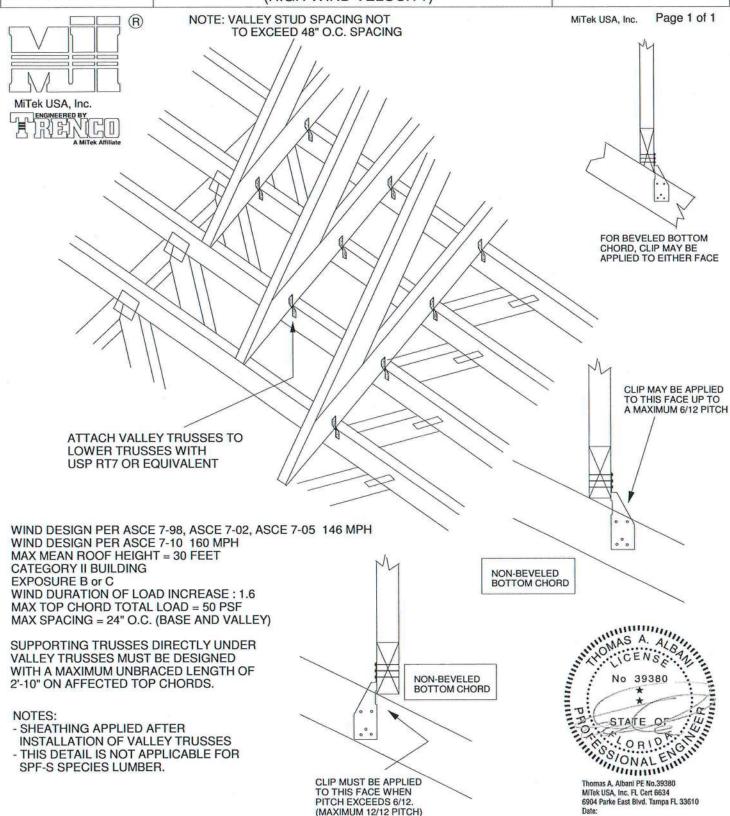
No 39380

STATE OF ST WOMAS A ALO No 39380

Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

# TRUSSED VALLEY SET DETAIL (HIGH WIND VELOCITY)

**MII-VALLEY** 



LA. J

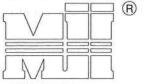
### Standard Gable End Detail

MII-GE146-001

Page 1 of 2

(2) - 10d NAILS

MiTek USA, Inc.



**DIAGONAL BRACE** 

4'-0" O.C. MAX

MiTek USA, Inc. ENGINEERED B

Typical \_x4 L-Brace Nailed To 2x\_Verticals W/10d Nails spaced 6" o.c. Vertical Stud SECTION B-B

TRUSS GEOMETRY AND CONDITIONS SHOWN ARE FOR ILLUSTRATION ONLY. Varies to Common Truss SEE INDIVIDUAL MITEK ENGINEERING DRAWINGS FOR DESIGN CRITERIA (4) - 8d (0.131" X 2.5") NAILS MINIMUM, PLYWOOD SHEATHING TO 2x4 STD SP BLOCK

Vertical Stud DIAGONAL BRACE (4) - 16d Nails 16d Nails Spaced 6" o.c. (2) - 10d Nails into 2x6 2x6 Stud or 2x4 No.2 of better Typical Horizontal Brace Nailed To 2x\_ Verticals w/(4)-10d Nails SECTION A-A 2x4 Stud

> PROVIDE 2x4 BLOCKING BETWEEN THE FIRST TWO TRUSSES AS NOTED. TOENAIL BLOCKING TO TRUSSES WITH (2) - 10d NAILS AT EACH END. ATTACH DIAGONAL BRACE TO BLOCKING WITH (5) - 10d NAILS.

(2) - 10d

NAILS

Roof Sheathing

1'-3"

Max.

24" Max

- Diagonal Bracing Refer to Section A-A

L-Bracing Refer to Section B-B

NOTE:

1. MINIMUM GRADE OF #2 MATERIAL IN THE TOP AND BOTTOM CHORDS.

CONNECTION BETWEEN BOTTOM CHORD OF GABLE END TRUSS AND WALL TO BE PROVIDED BY PROJECT ENGINEER OR ARCHITECT

3. BRACING SHOWN IS FOR INDIVIDUAL TRUSS ONLY, CONSULT BLDG. ARCHITECT OR ENGINEER FOR TEMPORARY AND PERMANENT BRACING OF ROOF SYSTEM.

4. "L" BRACES SPECIFIED ARE TO BE FULL LENGTH. GRADES: 2x4 No 3/STUD SP OR BETTER WITH ONE ROW OF 10d NAILS SPACED 6" O.C.

DIAGONAL BRACE TO BE APPROXIMATELY 45 DEGREES TO ROOF

DIAPHRAM AT 4-0" O.C.

6. CONSTRUCT HORIZONTAL BRACE CONNECTING A 2x6 STUD AND A 2x4 STUD AS SHOWN WITH 16d NAILS SPACED 6" O.C. HORIZONTAL BRACE TO BE LOCATED AT THE MIDSPAN OF THE LONGEST STUD. ATTACH TO VERTICAL STUDS WITH (4) 10d NAILS THROUGH 2x4. (REFER TO SECTION A-A)

GABLE STUD DEFLECTION MEETS OR EXCEEDS L/240.

8. THIS DETAIL DOES NOT APPLY TO STRUCTURAL GABLES.
9. DO NOT USE FLAT BOTTOM CHORD GABLES NEXT TO SCISSOR

TYPE TRUSSES.

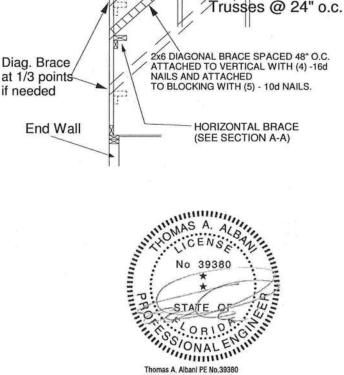
10. NAILS DESIGNATED 10d ARE (0.131" X 3") AND NAILS DESIGNATED 16d ARE (0.131" X 3.5")

Minimum Stud Size	Stud Spacing	Without Brace	2x4 L-Brace	DIAGONAL BRACE	2 DIAGONAL BRACES AT 1/3 POINTS
Species and Grade		Maxim	num Stud L	ength	
2x4 SP No 3/Stud	12" O.C.	3-11-3	6-8-0	7-2-14	11-9-10
2x4 SP No 3/Stud	16" O.C.	3-6-14	5-9-5	7-1-13	10-8-11
2x4 SP No 3/Stud	24" O.C.	3-1-8	4-8-9	6-2-15	9-4-7

Diagonal braces over 6'-3" require a 2x4 T-Brace attached to one edge. Diagonal braces over 12'-6" require 2x4 I-braces attached to both edges. Fasten T and I braces to narrow edge of web with 10d nails 8" o.c., with 3" minimum end distance. Brace must cover 90% of diagonal length.

MAXIMUM WIND SPEED = 146 MPH MAX MEAN ROOF HEIGHT = 30 FEET CATEGORY II BUILDING EXPOSURE B or C ASCE 7-98, ASCE 7-02, ASCE 7-05 DURATION OF LOAD INCREASE: 1.60

STUD DESIGN IS BASED ON COMPONENTS AND CLADDING. CONNECTION OF BRACING IS BASED ON MWFRS.





**OCTOBER 5, 2016** 

### REPLACE BROKEN OVERHANG

MII-REP13B

MiTek USA, Inc.

Page 1 of 1

R

MiTek USA, Inc.

ENGINEERED BY

TRUSS CRITERIA:

LOADING: 40-10-0-10 **DURATION FACTOR: 1.15** SPACING: 24" O.C. TOP CHORD: 2x4 OR 2x6 PITCH: 4/12 - 12/12

HEEL HEIGHT: STANDARD HEEL UP TO 12" ENERGY HEEL

**END BEARING CONDITION** 

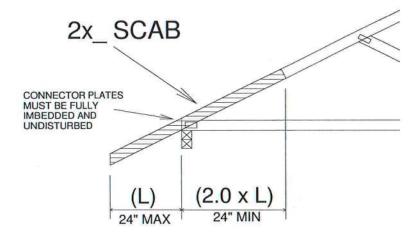
NOTES:

1. ATTACH 2x SCAB (MINIMUM NO.2 GRADE SPF, HF, SP, DF) TO ONE FACE OF TRUSS WITH TWO ROWS OF 10d (0.131" X 3") SPACED 6" O.C.

2. THE END DISTANCE, EDGE DISTANCE, AND SPACING OF NAILS SHALL BE SUCH

AS TO AVOID UNUSUAL SPLITTING OF THE WOOD.

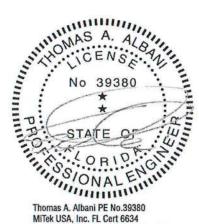
3. WHEN NAILING THE SCABS, THE USE OF A BACKUP WEIGHT IS RECOMMENDED TO AVOID LOOSENING OF THE CONNECTOR PLATES AT THE JOINTS OR SPLICES.



#### **IMPORTANT**

This detail to be used only with trusses (spans less than 40') spaced 24" o.c. maximum and having pitches between 4/12 and 12/12 and total top chord loads not exceeding 50 psf. Trusses not fitting these criteria should be examined individually.

REFER TO INDIVIDUAL TRUSS DESIGN FOR PLATE SIZES AND LUMBER GRADES



Thomas A. Albani PE No.39380 MITek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610

#### LATERAL BRACING RECOMMENDATIONS

MII-STRGBCK

MiTek USA, Inc.

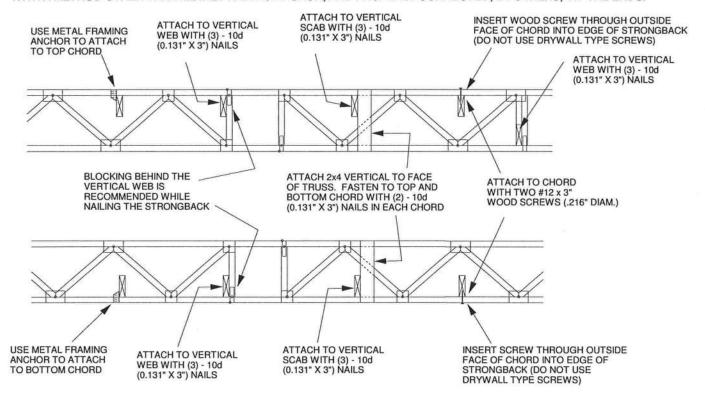
Page 1 of 1

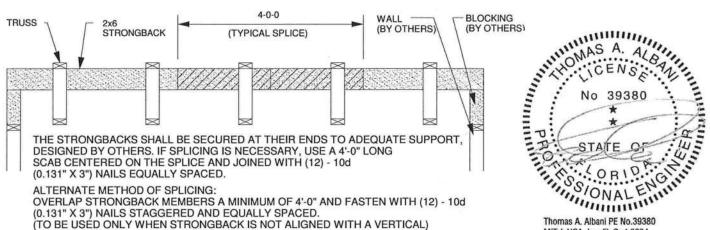


TO MINIMIZE VIBRATION COMMON TO ALL SHALLOW FRAMING SYSTEMS, 2x6 "STRONGBACK" IS RECOMMENDED, LOCATED EVERY 8 TO 10 FEET ALONG A FLOOR TRUSS.

NOTE 1: 2X6 STRONGBACK ORIENTED VERTICALLY MAY BE POSITIONED DIRECTLY UNDER THE TOP CHORD OR DIRECTLY ABOVE THE BOTTOM CHORD. SECURELY FASTENED TO THE TRUSS USING ANY OF THE METHODS ILLUSTRATED BELOW.

NOTE 2: STRONGBACK BRACING ALSO SATISFIES THE LATERAL BRACING REQUIREMENTS FOR THE BOTTOM CHORD OF THE TRUSS WHEN IT IS PLACED ON TOP OF THE BOTTOM CHORD, IS CONTINUOUS FROM END TO END, CONNECTED WITH A METHOD OTHER THAN METAL FRAMING ANCHOR, AND PROPERLY CONNECTED, BY OTHERS, AT THE ENDS.





Thomas A. Albani PE No.39380 MiTek USA, Inc. FL Cert 6634 6904 Parke East Blvd. Tampa FL 33610 Date:

Lake

MITEK PLATE APPROVAL #'S 2197.2-2197.4, BOISE EWP PRODUCT #'S LVL FL1644-R2, BCI JOISTS FL1392-R2 31-04-00 8-00-00 CJ03 CJ05 CJ01 EJ02 (9) CJ01 5-00-00 CJ01 EJ01 (3) EJ01 (2) 7-00 CJ03 CJ03 10-00-00 CJ01 CJ05 CJ05 14 CJ03 TOS 005 N T09 G CJ01 T10 U CJ03 T11 CJ05 T12 20-08-00 2-08-00 13-Γ14 1-02-08 BEARING T16 107 Г06 05 24-04-00 AHU TU3 Γ02 23-04-00 205 7-00-00 5101 C103 T01 (10) EJ01 (20) 2101 SOL 203 701 66-00-00

THE ARROW HEAD AT THE END OF THE TRUSS ON FILE TRUSS PLACEMENT PLAN GAYOUT)
CORRESPONDS WITH THE LEFT SIDE OF THE NUDVIDUAL TRUSS DRAWING, USE THIS AS AN ORIENTATION GUIDE WHEN SETTING THE FRUSSES ON THE STRUCTURE.

ral Notes:

• Fer ANSI/IPI 1:2002 all "Truss to Wall" connections are the responsibility of the Building Designer, not the Truss Manufacturer.

• Use Manufacturer's specifications for all hanger connections unless noted otherwise.

• Trusses are to be 24° o., U.N.O.

• All hangers are to be Simpson or equivalent U.N.O.

• Use 10d x 1 1/2" Nails in hanger connections to single ply incorrencess.

rder trusses. Trusses are not designed to support brick U.N.O. Dimensions are Feet Inches: Sixteenths

No back charges will be accepted by Builders FirstSource unless approved in writing first. 850-835-4541

ACQ lumber is corrisive to truss plates. Any ACQ lumber that comes in contact with truss plates (i.e. scabbed on tails) must have an approved barrier applied first.

Refer to BCSI-B1 Summary Sheet-Guide for handling. Installing and Bracing of Metal Plate Connected Wood Truss prior to and during truss installation.

It is the responsibility of the Contractor to ensure of the proper orientation of the truss placement plans as to the construction documents and field conditions of the structure orientation. If a reversed or flipped layout is required, it will be supplied at no extra cost by Builders required, it will be supplied at no extra cost by

All common framed roof or floor systems must be designed as to NOT impose any loads on the floor trusses below. The floor trusses have not been designed to carry any additional loads from above. It is the responsibility of the Contractor to make sure the placement of trusses are adjusted for plumbing drops, can lights, ect..., so the trusses do not interfere with these type of items.

This truss placement plan was not created by an engineer, but rather by the Builders FirstSource staff and is solely to be used as an installation guide and does not require a seal. Complete truss engineering and analysis can be found on the truss design drawings which may be sealed by the truss design engineer.

Gable end trusses require continuous bottom chord bearing. Refer to local codes for wall framing requirements.

Although all attempts have been made to do so, trusses may not be designed symmetrically. Please refer to the individual truss drawings and truss placement plans for proper orientation and placement.

FIRSTSOURCE Builders

Lake City PHONE: 386-755-6894 FAX: 386-755-7973

Jacksonville PHONE: 904-772-6100 FAX: 904-772-1973

Tallahassee

PHONE: 850-576-5177

EBEIG CONST
-------------

Legal Address:		
Lo	Lot 8 Crosswinds	vinds
Model:		
1595		
Date:	Drawn By:	Original Ref#:
5-11-22	KLH	3163304
Floor 1 Job#	Floor 2 Job#:	Roof Job #:
N/A	N/A	3163304

